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MOBILE MEDIA DURING THE PANDEMIC: FOUR SCENARIOS TO HELP US IMAGINE A MOBILE MEDIA FUTURE TOWARDS LIBERATION

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Together, our projects pose the question of *what else can be possible* as a way to rearrange the power relations that have contributed to the asymmetric flows of information and resources to some instead of others. We are inspired by indigenous scholars' claim that "decolonization is not a metaphor" because liberation should not be a metaphor: it should be a possibility (Tuck & Yang, 2012).

We, panelists, hope to engage conversations that address the future of the internet, especially the future of mobile communication with the lessons learned from our studies. It is in the future that we have the possibility for change. In this panel, we examine how mobile media is being used in conjunction with governments, social media, privileged classes, and geographic information systems to better understand how we can imagine a future of mobile media uses in which there can be agency that is constituted in communities' cultural and situated practices. There seems to be two popular lines of

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thought with mobile media: they are either very good because they serve as “life-lines,” or they are dangerous because of privacy and tracking issues. Nonetheless, mobile media, especially mobile phones, and networked communication have diffused across the globe, following the trajectory of the internet. Thus, any effort to decolonize the internet would require a careful analysis of mobile media uses to understand the complexity of power relations and cultural representations at play.

We offer a close reading of four distinct scenarios: in South Korea among residents whose locative data tell a story about their comings and goings, among International Exchange Students social media use during the on-set of travel bans, in China among rural-to-urban female migrant workers use of mobile phones, and in Brazil among those who used the *Unified Slum Dashboard* to called attention for proper government intervention. In each scenario, there is an emergence of the two popular lines of thought, but the presenters add nuance by showing how there can be a middle ground, or something else outside of this dichotomy.

The first presenters discuss how data-traces speak for subalterns. Xiong-Gum & Lee use a framework that compares western thoughts on stigma and the non-western idea of “loss of face” to ground our findings. With rigid COVID-19 protocols in place as the context in South Korea, residents, especially those who do not conform to heteronormativity, are not necessarily free to assembly because geolocation data retrieved from mobile phones can be used to “speak for them when they are not yet ready to speak.” These findings complicate the progress narrative of digital inclusion, because in some cases, it is digital inclusion that replicates the older systems of cultural hegemony.

The second presenters illuminate the blurriness of the center-and-margin rhetoric, as they analyze the social media posts of Chinese International Students (CIS) who must return to their “homeland” because of COVID-19 travel mandates. Their findings give researchers real-time accounts of the loneliness and limbo experienced as CIS are not welcomed in either their home country or their host country. He & Zhang conclude that CIS are “characterized as the motherland’s burden,” but that CIS content has created an affective economy of sympathy for CIS outside of the homeland and motherland dichotomy. In this case, internet relations make it possible to create other spaces of belonging.

The third presenter draws attention to the constraints that rural-to-urban migrant women face during China’s COVID-19 lockdown. Wallis builds on studies that have identified that many who live socially isolated lives use their mobile phones to expand and enrich their social networks. Wallis adds that something different is happening during this on-going pandemic and finds that the mobile phone is what pressed this population to return to being mobile when mobility was discouraged. Although mobility may have been desirable before, mobility during the pandemic places this population at risk to exposure and exploitation. Wallis concludes that mobile media and being connected has a dual logical.

Lastly, the fourth presenter analyzes the *Unified Slums Dashboard* is an example of how a network of grass roots organizations can make a difference in mapping the

unmapped, that is, giving visibility to COVID-19 cases and deaths that would normally remain undetected. de Souza e Silva's case study findings describe how a grass-roots public mapping project that emerged from a network of favelas in Rio de Janeiro (Brazil) helped people in more than 300 low-income communities manage the pandemic and gain visibility outside the territories of the slums.

de Souza e Silva's finding offers hope for how mobile media can be used to support communities and circles back to complicate the role for data-tracing (as discussed with Xiong-Gum & Lee) and support a role for user-generated cultural content (as discussed with He & Zhang), all of which addresses the continuum within the dual logic of mobile media use (as discussed with Wallis). The internet and mobile media already have affordances and consequences that can be appropriated for the betterment of communities. As such, our findings share a common theme that mobile media simultaneously can liberate and complicate our mobility choices, especially during a global pandemic, but that liberation can be possible through more careful policies that take minoritized experiences into consideration for future policies.

