

# THE PANDEMIC IN THE LARGEST FAVELA IN RIO DE JANEIRO

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## DESCRIPTION OF THE CASE

### **What is the Knowledge Translation Problem?**

At a time when the pandemic caused by Sars-CoV2 (COVID-19) affects most continents, populations living in subnormal settlements, especially in developing countries, appear as an additional concern. This unprecedented public calamity is affecting the economy and politics, aggravating the lives of Brazil's most marginalized citizens, namely, black and indigenous communities.

Although the reasons are multiple and must be located in their proper political-economic context. In Brazil, there is important misinformation coming from the federal, state and municipal governments. While most state and local governments impose social distancing along with other public health measures to control the spread of the virus, the president constantly opposes such measures, comparing COVID-19 to a "small flu".<sup>1</sup>

Perhaps some people in the world don't know that part of the Brazilian population lives in subnormal settlements and that Brazil's mortality rate from COVID-19 is the second highest in the world. To date, around 600,000 Brazilians have died due to COVID-19.<sup>2,3</sup>

We will have, as a scenario for our case study, the largest urban "favela" in Brazil, known as Rocinha and located in the city of Rio de Janeiro. "Favelas" or subnormal clusters are a set of at least 51 housing units, arranged in a disorderly and dense manner, lacking essential public services, and occupying land owned by third parties. In Brazil, these areas house 11.425,644 people or 6% of the Brazilian population, according to the 2010 population census, the last carried out in the country.<sup>4</sup>

In these favelas, social distancing becomes almost impossible because residents must coexist, in quarantine, in a space that does not bring together all the residents at the same time. Isolating sick individuals in multigenerational households, in which two, five or more individuals share the same bedroom and bathroom, is impractical. The precarious conditions of basic sanitation in the houses mean that there is a lack of potable water and a minimum of hygiene. Poor socioeconomic conditions do not allow adequate availability of sanitizers and disinfectants, not even soap.

The risks and grievances of the pandemic are not only conditioned by poverty or lack of health services, but, above all, by the unequal conditions of risk, protection and care in all dimensions of life. They reveal the perversity of selectivities that generate inequalities and injustices.<sup>5</sup>

Although the impact of the dissemination of COVID-19 in these clusters is perceived, little is discussed between the government and the population about these communities. There are few proposals to address COVID-19 in these communities, lacking differentiated strategies, considering their particularities and their spatial distribution.

### **Who Does it Affect?**

Residents include men, women, and children who live and work in the community. People who live and work in Rocinha, their families and workplaces frequently move back and forth in and out of Rocinha. These include, for example, cleaning women, street sweepers, delivery men, maids, drivers, supermarket workers, and gas station attendants. The most vulnerable populations are those that are older and younger, and those with comorbidities and have difficulty accessing the health system. The most uninformed people are also targets of health problems and possible lethality.

### **How Does it Affect Them?**

The people who live in the Rocinha favela, the majority, have a low socio-economic-cultural level. Although access to educational training is precarious, currently, with the advance of telecommunications, access to smartphones and the internet, education does take place in large Brazilian centers. Thus, this population has access to different types of information, mostly from social networks, where the reliability of the content is dubious and often even malicious, which leads to false information on prevention and treatment for COVID-19 in these communities.

### **What do we know about the social projects in Rocinha?**

In Rocinha there are a great number of social projects regarding children, young people, people of different ages. These projects promote human development and social integration through sport and education. They also include art projects for residents to watch projections on large rock walls from their rooftops or windows with the audio being streamed through speakers along the streets.

In terms of public health, community health agent teams take vaccinations to the highest parts of the favela, including those who are bedridden and those with mobility restrictions. The health agents speed up some vaccination appointments by scheduling through Whatsapp.

An important project called, Compassionate Community, coordinated by university professors from Rio de Janeiro e Minas Gerais, provides healthcare to people in need, with terminal illnesses, as well as training for residents who volunteer for this project. The professionals and volunteers with this project provide help through health education, proper nutrition and emotional support.

### **What do we think we don't know?**

Through the presence of health professionals, the spread of useful information on how to prevent and take care of communicable diseases, such as COVID-19 takes place. Bringing information about access to correct information can lead to a new reconfiguration in health and education. To listen to the population in Rocinha through sensitive listening, their doubts and health

problems, with empathy and compassion, may be an alternative for us to understand their daily difficulties, which sometimes permeate all living spaces.

