20 Seeing Like the Streamers: Reprogramming the Panopticon

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ANGEL DUMOTT SCHUNARD: Collins will recount his exploits as an anarchist, including the tale of his successful reprogramming of the MIT virtual reality equipment to self-destruct as it broadcasts the words: "Actual Reality—ACT UP—Fight AIDS!" (Larson 1996)

Platform companies have radically redefined early-twenty-first-century social, economic, and civic life. Global corporations like Amazon, Facebook, and Google now exercise their unprecedented power to shape the development of popular culture, transform modern labor practices, and challenge existing norms of governance. The idealistic aspiration of the past—that the internet would serve as a democratizing force and usher in a new more egalitarian age of humanity—has been replaced by a growing concern that we've unwittingly built a grand surveillance apparatus, a digital panopticon that is ushering in the dystopian future that science fiction has been warning us about since the mid-twentieth century. While those concerns are certainly warranted, and we will explore them in more detail here, this chapter offers an alternative imagining of our future—one rooted in observations about the ways in which live streamers resist the seemingly inevitable subjugation of platform capitalism.

The Oppressive Power of Platform Capitalism

Scholars, journalists, and activists alike have been increasingly sounding the alarm about the growing influence that networked platforms have on the material conditions of our lives. Many argue that the consequences for ignoring earlier warnings may be irreversible, as billions of people across

the world now rely on these platforms for myriad personal and professional needs. Search engines and social media networks like Google, Facebook, and Twitter are among the most pervasive in their reach. These titans of modern communication make their money by collecting data about the behavior of their users and selling targeted advertising to other companies based on the information they gather. This extreme commodification of data extraction is recognized as the fundamental shift in economics that distinguishes platform capitalism from earlier forms of business (Srnicek 2017).

By recasting human experiences as valuable material to be mined and resold to other corporations, the dominant platforms of our time have effectively positioned their technological infrastructures as mass surveil-lance networks capable of influencing the behavior of their users. When the advertising algorithms of those platforms extend beyond altering the buying habits of a shoe shopper and begin serving them violent propaganda paid for by a hate group, the troublesome nature of their outsized influence becomes apparent. Indeed, some scholars argue that surveillance capitalism represents a form of social control so insidious that it threatens not only free speech, but democracy itself (York 2021; Zuboff 2019).

Besides impinging on the freedom of their users for the sake of profit, these surveillance-based platforms often exploit their workers, especially those whose labor is designed to be invisible. Unseen "ghost workers," whose task is to power the artificial intelligence and content moderation systems of these networked platforms, are often paid very low wages, exposed to traumatic media, and afforded little protections for their mental and physical health (Gillespie 2018; Gray and Suri 2019; Roberts 2019). Even those workers who engage in collective action, such as the Mechanical Turkers who perform microtasks on Amazon's crowdsourced labor platform, still struggle to be seen as deserving of a living wage by those who contract their services (Irani and Silberman 2013).

This devaluation of the workers powering networked platforms is a crucial element of surveillance capitalism, but it is not a new phenomenon. Critics of big technology corporations often invoke Michel Foucault's late-twentieth-century exploration of government control (Foucault 1977) to accuse them of constructing an entirely immersive digital panopticon designed to subtly alter their users' behavior and lull them into a state of complacent obedience. Although the fear of inadvertently submitting ourselves to a mental prison like *The Matrix* is certainly valid, it is crucial to remember that, as

originally conceived by Jeremy Bentham in the late eighteenth century, the panopticon was first and foremost a system of control designed as a "means of extracting labour" (Bentham 1995). It is in fact this more historic logic that underpins the dominant gig economy platforms like Uber, TaskRabbit, and DoorDash. And while some have described the early-twenty-first-century shift in employment toward gig work as neofeudalism, we shall see later in this chapter that comparisons to the capitalist practices that shaped the "workplace of the early industrial age" will prove to be more salient (Ravenelle 2019).

