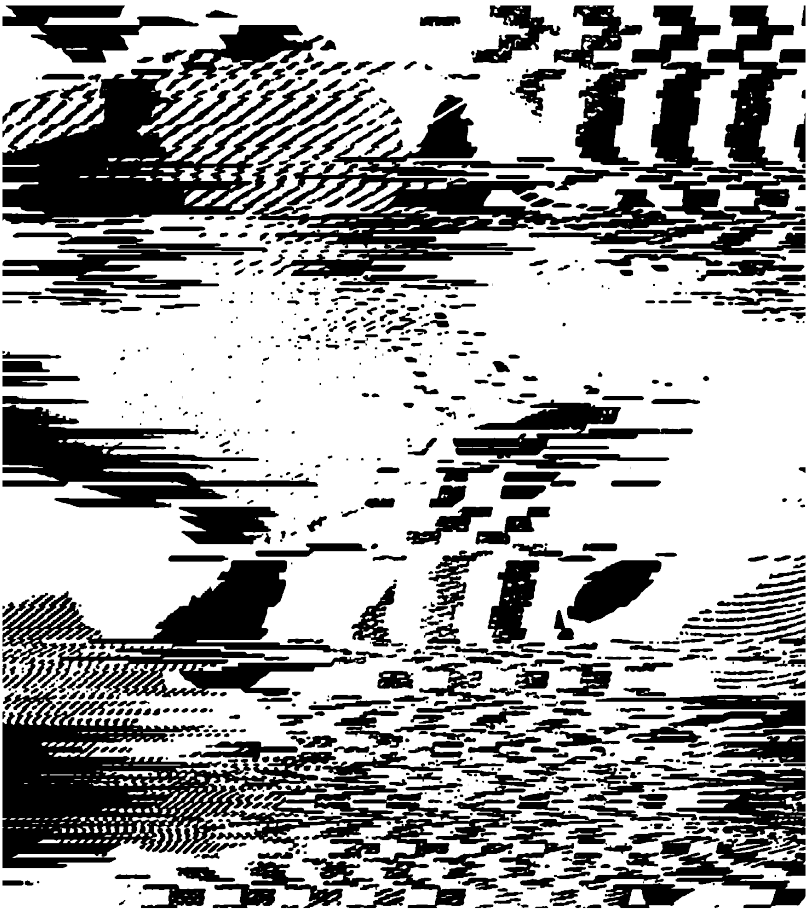
On RAVES & ROUTERS

Joshua Rose

Printed 2026 / Tucson

Hypertext Distro is a zine press distributing literature to help inform and inspire a practical utopian future.

Series I: Redrawing the Boundaries of the Unthinkable is a three-part release that examines our contemporary social and political reality—with all its crushing control mechanisms, mind-numbing distractions, and violent coercion—and asks the unthinkable: what here, of all places, can serve as the unexpected seeds of the utopian future to come? If there is a such thing as clear-eyed optimism, these essays channel it: every seemingly iron-clad political narrative is up for radical revision, and even the most "noxious phenomena" become fertile grounds for revolutionary utopian dreaming.



Going Away Party

> One of the things I found exhilarating at that point [in the late 1980s UK rave scene] was the idea that there was this whole society of people who lived at night and slept during the day. This carnival idea of turning the ordinary world completely on its head. Like slipping into a parallel universe, almost.
>
> — An early raver, quoted in Simon Reynolds' *Energy Flash*

Mesh

1. The spaces beneath and between the Net (- Œ finely meshed).
2. Interlock interval between biological and technical net-components (- Œ mesh with machines).
3. Friction-generating divisional fabric.
4. Set of demonic interzones (Pandemonium).
5. Wormhole-space.

— Cybernetic Culture Research Unit

An old friend left town today, let's call her Madison. I'll miss her most, I'm sure, in the mornings spent goofing around after late nights out; in the camping trips and concerts; in the gossiping and processing and shared meals. But her departure has also been an occasion for me to reflect on some other, more unexpected things we've done together. Let me try to give some context. I need, as a starting point, her going away party.

"I decided to give a speech, as I'm preparing to move," she said to the not-so-small assembled crowd, "because I've lost myself before when entering a new place, and so I'd like to remind myself who I've become while living here." She talked about her friends, her partner, her political development, and about the way all these things came together in certain projects that she and I, together with our closest friends, created together. "We just liked to build stuff!" In particular, I want to focus on two of the projects she named—a mesh network that uses rooftop routers to distribute home internet access for donation (or no donation!), and a crew for throwing illegal all-night

techno dance parties: raves. Seemingly discrete projects, I also hope to dig at the common threads that run beneath and between the two.

First, it's important to establish: we didn't know what we were doing. We didn't know how to build a network; we didn't even really know what a network was. No one in the group that started the mesh network had worked in tech in any capacity, no one was a computer science student,[1] no one had any qualification whatsoever—we just thought it seemed cool. Naturally, we didn't know much about raves either. I can picture Madison and I talking early on, "So I think *that* makes a song 'house,' but I'm not sure what would make one 'techno' then… wait, what about 'trance'?" In preparation for our first rave, a group of us went to a poorly attended "open decks" night at a dingy venue near the university and asked the first DJ we saw—he was probably twenty-two years old—to please play our party in a few weeks at 2 a.m. in a drainage ditch.[2] We didn't know how to work a generator, we didn't know how to DJ, we were petrified that the police were going to come and break up our party as if it were a confrontational protest ("What if they use pepper spray!?").