Poverty not only makes a person more vulnerable in Rocinha, but also perpetuates a vicious circle. Sources of poverty, inequality and risks for health and the environment are factors when combined increase challenges for residents. The inequalities, and risks to urban health and the environment need to be considered in policies and procedures by local authorities.<sup>6</sup>

### **What are the greatest gaps?**

Organizations and institutions, especially public ones, can and should make their contribution to improving the quality of information and containing Fake News. In Brazil, in 2018, before the pandemic, the Ministry of Health created a space on an electronic website and on social networks to fight Fake News, and proposed to clarify the facts based on scientific evidence and its sources.

Reflecting on Fake News in contemporary times, is thinking about publications not based on scientific evidence. These, in technical terms, specific to the centers of research, need to be decoded to the population for better understanding, which refers to the application of the communication technique with – Attention, Interest, Desire and Attitude – to be used by journalists for the social press. It is necessary to teach people to verify the accuracy of the information before replicating it. The speed of propagation through social networks is frightening; the faster it is possible to break the chain of dissemination, the greater the chance of limiting the effects.<sup>7</sup>

What is received in good intentions, even if from a dubious source, gains an exponential progression through social networks, in which trust between participants grows over time in the virtual coexistence and a certain familiarity, which does not resemble reliability.

### **SYNTHESIS FROM THE LITERATURE**

The report Poverty and Shared Prosperity 2018: Piecing Together the Poverty Puzzle indicated that almost half of the world's population, that is, about 3.4 billion people still live in poverty, making the search for basic needs part of everyday life, such as sanitation, clean and potable water, electricity, education and health.<sup>8</sup>

In Brazil, this scenario is no different. This country is one with the highest number of inequities in the world, with the sum of the vulnerable population and those living in extreme poverty amounting to 100 million people, that is, almost 50% of the country's population<sup>9</sup> (Silva et al, 2020). This result is influenced by barriers to accessing education, health, basic sanitation, employment and income.<sup>10</sup>

Face with this scenario, with the onset of the COVID-19 pandemic, one of the initial measures to confront the public health problem was related to the restriction of people's movement, but this confinement had a direct impact on the financial support and survival of their families. Furthermore, school activities were suspended, which compromised access to food for low-income children and adolescents.<sup>10</sup>

The need to contain the spread of the virus did not consider the specificities of the most vulnerable populations, who do not have housing, income or work conditions to carry out restrictions and/or isolation at home. Thus, groups that experience the daily lives of greater poverty are more exposed to COVID-19, as they use public transport more frequently, have a greater number of residents per household, have less access to basic sanitation and health, in addition to the difficulties to maintain social isolation due to their employment and income characteristics.<sup>10</sup>

This population, slum dwellers, still have greater exposure to the virus, as they are part of the professionals considered "essential" during the pandemic (workers who could not start doing remote work during the pandemic), but unlike health workers, they do not receive social recognition or prestige to perform their work (e.g., cleaning women, street sweepers, delivery men, maids, drivers, supermarket workers).<sup>11</sup>

Faced with these social and economic difficulties, an additional challenge in confronting the pandemic is "infodemia", which consists of an excess of information on the same topic. This excess of information, associated with different sources, resulted in disorientation on the part of people, who reduced or minimized their ability to recognize reliable sources or content, becoming more likely to accept what corresponds to their values or beliefs as absolute truth.<sup>12</sup>

Uncertainties regarding COVID-19 were also added to the post-truth context, where the crisis of confidence in institutions is its greatest expression

through Fake News. The so-called Fake News gained space<sup>12</sup>, as it circulated quickly through social media (especially Whatsapp), and due to the lack of verification of the facts they advertised, facilitated its dissemination. Groups of family, friends, members of a church or any other group that people are part of - or with which they identify - consolidate themselves, in this way, as sources of practically unquestionable and reliable information, even if walking in the opposite direction to the discourses of Science.<sup>12-13</sup>

Still, given all the challenges related to social vulnerability issues, dissemination of fake news about the pandemic in Brazil, the population still faces a denial in government, which minimizes the effects and the seriousness of the disease, which makes facing the pandemic even more difficult along with adherence to measures to prevent and reduce cases.<sup>12-13,1</sup> This knowledge translation project sought to find ways to allow the population to differentiate false information circulated in social media from scientific evidence.