To understand how live streaming might offer a means to resist or even reprogram the corporate panopticon, we begin by exploring the underestimated power that modern creative laborers have to influence networked platforms. Then we contextualize their clout by revisiting the strategies used by wandering women in the eighteenth and nineteenth centuries to mobilize and organize for their rights: coopting the intertwined infrastructures of the cinema and the railway. Tracing the parallels between the cultural revolution of the industrial age and the challenges to platform capitalism that modern marginalized streamers raise, we demonstrate how personal surveillance has been repurposed as a progressive means to spark a twentyfirst-century wave of societal change. Finally, by detailing the emergent values that unite a globally distributed network of inclusive streamers (i.e., women, people of color, LGBTQIA+, disabled folks, and their allies) who are collectively transforming both our society and the social media platforms that pervade it, we conclude with a reasonably optimistic imagining of our future that is rooted in the creative power of the present.

By revisiting the progress from the past, we find both evidence and inspiration. The protagonists of Jonathan Larson's (1996) *Rent*—a late-twentieth-century musical about struggling queer artists in the Lower East Side of New York City during the height of the HIV/AIDS epidemic—help us to envision how marginalized performers might use their talent to coopt technological platforms and share transformative perspectives with the broader public. Yet it is illustrative to remember that the cyberpunk aspirations articulated by Angel during the number known as "La Vie Bohème" owe their origins to Giacomo Puccini's *La Bohème*—a nineteenth-century Italian opera about wandering artists living nontraditional lifestyles in Paris—and in this chapter, we will shine a light on that long history of creative resistance.

The Countervailing Force of Creative Communities

Although ghost workers and gig laborers are in danger of becoming a newly exploitable underclass, the experiences of those who make a living as content creators on platforms like Amazon's Twitch, Facebook's Instagram, and Google's YouTube present a less darkly deterministic fate. In his study of video creators who earn money through YouTube, Postigo (2014) highlights the ways in which the platform simultaneously exploits and empowers the artists whom it relies on to create the type of content that attracts viewers. He concludes that creative user-generated content platforms like YouTube cannot accurately be conceived of as solely extractive in nature. Nor, however, are they purely generative infrastructures that are beneficial to the workers and their communities.

Taylor's work tracing the rise of live streaming reinforces these findings by emphasizing the growing cultural significance of the medium. Her research shows that streamers who make a living by broadcasting their video gameplay on Twitch have been increasingly able to exert some influence on the policies and practices of the platform (Taylor 2018). By positioning their work as entertainment and likening their labor to that of filmmakers, actors, and musicians, content creators on networked platforms are able to use their artistic talent as leverage to negotiate better economic and material conditions in their digital workplaces.

It is clear, then, that not all networked platforms enact surveillance capitalism in the same way. While ghost workers and gig laborers are rendered invisible and interchangeable, depersonalized and often dehumanized, content creators are afforded visibility and assigned value for their unique creative talents, with those who attract large audiences often being positioned as the faces of a platform. That is not to say that content creators are immune to the economic precarity and absence of workplace protections that other gig workers endure; they certainly are confronted with similarly challenging conditions (Panneton 2020). Instead, I mean to draw attention to the ways in which the creative labor that drives certain types of networked platforms can act as a countervailing force against the oppressive power of surveillance capitalism.

Although strategically delegating responsibility and relinquishing limited control to gig workers is one of the distinctive ways that platforms expand

their power (Vallas and Schor 2020), it is this very innovation of platform capitalism that may prove to be its own undoing. Many tech companies seek to "disrupt" an existing market by challenging established labor laws or standard economic practices, but the infrastructure and policies that they develop to do so vary greatly. This is because the precise form that a particular digital panopticon takes depends on the type of labor that it is designed to extract. Amazon constantly surveils its warehouse workers and delivery drivers, subjecting them to intense levels of algorithmic pressure and tightly controlling their labor process in order to fulfill its promise of one-day shipping to Prime customers. By comparison, streamers broadcasting on its Twitch platform are afforded much greater latitude in their work, never being forced to meet a quota.

Live streaming seeks to compete with more established forms of big-budget entertainment media by offering a new type of interactive audience experience to viewers and strategically off-loading the complexities and costs of its production to independent creative laborers. In an effort to attract the roster of celebrity talent that such a business model requires, platforms like Twitch cede an extraordinary amount of aesthetic, economic, and regulatory control to the streamers, betting that their avant garde content will also generate significant revenue. I argue that this seemingly minor mutation of networked platforms actually represents an evolutionary leap for civic life—one poised to upend surveillance capitalism as we know it.