This first bit of context for these projects—the "we were clueless" background, if you will—feels important for a couple reasons. While rather to the side of the main point that I hope to make in this essay, it does feel meaningful to me to try to convey, in the timeless words of Nike, that you can, in fact, *just do it.* No need to wait for the experts[3]— get out there and make the project of your dreams; the technical knowledge will develop as you need it. The other reason for the "clueless" background, though, is to say that—since we didn't start either of these projects because we were uniquely positioned to be the ones to start them—we must have started them *for some other reason*. More on this later.

Second: the projects were, by and large, successes! Our mesh

1 Some people with these sorts of skills came later and have been an immense help and I'm very grateful to them.

2 He did! I believe his set was controversial among some of our party throwing crew—it was "too much"—but I thought it was siiiiick.

3 It would be a bit dishonest here to fail to note that we were lucky enough to have some guidance from afar from people doing similar things in other cities. While the friends with the rave crew in another city largely just provided encouragement, "Yeah, go for it!"; sending messages back and forth with NYC Mesh, the largest mesh network in North America, was instrumental in getting our own network off the ground.

network started out with a tentative little connection from the anarchist social center to the non-profit bike workshop across the street. Later, in a move that was almost certainly legal, but just as certainly in violation of our user agreement, we spread a single high bandwidth connection that we were purchasing from the pseudo-monopoly corporate internet service provider to ten houses nearby for a neighborhood-scale network. We got grant money. We bought a "backhaul"[4] connection; got quicker at crimping cable, better at doing antenna alignments; scaled up. I remember being in a woman's house after finishing an install and asking her to do a speed test of the internet we were now providing side-by-side with the one she got from that mega-telecom company. We were twenty-five percent faster. She looked at me in disbelief: "I've been paying them a *lot* of money!"

And, we raved. Our first party went off without a hitch, sun rising over that aforementioned drainage ditch out by the airport while some guy who we had just met[5] finished up the trippiest set of the night. We'd put together a loose system for promotion that required people to call a phone number and listen to a robot voice read them a URL rather than using social media, and some people told us this was "old school." We were told that the sort of parties we were throwing were called "renegades," and we learned about the history of rave—how this cultural form was born from illegal parties much like the ones we were throwing, how in the UK they passed a law to try to outlaw raves that specified that a gathering was illegal when the music was "wholly or predominantly characterised by the emission of a succession of repetitive beats."[6] We bought generators

4 This may have some special technical meaning, but read: "Costco size."

5 Different from the open decks night kid. Three of the four DJs for our first rave we had just met in the weeks before.

6 The Criminal Justice and Public Order Act of 1994. The idea that repetitive beats should be illegal is, of course, pretty funny, as if the problem the government had with the parties was something like "all techno sounds the same." In reality, of course, it was because raves had transcended the role of pure hedonistic escape and had become integrated into widespread grassroots resistance, most famously with the anti-car culture direct action group Reclaim the Streets (RTS). After the act was passed, 8,000 people attended an RTS party on a major motorway where, among other extraordinary carnivalesque elements, stilt-walkers in giant skirts had hidden beneath them people "at work with jackhammers, hacking in time to the techno, to mask the sound from the officers standing inches away, digging up the surface of the road until large craters littered the fast lane… Tree saplings—rescued from the path of the M11 link road—were then planted in the craters."

from Home Depot and then returned them after the parties were over, we built a psychedelic interactive audiovisual installation, Madison and I learned to DJ and did a B2B set[7] at one of our raves; we got more ambitious, expanded our crew. One of our most recent parties was half a mile up a storm drain tunnel, directly underneath the commercial bar district where the college students go out, the party powered by a long extension cord snaking up out of a sewer grate to connect to a city outlet, the dance floor illuminated by lasers we had mounted into the concrete ceiling of the tunnel. I feel the need to outline all this, in part, just because it's just fun to recount our successes. And of course this would be a very different essay if its starting point was that we attempted to start these two projects and they both failed. But I would like to go a step beyond merely noting that it's nice that the raves and the network worked, however, and claim that despite their many evident differences, these projects were each so successful because they struck a similar chord.

And third: there was (and still is) a lot of participant overlap between these two projects. Madison and I weren't the only ones involved in both the mesh network and the rave crew. As the groups were each getting started, they probably shared seventy-five percent of their members. The mesh network was originally conceived in the spring of 2021, initial planning and research about how the whole thing would work was done that fall, and we established that first connection between the social center and the bike workshop in January of 2022. Throwing raves had been something our group of friends had been dreaming about for a while, but we got more serious about really trying to do it in the fall of 2021, and we threw our first party that December. At some level, there's a simple explanation for this overlap: again, as Madison said in her going-away speech, "We just liked to build stuff!" But I suspect there's more to it than that. Why would the same people work on community internet and illegal dance parties? This question is all the more intriguing considering the "clueless" point above—the reason can't have been that we did it because we knew a lot about it. Why raves and routers?

7 We also learned what a B2B was: when two DJs trade off back and forth during a set, playing off each other and incorporating the creative constraint of having to mix into each other's track selections.

✦✦✦

I want to suggest in this essay that each project *positions the future as a contested field of possibility*. There's something of a bait and switch going on here: each of these projects seems to be about one thing—internet service, parties—and, while that's true, on a deeper level they're actually experiments. Honestly, I can't say with a straight face that I'm working on the mesh network because I'm deeply concerned about the "digital divide," and while I love an all night party, my motivations in the rave crew go beyond what's on the surface as well. What I'm interested in is creating liberatory, socially meaningful, technological futures, and these projects strike a nerve with people's sense of what the future could be.