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COMPLICATING THE PROGRESSIVE RHETORIC OF DIGITAL INCLUSION: THE CASE OF SOUTH KOREA AND DATA-TRACES OBTAINED FROM MOBILE MEDIA DATA

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Since the 1960s, South Korea's economy has grown to become ranked twelfth in the world, according to the World Bank (2021), and South Korea's research and development is ranked second in the world, according to the Bloomberg 2020 Innovation Index (Dayton, 2020). This is quite a significant turn considering that the Korean War took place from 1950 to 1953. And prior to this, South Korea had been mostly an agrarian-based Japanese colony. Nonetheless, South Korea has largely improved its overall standards of living in part due to their openness to international trading, and their efforts in developing information communication technologies. This later effort is part of South Korean's digital inclusion initiative, which happens to create the conditions that made their COVID-19 and mobile communication strategy so culturally effective, yet also culturally intrusive.

Digital inclusion has been a global mission envisioning worldwide accessibility to digital technologies that enhances social development and economic growth. Digital inclusion refers to the conditions that are necessary to ensure that all individuals and communities, especially the most disadvantaged individuals, have access to the use of digital media. These technologies include the internet, telecommunications, digital media such as software, and mobile communication devices. Thus, the rhetoric of digital inclusion is rooted in a westernized developmental progress narrative. Through the diffusion of digital media access and engagement, lives are meant to be better overall, and the nation would increase development; however, with the introduction of any new technology, there emerges new arrangements for social, regardless of its well-intentions.

While critics have not identified digital inclusion in a negative light, studies have surfaced around the privacy and surveillance issues that emerged alongside critical adoption and use of digital media (Aouragh & Chakravartty, 2016; Jung et al., 2020). For example, in a report from the Carnegie Endowment for International Peace, Kavanagh (2019) explains that digital inclusion efforts have well-intentioned promises for social and economic benefits, efficiency, and enhanced productivity across various sectors of society and government. However, Kavanagh cautions, "The technologies are mostly dual use, in that they can be used as much to serve malicious or lethal purposes as they can be harnessed to enhance social and economic development…" As such, our primary goal in this study is not to make any value claims about digital inclusion; instead, our goal is to describe how digital inclusion alters people's relationship to information and to each other, and how this might be exacerbated when people are asked to engage with mobile media and networked information *without the*

option to opt out. In this case, mobile media travels with the body and leaves geographical information about the person's physical locations.

We investigate the dynamic among digital inclusion, mobile media, and data-traces because the United Nations Human Rights Council has expressed that the rights to *privacy in the digital age* and other human rights related to privacy norms and the freedoms of expression, speech, and assembly apply online as much as they do offline (General Assembly, 2014). Therefore, this presentation invites attendees to consider and discuss how we might design digital inclusion policies that allow people to opt out without being placed on the other side of the digital divide. Our position is that decolonizing the internet does not mean abstaining from the internet; rather, we ask, what if decolonizing the internet could involve engagement with respect to cultural agency.

In this study, we discuss both the consequences and affordances of digital inclusion and mobile media to build on to two key scholarly conversations that concern the affordances of digital inclusion and the privacy issues of mobile media use. We contribute the idea that there are privacy issues related to digital inclusion: this complicates the on-going rhetoric on digital inclusion's progressive narrative. Using interview data collected in the Itaewon Providence in Seoul, South Korea during the first year of the COVID-19 pandemic, in 2020, we interrogate how digital inclusion might lead users into experiencing unexpected exclusion or unanticipated instances of public exposure of private information.

We ground our analysis in a framework that combines Erving Goffman's (1963) western insights on stigma with the non-western notion of "losing face" (Kim & Yon, 2019). Digital inclusion, particularly mobile media use, can change a person's social status because it involves the de facto production of legible data-traces. Goffman (1963) has argued that people strategically share information about themselves as a way to control how they present themselves to the public and to shape the public's perception of them. Thus, we argue that digital inclusion, especially in the context of South Korea's COVID-19 public health protocols, can lead people into experiencing unexpected exclusion or unanticipated instances of public exposure of private information.