The Industrial Infrastructure of Cultural Revolution

The proposal that a new type of media and its attendant technological infrastructure might have a transformative effect on society is not an entirely radical one, as it has already happened before, during the Industrial Revolution, the period to which platform capitalism is said to be a return. Like the modernization of the digital age, the Industrial Revolution unfolded in phases, beginning with a period of rapid urbanization in the mid-eighteenth to the mid-nineteenth centuries that resulted in former agricultural laborers from distant communities becoming concentrated in factory-laden cities. Scott's high-modernist critique, *Seeing Like a State*, traces the schemes of governmental control that shaped these new urban centers emerging across Europe and North America (Scott 1999). He describes the ways in which

city grids and central planning were used to subject citizens to a type of "panoptic legibility" that allowed states to more easily control their populations and exploit their resources (Brewer and Dourish 2008).

Despite the abstraction, dislocation, and depersonalization that these new city grids were designed to foster, urban wanderers in Paris, known as *flâneurs*, transgressed their intended purpose by solitarily strolling the streets and taking in the sights of the late nineteenth century to create personalized aesthetic experiences (Benjamin 1999). This unanticipated perspective of the gentleman walker offered a new form of "local legibility" that was so potent that some rulers feared that it would lead to sedition, but given that this privilege to move unencumbered and unaccompanied through the urban landscape was only afforded to well-off white men of the time, early *flânerie* unsurprisingly failed to incite a grand social revolution (Buck-Morss 1986). It did, however, open a new avenue for resistance which would shape the second phase of the Industrial Age.

From the late nineteenth to the early twentieth centuries, cities transformed themselves from isolated islands of gaslit urbanity to the bustling interconnected electrified metropolises that we recognize today. But among all the wonders of this age, it was the twin innovations of the moving picture and the locomotive that fundamentally altered the social mobility of more marginalized members of society. With the introduction of movie theaters into the arcades of Naples, women, who previously were not permitted to wander the city alone, suddenly had a legitimizing purpose to venture out on their own: taking in the sights at the cinema. Not only did they gather together in the public forums of their day to watch the first films, women were also among the first creators of silent motion pictures, many of which replicated the experience of traveling the world by rail (Bruno 1992). These well-heeled Neapolitan *flâneuses* repurposed this panoptic innovation to lay claim to the wandering gaze and panoramic perspective that had previously been the exclusive domain of men.

Early cinema legitimized the presence of select unaccompanied women in urban spaces, affording them new avenues of social mobility and cultural access. However, poor, unhoused, and LGBTQIA+ women of the time still struggled to move about freely, and safely, in society. In an act of rebellion against oppressive urban scrutiny, some of them donned traditionally masculine attire and sneaked aboard the frequently departing freight trains that hauled resources in and out of the cities. Passing as "tramps and hobos"

(itinerant unhoused male laborers seeking work), these marginalized women rode the newly laid rails as stowaways, experiencing their own personal moving pictures framed by the windows of boxcars (Cresswell 1999). Even though their aesthetic journeys could be profoundly liberating, they often paid a high price for that freedom, enduring discrimination, harassment, and sexual assault from fellow travelers and employers alike.

Although the Industrial Age was fraught with exploitation, it was also a time of technologically fueled cultural mobility. By coopting theaters and trains, women of the Industrial Revolution were able to repurpose the capitalist infrastructures designed for panoptic legibility, to redirect society's gaze and gain greater access to the public sphere. Meaningful participation in civic life requires members of society to both see and be seen by others, to listen to and be heard by them. Women, who were previously confined to the domestic sphere to conduct the free labor of maintaining a household for factory-working men, achieved a level of public visibility that was so powerful that they were able to mobilize and organize the suffrage movement, securing their right to vote in many nations around the world by the early- to mid-twentieth century.

The Emergence of the (Re)programmable Panopticon

Together, the motion picture and the locomotive afforded unprecedented, unanticipated cultural and geographic mobility for women of the Industrial Age. These new technologies presented a hackable infrastructure that marginalized members of society could repurpose for their own ends, ones that stood in direct opposition to the logic of state control at the time that would have had them tucked quietly away in their domestic kitchens. Just like its industrial predecessor, the age of platform capitalism offers its own innovative frameworks of panoptic control, which in turn provide new opportunities for transgression. As we have seen earlier, creative labor and geosocial mobility often act as countervailing forces that push back against the pervasive control of states and corporations. Platforms designed to support live streaming inadvertently foster a particularly potent convergence of these ingredients for insurgence in their effort to capitalize on interactive entertainment. To understand why this type of panopticon is particularly "reprogrammable," we should first examine the mechanisms by which live streaming platforms oversee, extract, and profit from this novel form of entertainment labor.