Each project employs a technological aesthetic that recalls the very idea of "the future" as something marvelous, strange, and advanced—we have antennas, lasers, computers, reflective outfits; the cutting open, ordering, and crimping of intricate little cables; the synthetic bleeps, bloops, stutters, and whirrs of techno. This aesthetic acts as a stand-in for the very idea of the future, at the same time that each project offers, in its own way, a concrete demonstration of a liberatory technologically-mediated experience. Together, the aesthetic and the technology at use tell those who encounter these projects that the future could be quite different than we tend to imagine it. More than the intricacies of wireless networking or rave promotion, this sort of experimental foray into the future is ultimately what I hope to grapple with in the rest of this piece.

If we accept this premise, that the heart of these projects is the way they orient us toward the future, we need also to ask why this is necessary at all. After all, we would only need to position ourselves this way if there is some issue with the current role the future plays within the collective imaginary. I think the answer to this is rather intuitive for most people: the future sucks. We hate it. It's scary. It's going to be awful, dystopian, unstable, full of misery, and *way* too hot. In the section that follows, I'll aim to explore this problem a little more thoroughly, hopefully in a way that makes it clear why projects that suggest a different sort of vision for the future itself may be so important in this moment.

No Future

> It is easier to imagine the end of the world than the end of capitalism.
>
> — Fredric Jameson, *Archaeologies of the Future*

> The most subtle form of conservatism is that which views the present only through the prism of the past!
>
> — Cinnamon Twist, "The Imaginal Rave," 1995

The widespread fear of—bordering at times on hatred for—the future is so ubiquitous that it's actually rather hard to diagnose. We can point to the polls: in the largest study of its kind, seventy-five percent of ten-thousand young people surveyed in countries around the world described the future primarily as "frightening" and a majority said they think humanity is "doomed." We could entrust ourselves to expert opinion, noting that the leading international authority on climate change has declared that it is likely that global temperature rise will surpass the threshold that will cause cascading and unpredictable downstream effects, or that the Bulletin of the Atomic Scientists, who have maintained the "Doomsday Clock" since 1947, recently set the time to eighty-nine seconds to midnight—the closest to global catastrophe during the entire history of the clock's existence, a greater existential peril than even the height of the Cold War. With more levity, we could note the various neologisms that seem to have sprung up to give articulation to the collective mindstate: from ecoanxiety to doomscrolling, or the ever-multiplying jokes about how we are somehow inhabiting the worst possible timeline. Following this thread, but a touch more seriously, we could examine the extraordinary proliferation of popular media related to disaster, apocalypse, and perhaps above all, dystopia. Somehow, these cultural forms no longer seem to serve as warning or even critique, instead acting to offer a sort of buffet of options for how one prefers to imagine an imminently horrible future unfolding. "Dystopia used to be a fiction of resistance; it's become a fiction of submission," writes *The New Yorker*'s Jill Lepore, reflecting on the rise of contemporary dystopian literature. "It cannot imagine a better future, and it doesn't ask anyone to bother to make one."

This produces a rather odd political situation. If the future itself seems irredeemably broken, those posing a way out of this predicament look, instead, to the past. The recent sloganeering in US national politics is instructive here. Donald Trump, of course, has twice now built successful political campaigns around the slogan "Make America Great Again." That he would take this line makes sense—we expect that political reactionaries will promise to bring us back to a mythic, glorious past. The Democrats, less unified in their messaging, have produced a more confused temporal orientation. Harris, in her unsuccessful 2024 bid, came most strongly to be associated with "We Are *Not* Going Back." On the face of it this seems to be suggesting the future, but dig a little deeper and it may be that the slogan is actually suggesting that we *do* go back… but just a little. The strongest reference point here is to the overturn of Roe v. Wade. In effect, the slogan seems to tell us, we won't go back to a time before legal access to abortion—and, in turn, to the "great America" of the past to which Donald Trump wants to take us—however, we *do* want to go back to before Roe v. Wade's 2022 overturn, and perhaps also back to a pre-Trump era of civility in national partisan politics, back to the Washington Consensus, and back to the era of unquestioned neoliberal American capitalist hegemony. Functionally, it seems, the two major political parties in the U.S. are in a prolonged national debate about whether we should turn back time to the 1990s or the 1950s.

If this temporal reversal is evident in institutional politics, it is even more pronounced at the political margins. Far right and left wing fantasies alike are populated by small-scale, self-sufficient communities. The objects of daily life should come from nearby, whether produced by blue-collar American manufacturing as in an era before deindustrialization, or through a local-first, sustainable regional economy. Revolutionary anti-capitalists "reskill," eschew the latest tech, and dream of rural eco-communes while proto-fascists cosplay a refracted version of generations past in "trad" relationships. At the furthest extremes, people plumb the depths of history for the source of our fall from grace, with some on the far-left blaming civilization or even agriculture itself, while particularly strange corners

of the right call themselves "paleoconservatives."[8] All are in search of a lost—but purer and simpler—natural human condition. Perhaps we need to go back thousands or even tens of thousands of years, rather than mere decades?