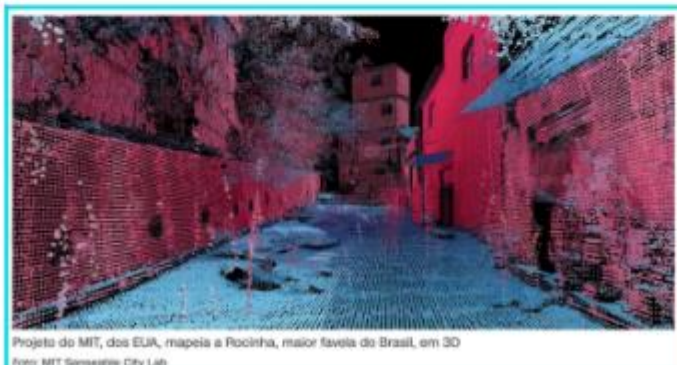
### **Promising Practices - Recommendations from the community**

A survey was conducted with healthcare workers from a social project at Rocinha, on what were their perspectives on ways that could spread trustful information about COVID-19 and evidence-based preventive measures. Among the answers were, WhatsApp messages with focus on prevention; the development of a solidarity network and stable partnerships for donation of hygiene supplies and food, distribution of hand sanitizer among workers (especially early in the morning); and educational videos created by children in the community for their families, to be posted on social media. Also, it was pointed out that some measures that are community-based should be reinforced, such as methods/ treatments to improve immunity (lemon, ginger, saffron teas and sunbathing - vitamin D) and grated soap and mixture stored in reused oil cans. Furthermore, valuing women's roles as they carry out and manage many initiatives at the Favela was needed as they are barely recognized or mentioned as community leaders. The co-design of sustained initiatives and extending existing ones was essential along with; eradicating the stigma and prejudice towards the community.

Some joint ventures with private and foreign universities are already in place, such as the one with the MIT: Remotely Piloted Aircraft to screen the Rocinha territory for better management.<sup>14</sup>

- Remotely Piloted Aircraft (RPA) provide quick spatial data capture with satisfactory accuracy and resolution, affording the creation of three-dimensional products and aerial photographs from different perspectives. These data have been used to support geovisualization in geodesign workshops held in socially fragile and poor communities, in which people of the place have a vast knowledge about their territory but difficulties in working with cartographic representation and maps products.

(de Magalhães D.M., Moura A.C.M.,2020)



Projeto do MIT, dos EUA, mapeia a Rocinha, maior favela do Brasil, em 3D

Foto: MIT Senseable City Lab

[https://youtu.be/zFLFH9m\\_yBs](https://youtu.be/zFLFH9m_yBs)

<https://senseable.mit.edu/favelas/>

### **Adaptations for Low-Resource Setting**

The respondents highlighted the importance of promoting health campaigns that focused on COVID-19 prevention, continuing home vaccinations and providing home care for individuals in the community recovering from COVID-19. Educational campaigns focused on teaching hand hygiene to children in daycare centers and schools near Rocinha were also a common theme.

In addition to identifying recommendations from community members in Rocinha, our group found it imperative to identify practices in low and middle income countries (LMICs) that have been effective in curbing the spread of COVID-19 in communities similar to Rocinha. One such country that found an innovative solution to contact tracing was Kenya. A research article done by the World Health Organization (WHO) found a group of innovators in Kenya who created a free app that prompted passengers who use public transportation regularly to input their contact details to better implement contact tracing of COVID-19 within Nairobi. This screening technique adopted by public

transportation systems allowed for crucial contact tracing data to be sent to the Kenyan Ministry of Health in efforts to curb the spread of the virus.<sup>15</sup>

One solution to the COVID-19 'infodemic' can be found in Sri Lanka, where a 24/7 hotline provided in three different local languages was available to the public for inquiries they had regarding the virus.<sup>16</sup> The efforts to provide risk communication in this format not only allowed for experts to provide locals with a clear understanding of the COVID-19 virus and appropriate safety measures, but it also addressed the infodemic in Sri Lanka in an inclusive and accessible way.<sup>15</sup> This practice follows closely with the recommendations made in an article written by Izumi et al. (2020), which suggested the deployment of community-based health apps that can connect community members to evidence-based information and can be used to cross-check the credibility of information received through word of mouth or through social media sites.<sup>17</sup>

## **Conclusion**

This work contributed to confirming with the authors how important and unique it is in today's world, a world marked by social inequality, access to health, access to quality food, access to correct and authoritative information, the inherent responsibility that it is also up to those who produce the "knowledge".

It is not enough just to close our eyes to rulers and policy makers, it is necessary that each one of us takes responsibility in our daily lives to practice, teach and translate knowledge.

As long as each one of us does not have the dignity and awareness of the responsibility to assume our place of speech and how we can allow everyone, without distinction, to be heard and also occupy their speaking spaces, there will be no equanimity and social justice.

For small actions to become sustainable changes, it is necessary to combine practical knowledge and recognize that the best knowledge is the one that is built together.

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