Networked platforms that feature creative products typically use the promise of a revenue-sharing model to entice independent artists to begin producing unpaid work for them. Generally, creators must reach a certain threshold of popularity (usually expressed in terms of viewers) for their work to be eligible for monetization, and unless they reach the point of becoming a partner on the platform, they are not compensated for their contributions. Early video-sharing services like YouTube combined user surveillance logics with broadcast television models and began generating much of their revenue through targeted advertising shown to viewers before they watched any of the independently created content on the site. Although only partnered creators could earn a percentage of that revenue, the more viewers their videos drew, the more ad money they received.

With the introduction of live streaming platforms designed specifically for the medium (like Twitch, Mixer, etc.), and later for existing video services (like YouTube and Facebook), a more complex patchwork of revenue generation followed, one modeled on older economic frameworks for supporting the arts, like patronage and busking. While partnered streamers receive some income from interstitial advertising, typically the bulk of their earnings come from a cut of the subscription fees and donations that viewers opt to pay through the platform to support them as content creators. The innovation of economic extraction that live streaming platforms seized upon was the opportunity to delegate to independent laborers not only the responsibility of creating an artistic product and cultivating an audience for it, but also the work of convincing those viewers to become paying subscribers.

The relational labor that artists perform to earn a living can create powerful affective ties with their audience (Baym 2018); seeking to capture and capitalize on this emotional energy (Partin 2020), live streaming platforms intentionally foster a direct connection between creators and viewers in a way that distinguishes them from other gig economy services. Most modern platforms use technology to mediate the experience between laborer and user in a way that often creates social distance between the individuals involved in a given interaction. Uber drivers, DoorDash deliverers, and TaskRabbit handypeople are all rendered interchangeable to their customers and interacting with them is largely impersonal. In these cases, users are not afforded the choice to support their favorite gig worker through the interface; instead, the platforms effectively erase the individuality of their laborers by structurally discouraging human connections with them. Live

streaming services take a much different approach, embracing the uniqueness of their creators and their ability to cultivate meaningful relationships that raise material support, because they seek to profit from those talents.

Placing real-time human connections at the center of an economic engine requires the building of infrastructure to facilitate interpersonal interaction on a massive scale. At the same time, owing to the unpredictable nature of artistic popularity, live streaming platforms are often designed with low barriers to entry to encourage the experimentation and exploration that will generate new entertainment stars. As a result, visitors to Twitch's front page are immediately dropped into an active live stream, and everyone who signs up for an account can participate in streams as a chatter, fund their favorites, or start curating their own channel. At any given moment, over 100,000 streamers are broadcasting live feeds of themselves and their surroundings, while millions of viewers wander in and out of their curated virtual spaces, engaging in conversations with folks from across the world, and occasionally throwing a bit of cash to their hosts. While streaming on its surface may appear to be an innovative form of mass surveillance, a clever way of tricking millions of people into submitting to the panoptic gaze, most live streaming services, though it may sound counterintuitive, impose far less oversight than other networked platforms.

Amazon as a singular, yet massive, corporation creates an overarching panoptic view of the world through a variety of video surveillance networks, some of which it exercises much more control over than others. The driverfacing dash cameras that Amazon installs in delivery vehicles give workers no choice but to submit to their monitoring and respond to their performance demands. Similarly, their street-facing Ring doorbell cameras, although installed by homeowners, give passersby little say in the matter of whether they are being recorded and how that video may be used. The majority of networked platforms enact this nonconsensual form of surveillance—one that comes from without and above, to influence the behavior of workers and users. But streamers on Amazon's Twitch platform are never forced to go live: they make the explicit choice to turn their cameras on; and in deciding what the world gets to see, they each invert the panoptic gaze by broadcasting their own curated views in a kaleidoscope of personalized perspectives from the ground. By relinquishing creative control of the cameras to the streamers and encouraging them to engage in emotional labor with a global community to earn their economic support, live streaming

platforms have given rise to a new mode of collective storytelling and civic engagement that is inadvertently affording geosocial mobility to marginalized folks on a previously unprecedented scale. Today, in the twenty-first century, women, people of color, LGBTQIA+, and disabled streamers are able to see and be seen by the world, and they are using the opportunity to project a radically new vision of reality.