While the past is crowded, full of all sorts of different social and political visions jockeying for position, the future is almost totally vacant—at least of any positive vision of what's next. While it is undoubtedly a difficult time to craft an appealing picture of the decades to come, there is an extraordinary strategic advantage for those who can offer one when so few people are looking to the future at all. I think of this sometimes as a position of imaginative monopoly—with so few articulable futures, any compelling place on this terrain can come to dominate the landscape of the public imagination. Staking out a position on this plane offers a vast number of people a framework from which to anticipate and even begin to enact a given version of the future. We could think of it like stage directions for a dress rehearsal for the world to come.

There's actually a field of research on the "sci-fi feedback loop" that strikes me as a related phenomenon. On an aesthetic level, we can note how new buildings, cars, and gadgets look something like the images of "futuristic" versions of these things from science fiction. This process sometimes plays out in an even more thoroughgoing fashion, though. One of the chief engineers of the rocket that enabled the Apollo 11 mission had memorized word-for-word Jules Verne's 1865 novel *From Earth to the Moon* when he was a young boy. To give a potent description of a version of the future, as Verne did, is to create the imaginative scaffolding upon which that world might be built. Unfortunately, however, in the current moment the only prominent contingencies positioning themselves as future-oriented are the silicon-valley tech interests financing the AI-craze, and, well, Elon Musk.

It's an understandable response to see those two positions and

8 I have to admit that there's a particular video of Alex Jones that I watch, near ritualistically, every 6 months or so in which he, in a building fervor, shouts "I'm alive, my heart's big! It's got hot blood, going through it fast. I like to fight too! I like to eat! I like to have children! I'm here! I've got a life force! This is a human, this is what we look like! This is what we act like! This is what everybody was like before us." By the end his eyes are bulging and his voice is straining, as he repeatedly jabs his thumb referentially toward himself.

then define yourself opposite them. “If the future is Cybertrucks and ChatGPT regurgitations of marketing copypasta, I want no part in it.” But if we cede the future to such unscrupulous interests, we shouldn’t be surprised if they define it.

This is all the more troubling for political radicals, anarchists, revolutionary anti-capitalists and the like. The traditional strength of these positions has been a critique of the present with an eye to the future. Unfortunately, the machinery of hopelessness that has bulldozed the very idea of the future in the broader public seems to have been, if anything, even more effective among revolutionaries. Indeed, while anarchists will still spraypaint “another world is possible” on the walls of downtown in the consuming moments of an uprising, if you get a couple drinks in them, these same people will add, “...but not in my lifetime.”

Constrained Sense of Possibility, Constrained Actions

> Hopelessness isn’t natural. It needs to be produced. To understand this situation, we have to realize that the last 30 years have seen the construction of a vast bureaucratic apparatus that creates and maintains hopelessness. At the root of this machine is global leaders’ obsession with ensuring that social movements do not appear to grow or flourish, that those who challenge existing power arrangements are never perceived to win.
>
> — David Graeber, “The Machinery of Hopelessness”

It’s worth lingering here for a moment on the rather odd contortions that happen to our thinking on the radical left when we give up on the very idea of the future.

As an initial premise, I would suggest that the types of action that we take are given shape by what we understand to be possible. Many of us have experienced this quite directly, if on a small scale, through our participation in social movements. Often enough, a small but determined crowd can exceed our expectations, while even a massive demonstration may be capable of very little if they have a tightly limited sense of what it is possible to do with their

numbers. Crowds of just a few hundred people at the initial protests in Minneapolis kicked off the George Floyd Rebellion, while the start of the Iraq War saw the largest day of protest in world history but failed to do much more than register opposition. Did the protesters in Minneapolis have a stronger sense of their own agency—that is, a broader sense of *what could be possible?* On a global scale, it's notable to me that revolutionary social movements tend to happen in great waves, with tactics, slogans, and even outcomes rapidly spreading throughout regions and across oceans. Historically, the revolutions of 1848 and the uprisings of 1968 demonstrate this point, while for a more contemporary set of examples we could look to the occupations of plazas and parks in 2011 that toppled governments from Tunis to Cairo and spread from Barcelona to Oakland or to the planetary adoption of the "be water, spread fire" approach from Hong Kong in anti-government uprisings everywhere from Iran to Chile in 2019-20. This pattern suggests that the key factor in whether revolutionary struggle expands is *not* simply that conditions of daily life get so bad as to necessitate it, but instead that when sweeping social change is shown to be possible, people throughout the world will take up the methods on offer to carry it out. Far more than the material conditions of a given moment, the strength, daring, and even creativity of our movements and our proposals are composed by what we understand the horizon of possibility to be.

This position—that our sense of what is possible shapes how we act, and thus also shapes what actually *does* come to be possible—begins to touch on a rather heady philosophical debate that, as far as I can tell, has been raging for at least a few thousand years. Rather than trying to interrogate whether accepting this kind of assertion is going to inevitably compel us also to accept Plato's idealism and bring into question the very reality of the physical world, I will draw, instead, on what feels to me to be a more grounded example of this sort of thing: sports psychology. You can't win the big game if you don't believe that it's possible—honestly, if you don't believe that it's possible, you'll never even *arrive* at the big game. Of course, belief alone won't ensure victory, but the athlete's sense of what they are capable of gives structure to the field of possibility. I've got a bunch of sports movie coach motivational clichés running through my head, "Practice for

the game you want to play," "The game is ninety percent mental and the rest is in your head," "Winners focus on winning, losers focus on winners."[9]

If, too traumatized by high school gym class, we can't internalize these platitudes, what sort of projects do we undertake instead, when victory no longer seems possible? A bit more seriously, what happens to our proposals when the future itself can only be conceived of in the negative? I want to suggest that there are two general responses to this state of affairs, which I'm going to call mitigationism and nihilism.

