Emerging Psychological Impediments and Challenges in the Context of COVID-19: Evidence from Healthcare Perspectives in Pakistan

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ABSTRACT
The COVID-19 pandemic has resulted in massive casualties and a worldwide economic downturn, but relatively little official attention is provided to the psychological difficulties arising due to the lockdown and isolation. In Pakistan, the public is burdened not just by the pandemic and lockdown, but also by the rampant rumors spreading against the government and healthcare workers. This paper aims to highlight the psychological causes driving the people who create and propagate these rumors. Many people continue to flaunt the guidelines, and rumors such as those of doctors killing patients are frequently spread via social media. Evidence based literature guides the authors to conclude that Pakistan should follow the example of other countries, not just in how to deal with the pandemic and address the populace during these difficult times, but also in establishing several vital services like charities and mental health help lines. Though it should be noted that Pakistan does not have access to the same resources, nor our challenges are all the same due to specific socio-cultural restraints. Efforts to de-stigmatize and educate people about mental illnesses and to encourage them to seek and provide help and support when needed.

Introduction
Few events have impacted the world as strongly as the recent COVID-19 pandemic. With worldwide casualties of over 550,000 and rising, hospitals and healthcare practitioners (HCPs) are being stretched to their limits, with widely publicized reports of personal protective equipment (PPE) and ventilator shortages. However, even as nations scramble to tackle this challenge, many are ignoring the
silent threat lurking beneath the surface; that of the psychological pressures both HCPs and the general population face due to the myriad consequences of the pandemic.

Study Background

In Pakistan, the current situation regarding mental illnesses is not encouraging. The very concept is heavily stigmatized, and many people do not even believe in its existence. Psychologists and psychiatrists are seen as doctors for insane people and most people refuse treatment from them due to a fear of “what will people say?”. According to WHO, even the government budget allocated to it is a pathetic 0.4% of the total health expenditure. There are only three mental health outpatient facilities dedicated to children, and only eleven mental health hospitals with inpatient facilities in the entire country. There is no official suicide prevention strategy, and most functioning mental health programs in the country are operated by non-governmental organizations (World Health Organization, 2018). The aim of this paper is three-fold: First, to identify impediments to the treatment and management of COVID-19 in Pakistan, i.e. what factors cause people to disregard safety procedures. Second, to identify the psychological challenges and fallout facing the Pakistani population in the wake of the pandemic and the resulting lockdown and finally, to provide some recommendations to address the above-mentioned issues. These tasks were accomplished through a literature review, with many articles taken from Pakistani scientific journals and news sites, since this study is focused on Pakistan.

Psychological Impediments, Treatment and Management of COVID-19

The government of Pakistan implemented lockdown and social distancing measures from April 2020, and since then, there have been talks of easing or tightening the measures, smart lockdowns, etc. In spite of these measures, however, it is not uncommon to see people out and about, even after the curfew period. Both the elderly and the young alike can be seen holding gatherings outside, wherein nobody follows the social distancing rules. Additionally, most people have at least one member within their extended family and friends that believe that the pandemic is either a hoax or a conspiracy, and spread false news related to it. These actions can be attributed to two factors; Optimism bias and the spread of misinformation.

Optimism Bias: Causes and Consequences

Optimism bias can be defined as a bias that predicts that the future will be better than the current reality. Humans tend to overestimate the likelihood of positive events happening to them, regardless of their age, gender, race, and nationality (Sharot, 2011). Research suggests that this phenomenon plays a role in preventable events like car accidents, and indeed, infection by COVID-19. A reason for this undue optimism was hypothesized to be an overestimation of the degree of control that people have over their lives (DeJoy, 1989). Dr. Atkin, et. al found that
optimism bias made people more resistant to messages about infection prevention measures. In order to counter this, the information released by authoritative sources, especially the government, should be consistent, timely, honest, and delivered through both conventional and emerging digital media platforms (Best, 2020).

**Misinformation and Conspiracy Theorists**

Although optimism bias can explain the lackadaisical attitude of the Pakistani population over the prevention measures, it does not account for the rampant misinformation spreading via social networking sites (SNS). This misinformation only serves to sow discord between the government and the public, and makes people less likely to adopt safety measures. One of the more common conspiracy theories being spread around Pakistan is that HCPs are deliberately killing patients to help the government secure more aid money. Such rumors not only tarnish the image of those who are risking their lives on the frontlines against this disease, but also make their work more difficult as people opt to cover up and downplay their symptoms until the last possible moment, risking both themselves and those around them. This problem is especially prevalent in the rural parts of Khyber Pakhtunkhwa, where every action taken by government and NGO workers is met with suspicion and hostility (Hadid, 2020). The origin of misinformation can generally be traced back to five types of people (Spring, 2020):

1. Pranksters and “internet trolls” who deliberately spread misinformation for fun. They are often either unaware of the consequences of their actions, thinking that no one would believe something as outrageous as what they are spreading, or do it with malicious intent.