Performing the Art of Personal Surveillance

Since 2017, I have been exploring how marginalized streamers use Twitch to create comfortable spaces for their communities. Over the course of this ongoing ethnographic study, I have observed thousands of hours of live broadcasts and interviewed women, people of color, LGBTQIA+, and disabled streamers, as well as their allies, in an effort to understand how they manage to foster safe and inclusive environments in the notoriously toxic landscape of online gaming. When I first began this research, the most striking thing I noted was that most of the welcoming communities I encountered lay outside the mainstream categories of current popular esports games like *Call of Duty, Fortnite*, and *League of Legends*. Instead, many of the marginalized streamers whom I found myself watching were focused on a very specific form of gameplay: speedrunning.

Speedrunners reimagine the obstacles in video games to find entirely unexpected pathways through levels, and by transgressing the intentions of the developers, they manage to create breathtaking journeys through virtual worlds and beat beloved titles at breakneck paces. Like the *flâneurs* of the early Industrial Age, who found unanticipated ways to traverse urban grids, speedrunners practice a form of in-game mobility that affords them a unique perspective that challenges powerful norms. And just as city life evolved when the cinema opened up the opportunity for strolling to a whole new class of people, speedrunning transformed from a solitary experience into a community endeavor when folks began live streaming their record-breaking achievements (for more information, see chapter 19).

When brought together through the new medium, speedrunners who had previously been outliers in the gaming community, typically grinding out runs at home for hundreds of hours in isolation, suddenly found themselves virtually accompanied by peers and fans alike, cheering them on during their real-time attempts. With their newfound visibility, many

speedrunners, particularly LGBTQIA+ folks who had left mainstream esports spaces after facing harassment or discrimination, decided to use the drawing power of their seemingly superhuman gaming abilities to intentionally cultivate inclusive spaces online and in real life (IRL) that explicitly welcomed marginalized folks. The former community manager of Twitch, Jared Rae, once said: "What speedrunning on Twitch does, and what watching these types of events live does, is it humanizes inhuman abilities. Because it's not just about watching this flawless run anymore, it's about going on the journey towards it with this player" (Webster 2013). Some queer speedrunners and trans speedrunners choose to use the platform not just to take viewers on in-game journeys, but also to offer a first-person perspective of what it's like to be an LGBTQIA+ gamer navigating the real world. By providing visible representation, these highly skilled players humanize not only their incredible gaming ability, but also their marginalized identities.

After a year of studying the ways in which speedrunners were fostering inclusivity in their Twitch streams, it became apparent that this specialized subcommunity was not the only one concerned with broadcasting a more welcoming message on the medium. Tracing the networks of moderators, subscribers, and chatters that move among these "comfy" streams, and following the chain of streamer referrals from the first speedrunners I spoke with, revealed a surprisingly wide range of marginalized creative performers using the platform to cultivate inclusive spaces while entertaining their audiences. Through my research, I encountered casual players and variety casters who chat with their viewers while meandering through whatever game world they feel like exploring; musicians hosting interactive concerts, taking audience requests, or composing on the fly; artists revealing the details of how they create intricate paintings, drawings, or sculptures; crafters, chefs, and makers who give tips to their chats while they sew, knit, cook, saw, or solder; cosplayers who transform themselves into beloved game characters before viewers' eyes; travel and IRL streamers who offer a firstperson perspective walking through the streets of a foreign country, delivering Uber Eats on a bike, or raising animals on a farm; and activists, journalists, and educators who talk their audiences through breaking news, scientific research, or historical reviews.

Creative laborers representing remarkably different disciplines and personal identities are using the same platform to bring visibility to their unique experiences, while building welcoming communities that provide material

support for not only themselves, but also others in need. Marginalized members of society like women, people of color, LGBTQIA+, and disabled folks are choosing to turn a camera on themselves, often in highly personal spaces like their bedrooms or private workshops (Ruberg and Lark 2020), and asking viewers to join them in cultivating a cozy atmosphere of community-funded creative exploration. Every individual is motivated to go live for a different reason, but for those who have faced systemic discrimination or frequent harassment, the choice to show themselves to anyone on the internet and invite strangers in for conversation represents a brave and defiant act. Just like their industrial predecessors who rode the rails and created the first films, these modern pathbreakers enter the public fray and redirect the panoptic gaze in order to seize new opportunities previously out of reach. And although each marginalized streamer's journey is unique, many find themselves united by their shared drive to manifest a new version of reality—one in which folks like them are truly seen and actually heard, one where they can more meaningfully participate in both the online and offline worlds.