The first approach is rather straightforward: the mitigationist is basically just doing damage control. They have a structural critique—in a just world there would be no capitalism, no borders, etc.—but have come to doubt that structural change is even possible, unless, perhaps, it is precipitated by some sort of global disaster. Having accepted that there is little that can be done to challenge the underlying structures that produce the status quo, the mitigationist instead engages in a rather purely defensive, even reactive, politics—projects and practices that aim to relieve some of the worst suffering produced by the current state of affairs. I'm thinking here of all those places where revolutionary social struggle becomes mutual aid, which then slowly morphs into something that looks more like charity; of the many radical projects whose ends make sense as ethical imperatives, but can no longer be easily tied to a road map for changing the world. The mitigationist dreams of sweeping social transformation but can't summon a belief in its possibility, and so world building comes to be replaced by crisis management.

Nihilism, then, is the counterpoint. More than simply embracing the perceived impossibility of victory, the nihilist rejects the very terms of the debate. It is not only that we are not going to win because it is too difficult to transform our social and political reality or too unlikely that we will succeed; rather, liberatory political victory is a categorical impossibility, a contradiction in terms. Anything that could be conceived of as a victory is actually the seed of a new order of domination in disguise. Despite this profound revolutionary pessimism, the nihilist still participates in moments of

9 Okay, I know this analogy is too drawn out already, but where are the '96 Michael Jordan-era Chicago Bulls of revolutionary politics?

rupture, at times even taking extraordinary personal risk to advance social struggle. These actions, however, are conceived of as purely cathartic. The ultimate motivation for any political action must be some sort of pseudo-Deleuzian concept of desire, which basically just boils down to that it feels good in the moment. The only meaningful type of action is a project of negation, as all positive programs are doomed to failure. At some level this is a profound confusion of means and ends. The end—social revolution—being declared impossible or perhaps even undesirable, causes the nihilist's preferred means—particular moments of high-intensity social conflict—to come to act as a stand-in.

For convenience, I have so far spoken of these two positions as if they were mutually exclusive. Of course, this is not actually the case. It's probably more accurate to think of them as two sides of the same coin, paired perspectives in trying to square the desire for a different world with the inability to summon a belief in its possibility. Consequently, many people in radical milieus partake of both schools of thought simultaneously, perhaps leaning more nihilist on the pessimistic days; mitigationist as they put in their routine work for Food Not Bombs—I've noticed that even the occasional odd duck who actually self-identifies with the nihilist label tends to be involved in a damage control project or two. This is not to write off these forms of political action completely. Strategies to mitigate the suffering produced by the ruling order are important, even life-saving, and honestly, I think it is something of the nihilist drive toward negation that has helped to facilitate the widespread adoption of the concept of abolition—probably the most important conceptual step forward for revolutionary politics in decades. Mostly, I hope to point out that the animating logic behind these dominant points of view doesn't leave much room for a forward-looking vision that isn't rooted in either grim realism or a resigned sense of impossibility. Frankly, it doesn't leave much room for those who are deeply committed to the idea of transforming the world to believe that the world could be transformed at all.

These positions are understandable; the situation, after all, is dire. But it is critical to remember that our very hopelessness in the face of these challenges is the direct result of a political project of our

opponents. The claim that "there is no alternative" comes directly from one of the architects of the neoliberal world. Margaret Thatcher made this resounding declaration not just as a statement of her beliefs, but in order to *convince* people of the inevitably of capitalism; that so many of us have been persuaded points to an ideological defeat. David Graeber has written at some length about how the ruling class has gone to extraordinary lengths to try to convince people that no other option exists, claiming that we should interpret neoliberalism primarily as a *political* innovation to accomplish this end, rather than as a straightforward *economic* doctrine. He writes, "Whenever there is a choice between one option that makes capitalism seem the only possible economic system, and another that would actually make capitalism a more viable economic system, neoliberalism means always choosing the former." Just as much as capitalism has robbed us of our free time, our sense of agency, our health and bodily autonomy, it is integral to its present functioning that it take from us also our sense of social creativity and possibility, our political imaginations, our belief in the future. What would it look like to take them back? How could we even begin?

The Future as a Contested Field of Possibility

> Our utopia is an environment that works so well we can run wild in it.
>
> Until our most fantastic demands are met, fantasy will be at war with society. Society attempts to suppress fantasy, but fantasy springs up again and again, infecting the youth, waging urban guerrilla warfare, sabotaging the smooth functioning of bureaucracies… creeping into the bedrooms of respectable families… eventually emerging into the streets, waging pitched battles and winning (its victory is inevitable)...
>
> Where we live is liberated territory in which fantasy moves about freely at all hours of the day, from which it mounts its attacks on occupied territory… Each day a new victory is reported. Each day fantasy discovers new forms of organization. Each day it further consolidates its control, has less to fear, can

afford to spend more time in self-discovery. Even in the midst of battles, it plans the cities of the future. We are full of optimism. We are the future.

— 1960s NYC anarchist group *Up Against the Wall Motherfucker*

I'm not so ambitious as to believe I could definitively answer the questions with which I concluded the last section. I do hope, however, to offer some tentative direction for how we can begin to have some of the necessary conversations they provoke. So—how do we regain a sense of social and political possibility?