2. Scammers who spread lies with the intent of defrauding people. It is not uncommon to see advertisements in Pakistan of herbalists and alternative medicine practitioners offering cures to COVID-19.

3. Politicians and state agencies who, in the case of the former, spread misinformation due to uncertainty, as was the case of the President of the USA when earlier this year he implied that the pandemic was just a hoax. In the case of the latter, it is spread deliberately against state enemies to influence their politics.

4. Conspiracy theorists who genuinely believe the lies they are peddling. They are convinced that the pandemic is some big hoax, and they are amongst the select few privy to this knowledge.

5. Supposed insiders, such as HCPs or patients, who are whistleblowing and exposing some conspiracy. However, their existence and credibility remain anonymous and therefore dubious.
These rumors and lies are then spread by ordinary people who may or may not believe in them, but spread them anyway as a precautionary measure. With regards to this paper, the conspiracy theorists are the most relevant group. While it is difficult to pinpoint what psychological factors are at play with conspiracy theorists, most psychologists agree on a few central mechanisms that play a key role.

The first key mechanism is known as the fundamental attribution error. Simply put, it is the tendency of people to attribute events to deliberate actions driven by personality and motive, rather than being pure coincidence (Shpancer, 2020). A classic example is if we meet with a rude person at a party, our first assumption is that they are a naturally rude person, rather than they may just be having a bad day. Conspiracy theorists abroad have attributed the virus to everything from a deliberate act of the Chinese or the US, to a plot to cull the human population (Yousaf, 2020). There was even an instance in Pakistan of it being called the “Shia virus”, since the first carrier came from Iran (Mirza, 2020).

Ultimately, people would rather believe that the pandemic is a product of a devious conspiracy than accept it as a natural and uncontrollable phenomenon. The second key mechanism is that of confirmation bias. When people believe something, they will search out information or interpret facts to align with those preconceptions (Shpancer, 2020). If people believe that the government is not looking out for their best interests, and that the healthcare system is looking to make a profit off the crisis, then they will seek out stories that support those beliefs, even if they are false. They will also reject any evidence that contradicts their beliefs. The origin of this mistrust in authority in Pakistan can likely be traced back to partisan affiliations, personal negative experiences with authority figures, such as bribes involving the police, and a combination of illiteracy and a need for immediate answers. Finally, the third key mechanism is a psychological need for uniqueness (Pierre, 2020). Conspiracy theories are often seductive to people who are dissatisfied with their lives and are looking to not only put the blame on someone else for their own misfortunes, but also to give them a sense of power. Power that comes from knowing behind-the-scenes information about how the world really works, unlike the common, deluded public (Shpancer, 2020).

Psychological Challenges and COVID-19 in Pakistan

The COVID-19 pandemic has undoubtedly put a severe strain on the medical and healthcare system in Pakistan. Apart from the physical and monetary burden of battling the pandemic, there are also the psychological challenges that arise as a result of the fear of being infected and passing on the disease to loved ones, the fear of dying, etc. While these fears, and the associated anxiety, would be common to almost all people during the pandemic, one must also be considerate of the additional psychological morbidities of the infected people. These would include, apart from the expected fear of death, the guilt and shame arising from being infected and passing it on to their loved ones, as well as worry for the future as even if they survive, they may face discrimination and would very likely, as past
pandemics have shown, suffer from post-traumatic stress disorder (PTSD) in both the short (Wu, Chan, & Ma, 2005) and long terms (Mak, Chu, Pan, Yiu, & Chan, 2009).

**Psychological Burden on the People**

For the common public, the risk of being exposed to, or having their friends and family infected invariably leads to anxiety and depression. The act of self-isolation and the lockdown will also have an impact on mental stability as people will be forced to drastically change their daily routine, and will inevitably have to deal with financial insecurity due to the shutdown of non-essential businesses. While the presence of digital communication platforms like Skype, Zoom, and WhatsApp reduce the impact of loneliness, they are not a substitute for face-to-face interactions, especially for extroverted people who were used to socializing on a daily basis. Some of these platforms like Facebook and WhatsApp may even cause more harm than good as people rely on them for news, thereby exposing themselves to misinformation and media overload (Mayo Clinic, 2020).