In light of the 2015 MERS pandemic, South Korea had instituted a special law that would only come into effect in the event of a public health crisis: Articles 76-2(1) and 76-2(2) of the Infectious Disease Control and Prevention Act. This allows the Health Minister and the Director of the Center for Disease Control to require disclosure of positive COVID-19 test results and grant the Minister of Health the authority to collect private digital data, without a warrant, from people who were identified as close contacts.

Our findings suggest that some people would rather not have others know about their whereabouts or who they associate with, but their data-traces speak for them. Data-traces then become a colonizing language that diminishes a person's capacity to live and associate freely, as private lives can potentially become public. For example, pairing credit card data with mobile phone data can render a well-defined history of a person's everyday movements, especially if there is locative data from mobile phone

use and surveillance cameras to verify both the whereabouts of the person. For this reason, people who attended “gay clubs” were unexpectedly “outed.” This resulted in the loss of their reputations, of face, in a culture that values “face” and is still largely weary of non-heterosexuality. The data-traces speak when the subaltern is not quite ready to speak. This has consequences for privacy and personal agency and complicates the progressive rhetoric of digital inclusion. Unlike other scholars who have theorized about decolonizing the mind (wa Thiong’o, 1981), we have yet to imagine ways to decolonize the language that is composed of data-traces.

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THE MOTHERLAND'S BURDEN: CHINESE INTERNATIONAL STUDENTS' DIFFICULT JOURNEY TO HOME DURING THE COVID-19 PANDEMIC

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Since the global outbreak of Covid-19, massive Chinese students who had been studying abroad returned to China. In contrast to the spiking number of cases and anti-mask rallies in students' host countries, China is perceived as a safer place after implementing a "cruel but effective" lockdown policy (Graham-Harrison & Guo, 2020). Yet their return journeys are marked by physical immobility. Currently, students must secure overly priced flight tickets as inbound international flights are severely cut under Five-One Policy (Han et al., 2021). To board the plane, they need to upload to a WeChat-based program negative PCR and serology antibody test results within 48 hours of departure and obtain a green QR code once the local consulates approve their submitted certificates. Once in China, they receive tests at the airports and are dispatched to hotels for collective quarantines of at least 14 days.

Returning students also confront symbolic immobility (Smets, 2019). The general antipathy to returning students saw the birth of what we call the "poison discourse." It depicts returning students as coronavirus carriers and accuses them as selfish opportunists who think of their motherland only when their beloved host countries cannot protect them anymore. They are criticized for endangering China's hard-won accomplishment in its battle against Covid-19. In turn, they are characterized as "the motherland's" burdens.

This study explores how Chinese International students who return to their homeland during Covid-19, use the social media platform *Douyin* to create opportunities for others to witness and garner empathy of their immobility. Using content analysis, drawing on 36 posts that students made and shared on Douyin, we examine how students react to such imposed immobility and positions as burdens on the motherland within their social media posts about their difficult journeys. In addition to providing verbal accounts of their experienced immobility, students take the full potential of Douyin as a multimedia content platform by making and sharing their fear, gratitude and confidence when trapped in such unprecedented historical situations. This, in turn, illuminates the complicated notion of center and periphery that international students experience. When we think of colonial relations, we tend to easily inscribe people into center and periphery positions, when the reality of mobile people, such as international students, who occupy multiple social spaces complicate the motherland and host-country rhetoric.

Our finding suggests, the performance of these emotions displayed through Douyin creates spaces for domestic audience to imagine students' physical immobility through their own senses, to witness their symbolic immobility at the comment section, and to

identify with their emotions, and with the Chinese international student as one of “us,” instead of a threatening “them.”

To collect data from Douyin, a popular short-video platform in China (Chen et al., 2021) where returning students’ posts about their return journeys are numerous and rapidly increasing, we manually searched the self-representational videos of returning Chinese students using three search terms: “留学生” (international student), “疫情” (Covid-19) and “回国” (return). In total, we gathered 36 posts including both the videos and the comments. The sampled videos were uploaded from March 2020 to July 2021. In these videos, students make and share their journeys back to China from North America, Europe, Australasia and Asia. Existing research on Chinese international students’ digital storytelling during Covid-19 tends to focus on their opinions (Xu & Zhao, 2021), yet little is known about their real-life (im)mobility challenges and their manifestation and sharing of emotions. Our analysis, therefore, at the crossroads of (im)mobility, mobile media, and emotion, focuses on these affective performances and their potential effects on the general reception of returning students and the affective economy that emerges around so-called “motherland relations.”