On one level we can appeal to history. Not as a blueprint for what our liberated future might look like—no more backward-looking utopias, please—but simply as a reminder that against incredible odds, seemingly intractable social systems have been defeated before, and as a reminder that just as we reject liberalism's arrow of progress—onward and upward forever—so too must we reject its opposite: the idea that things will inevitably get worse, and only an apocalypse or societal collapse could open the window of political possibility for us. How dismal! How (dare I say) materialist! What a secession of political agency! I always picture to myself a comically French urban laborer, a *sans-culotte*, who, unknowingly on the eve of the storming of the Bastille, turns to his Parisian friend, and says (with a thick French accent, naturally), "Sure, Pierre, we all hate the king, but monarchy has ruled Europe for a thousand years and will surely rule it for a thousand more!"[10]

But more than an appeal to history, I hope to look to the future, or at least toward a certain perspective on the future. Let's go back to the beginning. I opened with a claim about the importance of positioning the future as a *contested field of possibility*. I introduced this phrase in order to hammer home a point: the future will continue

10 I've actually been (rather passively) looking for a quote like this for years, and while I haven't found one *exactly* like it, I did learn that in January of 1917 Lenin wrote, "We of the older generation may not live to see the decisive battles of this coming revolution." Six weeks later, the Tsar was overthrown in the February Revolution. Nine months after that, the Bolsheviks had seized power. I'm no apologist for Lenin's regime, but at the very least the quote illustrates that even the most obsessive revolutionaries may have literally *no idea* when a revolution is about to break out. They may instead be stuck saying "not in my lifetime" right up until the last possible moment. Honestly, hit me up if you know of something a little closer to that Pierre quote, though.

to unfold. We can't reverse temporal directions and return to the past, as much as those from every corner of the political landscape might wish we could in this moment, but we *can* orient toward the future in a way that allows us to struggle over its meaning and direction. Novel technical innovations, social trends, and even political developments tend to be ill-defined when they first appear. Embracing the future as a contested field of possibility recognizes that creative interventions can alter their course or provide alternative uses that might prove durable. In the rest of this essay, I'll try to give some shape to this idea, and gesture in some of the directions it might take us.

As a starting point, we need to break out of our current circular thinking as it relates to technology. All too often at present, it seems we're stuck in a vicious loop, which I would crudely outline like this: the direction of technological development is largely determined by the systems we oppose; as a result, new technology (and perhaps even just its use) comes to be seen as indistinguishable from—even an embodiment of—those systems. This, in turn, renders meaningful engagement with these tools morally compromising, and so we refrain from contesting how technology is used or developed. And then… we're right back where we started. There's not much of an intervention point here. What if, instead of renouncing all new technological developments as irredeemably corrupted by the social system that produces them, we could insist that it is possible to tussle with the objects produced by the capitalist hell world, asking, in effect, "Is there some unseen liberatory potential here?"

The history of rave suggests that once we feel we can ask this question, we may come up with all sorts of creative answers. In order to illustrate this point I'll offer a lengthy quote from Mark Fisher's excellent short essay, "Baroque Sunbursts," where he explores the emergence of the rave subculture in the late 80s and early 90s.

> Rave's ecstatic festivals revived the use of time and land which the bourgeoisie had forbidden and sought to bury. Yet, for all that it recalled those older festive rhythms, rave was evidently not some archaic revival. It was a spectre of post-capitalism more than of pre-capitalism. Rave culture grew out of the synthesis of new drugs, technology, and music culture. MDMA and Akai-based electronic psychedelia generated a consciousness which saw no reason to accept that boring work was inevitable. The same technology that facilitated the waste and futility of capitalist domination could be used to

> eliminate drudgery, to give people a standard of living much greater than that of pre-capitalist peasantry, while freeing up even more time for leisure than those peasants could enjoy. As such, rave culture was in tune with those unconscious drives, which as Marcuse put it, could not accept the "temporal dismemberment of pleasure... its distribution in small separate doses." Why should rave ever end? Why should there be any miserable Monday mornings for anyone?

Fisher is describing a time when the personal computer—a tool developed largely by the military and the upper echelon of capitalist business interests—was beginning to reshape the workplace. This was what it was designed for, of course: work (and war). But there were those who took up this new tool as one ingredient of a potent cocktail of new technologies, new drugs, and new music and innovated an extraordinarily resonant cultural form with it—a form that suggested to its festive participants that emerging technologies could be remaking the world in a manner very different than how they perhaps had experienced them thus far. I suspect that if the would-be progenitors of rave had the dreary perspective on the future and technology that we have now, this would never have happened.

One way to orient toward the future, then, appears to be a certain sort of critical yet creative engagement with technology—a refusal to allow tech executives and politicians to determine how and where technology is used, and to instead experiment with it; use it in novel—even playful—ways. In Fisher's example, we see that the early ravers are twisting these newly available devices beyond their originally intended purposes while combining them with other novel cultural elements. Similar attempts are made in the mesh network: the routers, radios, and antennas that the network uses are primarily intended for setting up internet infrastructure for things like hotels, businesses, college campuses, and even for wirelessly streaming surveillance footage from security cameras to recording servers. Only by flashing these devices with custom configuration files and replacing their networking protocols with instructions to "mesh" is the new potential of these tools unlocked. At some level, the dictate to explore the capabilities of technical systems beyond that for which they were built is simply a definition of hacking, but—as in the example of the birth of rave—this ethos can extend far beyond mere technical knowledge. The first-wave ravers didn't "hack" anything, at least not

in the traditional use of the word. Instead, their primary innovation was using technology in a way that it hadn't been *culturally* intended, even if there were occasional technical exploits, as in the use of the turntable in unexpected ways or the spread of practices like looping and sampling.