Revolutionary Values to (Go) Live By

As people from across the globe congregate in shared virtual spaces and contribute to the new emote-rich way of communicating on the platform (see chapter 16), I would argue that live streaming infrastructure is giving rise to a new form of glocal legibility that renders individuals from disparate cultures more accessible and understandable to one another through the continual construction of a shared platform patois. And as women, people of color, LGBTQIA+, and disabled folks add their unique perspectives to the evolving aesthetic language of Twitch, they often find themselves building common ground while they labor to collectively curate an immersive tapestry of experiences for a shared audience of supporters. The same system of control that allows a massive corporation to profit from the talents of independent artists also creates mutual visibility and material connection between the struggles of a trans woman speedrunning in rural Minnesota, the challenges of a Black tabletop role-playing game (TTRPG) player from Atlanta, and the hurdles faced by a mixed-race couple in Thailand as they all try to move safely through the world and earn a living. One radically unintended side effect of building a digital panopticon that exploits creative, affective labor while incentivizing a crowdfunded, mutual aid economic

model, then, appears to be the fostering of intersectional solidarity among previously disconnected communities.

By immersing myself in the multitudinous perspectives of the marginalized laborers cultivating comfy channels, I was able to see that the growth of inclusivity on Twitch is a completely decentralized movement that is nonetheless driven by a grassroots patchwork of streamers and viewers who are using the affordances of the platform to advance a similar set of values. This "comfy code" is made visible through the customizable aspects of the broadcast infrastructure and the collective actions of community members, and it offers a preview of how the live streaming panopticon can be reprogrammed. In the remainder of this chapter, we will briefly examine the tenets of the comfy code to highlight how they might offer a scaffold for sweeping social change.

The foremost value of the comfy code is the commitment to *be genuine and honest*. Members of inclusive stream communities believe that it is important to express who you really are and represent your identity by making yourself visible. This raw honesty is supported, and even incentivized, by the nature of the medium; indeed, one streamer I interviewed was emphatic about the distinctive power of unfiltered live interaction, saying, "People here want genuine connection. That's why we're all on Twitch. If we didn't, we'd be watching YouTube." Others I spoke with recounted that their choice to be more vulnerable and open with viewers acted as a catalyst for their community's growth. Engaging in this highly transparent form of relational labor not only attracts an audience, it also encourages affective ties and builds solidarity between workers and the public.

Streamers are keenly aware that as hosts, they set the tone for their space by how they act, and so marginalized creators often consciously *lead by example*. One spelled this out as follows: "I can't enforce respect. I can't enforce conduct. If you try, that's gonna fail. But, I try to encourage people, and lead by example rather than decree." Inclusive streamers model the behaviors that they want to see in the world; and when they notice a self-starting member of the audience pick up the mantle and do the right thing on their own, they typically tap those viewers to become their chat moderators (Seering, Wang, Yoon, and Kaufman 2019; Cullen and Kairam 2022). As streamers project their perspectives into the world, like-minded individuals are attracted to their curated spaces. And when some take on the work of community moderation to help perpetuate their shared vision, they find

themselves developing novel systems of governance to regulate access to and speech within these new virtual agoras (Arendt 1959; Habermas 1989; Harney and Moten 2013).

Their emphasis on forging alliances means that marginalized creators collaborate before competing. Inclusive streamers generally believe that they are in it together and a rising tide lifts all boats. Rather than attempting to steal viewers from one another, they are more likely to share their audiences by "shouting out" (promoting) their fellow streamers in chats. Surprisingly, the speedrunners I've spoken to are among the most ardent supporters of collaboration in the inclusive movement, with one stressing to me that the most important takeaway from our interview ought to be: "The way a community speedruns a game is not to see who can have the fastest time, but to see how fast the game can go. Speedrunning is a communal effort." In other words, even though speedrunners are constantly trying to improve their personal records, they aren't trying to beat one another. They are attempting to collectively reach for a new achievement by pushing the known limits of a game. Such a turn from individualism to collectivism stands in stark contrast to capitalist values, and yet it is borne from engagement within the confines of the platform itself.