Three interrelated emotions stand out in the Douyin posts that students make and share. First, using screenshots of coronavirus trackers, videos of unmasked pedestrians, helpless emojis and gloomy music, students demonstrate intense fear staying in the host countries, where the number of cases spike and various local gatherings including anti-mask rallies suggest the continuation and worsening of the local epidemic in the future. Second, students highlight their gratitude to frontline workers in various parts of the video, including its title and description. By showing footage of them getting along with frontline workers, whom they praise and thank using voiceover, students undercut the misrepresented tension they have with the homeland public health system. Third, the posts showcase students’ emotional attachment to China. They frequently compare the effective measures and zero-in accomplishments of China with the slack measures and poorly controlled dissemination of coronavirus in their host countries. In addition to “objectively” analyzing China’s systematic advantage in the global fight with Covid-19, students display their patriotism with Chinese flag stickers, patriotic songs and straightforward praise of the power of China.

By sharing their curated performances of emotions on Douyin, students create opportunities for witness, and then empathy, from broader audiences in the Chinese mediascape. First, the video posts show students as witnesses to the difficult journey, which reveals the unique immobility structured by global societies’ reactions to Covid-19. It proves to the audience that students hold such insider knowledge because they have been there. As in the case where refugees create spaces of self-representation by sharing their testimonios online (Witteborn, 2012), the first-hand experiential knowledge shared by students holds potential to undercut impressionistic stigma transmitted by people who have never been there. Second, the sharing of such witnesses makes their audience co-witnesses to the physical and symbolic immobility students have to cope with. The multimedia accounts designed by students using materials they gathered throughout the journey make it possible for domestic audiences to feel their fear, gratitude and patriotic

love. Third, circulated on one of the most popular social media platforms in China, these posts bring attention to students' stigmatized identity, as well as the poison discourse that stigmatizes them.

Consequently, these Douyin posts serve as numerous micro-platforms where students and netizens exchange their arguments, as well as emotions, regarding students' return to their shared motherland during the global pandemic. Thanks to the various ways that students make their feelings possible to be witnessed, both students' physical and symbolic immobility become empathizable for Douyin users who never embarked on such a journey.

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FROM (IM)MOBILE MOBILITY TO MOBILE IMMOBILITY: THEORIZING MOBILE COMMUNICATION, GENDER, AND DISENFRANCHISEMENT FROM THE MARGINS

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In early January 2020, the Chinese government mandated a lockdown on the city of Wuhan, the location where what would come to be known as COVID-19 was thought to have originated. As the deadly coronavirus spread to various parts of China, other major cities, including Beijing, also experienced lockdowns. For many Chinese citizens, social media, particularly WeChat, became a lifeline – to search for information, order necessities, and seek social support (Yang, 2022; Zhong, Huang, & Liu, 2021). Although upper- and middle-class residents confined to their homes were just as likely to use a desktop or laptop computer as they were a mobile phone to access WeChat, more marginalized populations relied on mobile devices, primarily low-end smartphones to do so. As work, school, medical appointments, and other aspects of daily life moved online, those fortunate enough to be able to work or learn from home complained of challenges that have been noted globally, not only loneliness and depression (Zhong, Huang, & Liu, 2021) but also screen burnout.

However, those who are more marginalized, in particular China's rural-to-urban migrant workers, faced devastating constraints due to their social location and the timing of the initial outbreak. Many migrant workers returned to their rural homes for the annual Spring Festival celebration in late January 2020 and subsequently had to quarantine, and then were stuck in their villages. This impacted both their financial and emotional well-being (Liu, et al., 2020). Those who did not return were also positioned in a particular type of COVID-limbo due to lockdowns and the closures of places that employ large numbers of migrant workers (e.g., restaurants, small shops, construction sites, etc.), yet their voices were barely heard in Chinese popular and official media (print and digital), which instead sought to drum up nationalistic support for government containment efforts.