I actually think there's a whole schematization that could be done here, asking: what are the characteristics of an emancipatory technologically-mediated experience? I won't try to map out this structure here, but having offered one feature that would be important to such a framework—the technology in question is experimentally used beyond the purposes envisioned by its engineer—allow me to suggest one more.

One of the central ways the information age has failed to deliver on its promises is in regards to simple human sociality. The internet, and the attendant vast array of technical devices which it has introduced into our lives, promised to leave us more connected to one another than ever before. More often than not we've found ourselves more alienated. Where the projects that my friends and I started have experienced successes—genuine, thoroughgoing successes—those moments where they have been more than just a fun party or a free source of home internet, but instead a tentative offering of a different sort of future—I expect it has been in large part due to their ability to close the gap of this disappointment between the deeply connected future we were promised and our experience of daily life in the 2020s. The mesh network is made stronger and more resilient by "meshing" signals with neighboring users. It's a utility that is more adaptive the more it is adopted, as the impersonal bureaucracy of telecom giants is replaced by neighbors and network administrators who the user knows and can reach out to directly. The rave, of course, is a collective ecstatic ritual. It is given its form as much by the crowd—the shifting, lost-in-the-beat anonymity—as by the futuristic sounds to which they sway. A rave without the technology for the music is no rave at all, sure, but perhaps more importantly for our purposes here, a rave of one, or even just a few, isn't a rave either.

✦✦✦

I've arrived now at the point where I have to reveal the open secret of this essay, the contradiction of its premise that is perhaps at this point becoming glaringly obvious: *neither the rave nor the mesh network are actually new.* Rave, as I've just detailed, is a decades-old cultural form. Arguably tired, played-out. It wouldn't be difficult to argue that our little rave crew is doing a kind of 80s/90s nostalgia act far more than a genuinely future-oriented project, or that we are caught up in the broader cultural churn that recycles the tastes, sounds, and fashions of prior decades every few years as fodder for another round of commodifying the once subversive subcultures of generations past. The mesh network, I'm afraid, is similarly compromised. The largest mesh network in the world, *guifi.net* in Spain, was started in 2004, and none of the technology that makes our network possible is particularly cutting edge. How can I claim that these projects position us in an important way *vis-à-vis* the future?

Well, at some level I'm tempted to argue that using emerging technology is unimportant. The starting point here would be to say that all the technical gizmos in the mesh network and the rave are bric-a-brac, mere ornamentation. What matters is that these projects employ their technical instruments as aesthetic objects that are suggestive of the future to the people who encounter them—what's more futuristic than a laser, after all, regardless of how long it has been around? There's actually something of an existing tradition that seeks to use an aesthetic of the future to suggest the possibility of new social and political arrangements. I'm largely thinking here of cultural movements like afrofuturism and solarpunk. The very act of imagining a Black utopian future in the face of a white supremacist present encourages a political creativity while staking out a position in the imaginative landscape, sometimes rather directly: "There Are Black People in the Future."

Critical theorist Fredric Jameson has taken the implications of some of this aesthetic argument a step further, claiming that the entire genre of science fiction serves the function of placing its reader back in the tides of a mutable history by creating a future for us to travel to,

> …such that upon our return, [our own present] is offered to us in the form of some future world's remote past… all [the objects of our present] are not

> seized, immobile forever, in some "end of history," but move steadily in time towards some unimaginable yet inevitable "real" future. Science fiction thus enacts and enables a structurally unique "method" for apprehending the present as history.

I actually find this line of thinking quite compelling. If we could somehow cultivate a vast flourishing of literary, artistic, musical, and other aesthetic movements that, like afrofuturism and solarpunk (or perhaps even all of sci-fi), reposition us in such a way that our political imagination of the future could be immensely expanded and untethered from the dominant fatalistic pessimism, I would be extraordinarily pleased.

But, of course, I can't very well conclude there. A politics that might salvage the future—to give us the sense that it truly is contested terrain that we can struggle over to define—will need more than a futuristic aesthetic; it will need to actually engage with emerging technologies. This will require us to get our hands dirty. What are the potential liberatory dimensions of drones, CRISPR, or 3D printing? What about (I'm afraid to say it) AI? Could these be used as tools for social struggle? Could they be cracked open, rearranged, scrambled, and then levied in Mark Fisher's words to "eliminate drudgery?" Could they, somehow, against all odds, be a constituent element in a cultural form that delivers us genuine moments of human connection rather than just more time spent in front of a screen?

The answer to each of the above questions could well be: "No!" but we're not presently in much of a place to find out. It will be by a willingness for bold experimentations with the emergent—rather than reflexive rejections of all that is new as too tainted with capitalism to be engaged with—that we can get a sense for how we may yet employ the tools of the present.[11]

There is some recent history of this sort of critical engagement and experimentation. Take, for example, the scandalously overlooked "artistic technological research organization," the Institute for

11 This is, of course, by no means a call to just uncritically pick up any random gadget and declare it a tool for freedom. An instructive example here may be nuclear power, which, while extraordinarily potent and, at one time, the very likeness of cutting edge technology, may, by its very nature, have no possible liberatory application whatsoever. Though my preferred example is actually the smartphone. I think they might just be irreparably bad. They really really suck.