In fact, much of what binds comfy communities together is the way they create and share knowledge, whether about game-breaking tactics or just generally about life itself. Many of my participants described how they intentionally try to teach their viewers, both about the subject matter of creative content they produce and their personal identities. And at the same time, these streamers told me how much they enjoy being educated by their audiences. Summing this up nicely, one related: "I'm having the most fun when I'm learning from the chat about something. And for some people, the most impressive thing about my stream is that I can explain abstract queerness versus sexuality and gender queerness while playing a really hard Mario level." Inclusive streams on Twitch have become rich spaces for cultural exchange and communal education that reach across geosocial boundaries, erecting bridges over the entrenched societal divisions that are the legacies of centuries of state control.

Finally, and most crucially, inclusive streamers not only share information with one another, they also *pass on privilege*. These creative laborers often financially support their peers by subscribing to their streams and sending one another donations. In addition, they help streamers who are just

starting out by using raids and hosts that boost the visibility of their budding channels. One of my participants described their motivation by saying: "I think it's important to spread the love and share viewers with people. I look for people who are on the cusp of having above-average viewership to host so they can be closer to hitting their goals." This grassroots tactic for building viewership ratings is radically different from the strategies of NBC or Netflix, and yet the features of Twitch's platform were specifically designed to support it. By using the affordances of the system, by playing the game of Twitch as it asks to be played, marginalized folks are redistributing power and influence according to new community-based logics.

The five tenets of this comfy code were developed within the language of live streaming on Twitch, under the watchful eye of the digital panopticon, and yet they represent a profound departure from the prevailing logic of surveillance capitalism. Historically, as new structures of control are advanced by powerful nation-states and massive corporations, marginalized members of society have channeled their collective creative labor through the affordances of the infrastructure designed to dominate them in order to catalyze waves of social change. They do so by repurposing panoptic innovations to project their own visions for a better, more inclusive reality out into the world—by defiantly making themselves visible and vulnerable as they demonstrate new ways of seeing and being in society. Tracing the emergence and ongoing spread of the comfy code on Twitch, I offer that we may be witnessing the first signs of the revolutionary reprogramming of a twenty-first-century capitalist platform.

Streaming toward the Point of Inflection

Throughout this volume, we have seen exciting evidence of the ways in which live streaming is having truly transformative effects on our culture, and in many cases, these are examples of how the comfy code executes itself. For example, despite their precarious economic status, creative laborers on Twitch, like the speedrunners of Games Done Quick (GDQ), have used the platform to raise millions upon millions of dollars for charity, often directing that aid to organizations that serve marginalized members of their communities. Further, through collective action, streamers have pushed the platform to make tangible changes to its infrastructure that increase the ability for marginalized folks to see and be seen by one another; and after

an intense community campaign that included the building of the alternative architecture Peer2Peer.Live, Twitch relented to the demand for change and finally added identity-based tagging to its discovery engine. Women, people of color, LGBTQIA+, and disabled folks are coopting and cooperating this supposed surveillance apparatus to redirect society's gaze. Most recently, as Black Lives Matter protests erupted in a world that was entering a pandemic lockdown, we witnessed marginalized streamers and their allies redirecting the focus of their cameras to give millions of people miles away unprecedented abilities to connect in real time with grassroots resistance on the ground. Watching such creative reprogramming of the platform, we begin to see how live streaming echoes evolutions of the past, while offering a way to collectively visualize a more equitable networked future.

Social media, gig work, and big data, once the buzzwords of an egalitarian technoutopia, now evoke fears of subjugation, exploitation, and technocratic authoritarianism. Networked platforms mediate countless human interactions each day. From hailing a ride, to completing a chore, to having a night out, to taking a vacation, to finding food to eat, massive corporations increasingly vie to oversee and commodify each step that we take through our days. While it could easily seem inevitable that their all-seeing eyes will gain complete control over our choices, the introduction of live streaming into the online ecosystem has served as a potent injection of potential hope. Inclusive streamers are providing a wake-up call for those lulled into complacency by the corporate panopticon. By demonstrating how they enact alternative logics of community and care through the very machinery designed to exploit them, creative laborers have found a way to reprogram The Matrix from within. Rather than a singularity, we may be racing toward a more perfect plurality, and I for one cannot wait to see what we can do now that the world's gone live.

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