The various scenarios highlighted above concern China, yet they reveal how the COVID-19 pandemic has brought to the fore ongoing issues of privilege, marginalization, and disenfranchisement. They also raise new questions regarding the entanglement of mobile communication – particularly the mobile internet – immobility, and mobility as well as how smartphones enable what has been called "immobile mobility," which is defined as "a socio-techno means of surpassing spatial, temporal, physical, and structural boundaries" (Wallis, 2013, p. 6). The concept of immobile mobility emerged from research on young, rural-to-urban women working in the low-level service sector in Beijing (Wallis, 2011, 2013). The current study explores migrant workers and what I call "mobile immobility," by which I mean compelled physical movement enabled by mobile technologies that, rather than challenging structures and limits, reinforces them and makes an individual's life ever more precarious, as I elaborate below.

Due to China's *hukou*, or household registration system, rural residents who labor in China's cities and towns are treated as second-class citizens and are, for the most part,

extremely marginalized and exploited. Emerging from, and grounded in, the constraints of young migrant women's everyday lives and their own social uses of technology, *immobile mobility* through a mobile phone offered migrant women opportunities for agency and empowerment. For example, they lived very socially isolated lives and used the phone to expand and enrich their social networks. Mobile phones also enabled them to live a life outside the constraints of parents and relatives back in the village; e.g., to date freely, construct an urban identity, search for jobs, and learn new skills (Wallis, 2013). Still, immobile mobility has a dual logic because it is not a bounded phenomenon. Those who are marginalized can engage in practices that reify their own marginalization, and those in power can take advantage of immobile mobility to exploit and disempower those under their control. Other scholars who have examined the mobile communication practices of marginalized groups in and outside of China have found the concept of immobile mobility useful for analyzing the particularities of their circumstances, whether Chinese factory workers (Wang, 2016) or sojourners on the Haitian border (Horst & Taylor, 2014).

Given current political, institutional, economic, and social factors in China, including COVID-19 and the strengthening of authoritarian governance under Chinese President Xi Jinping, this paper moves beyond the concept of "immobile mobility" to examine "mobile immobility." While studies have found that young migrant women were relatively *immobile* due to their marginalized status (Wallis 2011, 2013), during the pandemic, many workers in China and elsewhere have been forced to be physically *mobile* precisely because of their marginal status. To be sure, there are privileged populations who are usually highly mobile and who have experienced unwanted physical immobility, yet their array of networked devices has meant that they can traverse this immobility in ways unavailable to others. There are also doctors, nurses, and police officers deemed "essential workers," who returned to work either voluntarily or by coercion (Fu, 2020) who were lauded in Chinese state media for their "heroism" (Sun, 2020). Others, however, such as delivery drivers and other low-wage workers, have experienced mobile immobility enabled by smartphones, and rather than gaining accolades or economic reward have instead been seen as potential "virus carriers" and have experienced illness or even death.

As an analytical concept, mobile immobility, like immobile mobility, draws attention to the constraints faced and the agency enacted by those who are less often centered in Internet studies (outside of "development communication"). The concept grounds the following questions: What practices have become articulated to mobile communication for navigating various forms of immobility and mobility in a (post)-pandemic world? How are these phenomena gendered? Does mobile immobility paradoxically open up space for agency? Although the concept of immobile mobility emerged from the position of marginalized populations, mobile immobility compelled by the global pandemic reveals multiple layers and positionalities of immobile mobility and mobile immobility that have yet to be fully explored.

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THE UNIFIED COVID-19 SLUMS DASHBOARD: HOW GRASS-ROOTS CROWDSOURCED MAPPING PRACTICES CAN HELP UNDERPRIVILEDGED POPULATIONS MANAGE A PANDEMIC

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Geographic Information Systems (GIS) maps do not only represent territories and display spatial information—they shape how we understand social connections, how we move through urban space, and how we identify resources. In addition, web-based GIS maps, particularly those built with crowdsourced user information, have the potential to decenter power relations and bring visibility to the reality of underprivileged populations. This paper describes a case study of how a grass-roots public mapping project that emerged from a network of favelas in Rio de Janeiro helped people in more than 300 low-income communities in Rio de Janeiro (Brazil) manage the pandemic and gain visibility outside the territories of the slums.