Applied Autonomy (IAA). If they're known at all, it's likely for TXTmob, a pre-smartphone SMS message forwarding tool launched in 2004 to give demonstrators at the RNC and DNC protests the technical dexterity to respond to police movements.[12] Reportbacks from the actions describe users anticipating the locations of lines of riot police and even overwhelming would-be arresting officers with superior numbers: "TXTMob was great! When the cops tried to arrest one of our people, we were able to get hundreds of folks to the scene within minutes." But the IAA did more than just build communication infrastructure for mass mobilizations. As early as 1998, they were experimenting with what they termed "contestational robotics," combining oversized RC cars with dot matrix printing code to produce graffiti robots, and releasing a slew of communiques, blueprints, and suggestions for future directions including plans for robotic propaganda distribution and noise robots for disrupting events, among other "example[s] of how robotic objector[s] can be built to be useful to resistant forces."

I also want to put a good word in for the early internet optimists. I'm thinking here of the 80s and 90s hackers, of the sweet nerds who built Linux, of those who challenged intellectual property by building piracy infrastructure and those who rethought it with the invention of open source and creative commons licensing. Of course, from this historical vantage point, it's more fashionable to criticize these people for their naivete than to praise them for their achievements—there is, after all, an uncomfortable throughline from some of the projects these people started through the *Declaration of the Independence of Cyberspace* all the way to Thomas Friedman's *The World Is Flat* which sees market behavior as the ultimate expression of human freedom. But then, the fact that some of the internet utopians' projects could be co-opted—or, in some cases, had murky

12 TXTmob then acted as direct inspiration in the creation of Twitter, with Bay Area activists who had worked on the code for the service pitching the idea of phone-based "microblogging" as a new direction for the failing tech start-up that employed them. I think this history is particularly important when considering the media firestorm a handful of years later about the role of Twitter in the Arab Spring. With the context of TXTmob, we can ditch the standard line, something about "the democratizing power of social media in the Middle East" and instead say that it is no surprise that the commercialized version of a tool that was originally designed specifically for the purpose of coordinated revolutionary activity in the streets could be still be used in such a way… or at least it still could be back in 2011.

intellectual foundations from the beginning—doesn't mean that their work didn't have real stakes. While the internet may not have been the immediate precursor to a borderless world built on the free exchange of information, the ethics and interventions of the early internet idealists helped to constitute a meaningful struggle over the direction of emerging worldwide communication infrastructure—one whose legacy produced some startlingly successful frameworks for the liberatory implementations of these new technologies.

I think Wikipedia is an instructive example in this regard. In a lot of ways it is post-capitalist dream architecture. To start, Wikipedia is free, has no advertisements, and doesn't track the behavior of its users or sell their data. It is also extremely popular. Wikipedia has been one of the top ten most visited websites on the internet since 2003, with consistently more than a billion users a month and articles in hundreds of languages. Perhaps most importantly, this scale has been achieved while maintaining broadly liberatory organizational and editorial principles, offering a demonstration to the world that a decentralized but participatory network of volunteers can produce, maintain, and manage the largest and most accurate encyclopedia of human knowledge in existence all while rejecting the profit motive and staying committed to its values of free content and privacy for its users. It's actually quite incredible. And it's worth remembering that we could have just as easily had Encyclopedia Britannica selling the browsing data about everything we want to learn about to advertisers.

The goal, ultimately, is structural transformation, not simply carving out a few sanctuaries from an otherwise dismal commercialized hellscape,[13] but let's use this example for a moment as a jumping off point for reimagining the technical implements in our lives more generally. Wikipedia's model invites us to take the vast array of emerging digital technologies that have entered daily use and picture them stripped of their financialized incentives, targeted ads, surveillance, and directive to be designed to be as addictive as possible. If we can imagine this—I'm visualizing quotidian, soft, helpful, and beautiful technological artifacts—suddenly there's far less reason for our instinctive technophobia.

13 "I approached the future as a contested field of possibility and all I got was this lousy free encyclopedia."

My own projects, the rave and the mesh network, which have served as reference points throughout, are ultimately only the most preliminary offerings in this regard as well—mock-ups that tentatively point toward a realignment that could be more fully realized. To these projects' credit, they embody an aesthetic that suggests alternative possible futures to those who encounter them, and they offer some initial view into the characteristics of an emancipatory technologically-mediated experience: a critical, even playful engagement with the tools on offer, and genuine social connection in place of the now-standard digital alienation. But then, these projects don't particularly succeed at applying this logic to the sort of novel technologies and phenomena that are coming to define the collective understanding of the future right now. Can we apply the ethos of the rave or the mesh network—or the IAA, the early internet utopians, or Wikipedia, for that matter—-to genuinely new technologies? Can we, through varied and abundant experimentation with every tool we can get our hands on, produce a robust set of technical projects that suggest the possibility of a different world to those who encounter them?

This essay is not at its core, however, a call to "design the future" so much as to (re-)enter into a contest over its direction and meaning. While there is no doubt that engineers had important roles to play in the examples I have outlined throughout, I'm advocating for less of a technical operation than one that operates on our sense of what is possible, on the plane of belief. Let's call it a spell. If we can, through our engagement with technology or by the adoption of a future-oriented aesthetic, open up the future itself as a terrain of struggle, we may find that our projects and approaches transform. We may also find that we have a new resonance with a vast number of people also desperate for a sense that a different kind of future is possible, for others who crave something more than cynical outlooks and negative projects. We may find that by embracing the possibility of a transformed future we come to realize it is a little closer than we knew.

✦