Mapping health information to understand public health crises is not new. One of the first uses of spatial visualization to map health information happened during the London cholera outbreak in the mid-19th century. British physician and epidemiologist John Snow deduced that the cholera outbreak was originating from the drinking water on a Broad Street well after plotting the location of cases on a map of London (Gordon & de Souza e Silva, 2011). Based on the visualization, Snow found out that cases were more prevalent in households that used that specific well. For over 70 years, health organizations—including the World Health Organization (WHO) and the US Center for Disease Control (CDC) have used GIS and other mapping tools to manage infectious disease outbreaks.

With the COVID-19 pandemic, many governments were quick to develop web-based dashboards with the intent to help stop the spread of the coronavirus (Collado-Borrell et al., 2020; Goggin, 2020). While the proliferation of these dashboards happened all over the world, they are particularly important in countries where the pandemic raged out of control due to the lack of governmental public health policy guidelines. Among these countries, Brazil is a significant case. The country has the second highest number of COVID-19 deaths in the world—just below the United States.

As a result of the lack of effective public health policies and appropriate federal government response to the pandemic in Brazil, many non-governmental organizations started developing dashboards to map the pandemic. This decentralized response to tracking the virus in Brazil is particularly significant because in most other national contexts, mapping efforts are initiated and coordinated by government agencies. A common characteristic of government dashboards is that they are generated by official data (Pietz et al., 2020), which is a problem in countries with severe lack of testing, as is the case of many Global South countries, like Brazil. In January 2022, for example, when the Ômicron variant of SARS-COV-2 raged the country, people were instructed not to test, unless they were experiencing severe symptoms (G1, 2022). As a result, official government dashboards display a misleading picture of how the pandemic is evolving in the country.

Even if people in favelas do get tested, official results are often plotted on dashboards outside of the favelas. Many favela residents do not have official addresses. Their system of street names and numbers does not belong to the official maps of the city. It is estimated that more than 50% of favela residential addresses do not have a zip code (Galdo, 2021). When requested for a home address, favela residents frequently give the location of a nearby store or the community center, which are often outside the geographic area of the favela. As a result, when they test positive for the virus, the case is associated with a "formal" nearby neighborhood, leading to a skewed picture of the pandemic situation in the favelas (Gracie & Scofano, 2020a).

Aware of this problem, as early as March 2020, each favela in Rio de Janeiro started to count their COVID-19 cases on their own. To collect the data, volunteer residents went from door to door asking for information about cases and deaths. They also collected this information via WhatsApp—the most popular mobile app in Brazil. One of their first activities was to organize and consolidate all the scattered information about COVID-19 cases and deaths from all the favelas on an Excel spreadsheet. In May 2020, they transferred all the data from the spreadsheets to an online dashboard that resembled the Johns Hopkins University COVID Dashboard.

The *Unified Slums COVID-19 Dashboard* is a robust example of how a network of grass-roots organizations can make a difference in mapping the unmapped, that is, giving visibility to COVID-19 cases and deaths that would normally remain undetected because they were not reported, either due to the lack of tests, or because cases were assigned to other neighborhoods.

The *Dashboard* also highlighted the basic infrastructural and mapping problems of favelas to incite proper government intervention. For example, the project's leaders plan on providing the municipal government with new adjusted zip code data they have been collecting, so that favelas can be accurately included in official government maps. In addition, the same community leaders who help report cases also mobilize to deliver factual information to the population about disease spread and vaccines, in person or via WhatsApp, and help them with basic needs, like food supplies.

The *Unified Slums Dashboard* demonstrates that mapping the spread of the virus is just one aspect of the already existing community networks that support favela residents. According to Behágue and Ortega (2021), public health experts around the world have much to learn from the grass-roots horizontal networked organizations in the favelas. They also should look at the impact and benefits of a universal free public health system, like the one that exists in Brazil, in the lives of minoritized communities. These structures work because rather than being vertical, top-down public health approaches, they are built into pre-existing networks of mutual aid, and are developed locally within the communities. So, rather than being created to specifically tackle COVID-19 problems, the same individuals already have a history of addressing associated problems like economic inequality, hunger, mental health, violence, and police repression.

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