In addition to people developing psychological morbidities, those who already suffer from some form of psychiatric disorders, and bear the brunt of societal misconceptions, will likely find their symptoms worsening. At particular risk are those who suffer from Schizophrenia, Bipolar Affective Disorder, and Obsessive-Compulsive Disorder with regards to cleanliness and hygiene (Haider, Tiwana, & Tahir, 2020). A study carried out in the city of Karachi found that over 60% of the 400 respondents had increased levels of daily anxiety and almost 95% were worried about the health of their family (Balkhi, Nasir, Zehra, & Riaz, 2020).

**Psychological Distress of the Infected**

Although there is no research on the psychological hurdles faced by those infected by COVID-19, we can look at those infected during past MERS-CoV and SARS outbreaks. In the short term, there is a risk of high-grade fever-induced delirium caused by the virus infection (Health Europa, 2020). There is also a high probability of developing anxiety, depression and guilt over the uncertainty of the treatment, isolation in quarantine, the lost revenue and the risk of infecting their loved ones. This mental burden has caused several people in Pakistan to either refuse treatment or run away from treatment centers. In the long term, the patients, even after recovery, face the prospect of developing PTSD, depression and anxiety, and risk being stigmatized and discriminated against (Hashmi & Saleem, 2020). Children who are diagnosed with or are suspected of contracting COVID-19 face the additional stress of being separated from their parents during quarantine and battling a disease they may not be able to even comprehend, and will likely develop similar psychological morbidities over time (Imran, Zeshan, & Pervaiz, 2020). Patients are also advised to remain in isolation until they are confirmed to be tested negative for the virus due to its high degree of infectiousness. This has the side effect
of cutting them off from the friends and family that they could count on for emotional support and psychological recovery (Thompson, 2020).

**Consequences of Physical and Psychological Fatigue of HCPs**

With regards to HCPs, the usual suspects: anxiety, depression, and fear related to infection of self and loved ones are all present. In addition to these, there is also additional stress caused by being on the frontlines of this battle, often under-equipped and unprepared, and stigmatization from both patients and their families who may not understand the disease and the necessary preventive measures like isolation. A survey of health professionals in China found that over half of them (50.7%) showed symptoms related to depression, while over a third of respondents (36.1%) reported having insomnia (Liu, et al., 2020). Here in Pakistan, there have been multiple surveys assessing the mental well-being of HCPs. Around ¾ of the participants in two different surveys reported having a strong fear of infecting their families (Urooj, Ansari, Siraj, Khan, & Tariq, 2020) (Haq, Shafiq, & Sheikh, 2020).

In summary, signs of depression, anxiety and fear of contracting the infection and passing it on to one’s family are common across the board. Being confined indoors during the lockdown also adds stress due to fears of financial instability, unemployment, loneliness, and boredom. Those who suffered from some psychiatric illness prior to the pandemic, especially those with Schizophrenia, Bipolar Affective Disorder, and Obsessive-Compulsive Disorder, will likely find their symptoms worsening as a result of the isolation and the disruption to their normal routines. Children, especially younger ones, also suffer psychological morbidities due to the lockdown, as they are influenced by the adults around them and likely lack the ability to process and understand what is happening. This would lead to them acting out in some way which would just end up adding to the stress of their adult caregivers. There is also a strong risk of increased abuse against both women and children due to the stress and anxiety caused by the pandemic, the lockdown and unemployment. Those who are infected with the virus are also vulnerable to anxiety and depression, especially since they have to be cut off from their friends and family, who could be a source of comfort in these trying times. In the long term, they are likely to develop PTSD, depression and are at risk of being stigmatized and discriminated against.

**Conclusion**

The COVID-19 outbreak that started in Wuhan, China has grown into a pandemic that has claimed thousands of lives across the world. The various governments around the world instated an emergency lockdown and social distancing guidelines to halt the spread of the virus and reduce the burden on healthcare systems. However, being cooped up at home, unable to earn a living and having their daily routines catastrophically disrupted led to a budding sense of frustration and resentment. With debates on the merits and harms of these new rules
continuing to rage on, and conspiracy theories spreading like wildfire, the psychological burden on people has reached unprecedented heights.

Here in Pakistan, many people continue to flaunt the guidelines, and rumors such as those of doctors killing patients are frequently spread via social media. Although many people are aware of the threat this invisible enemy poses to their lives, and are stressed by it, they bear that risk as they go shopping in malls and hold family gatherings. The purpose of this paper was to identify the psychological causes behind this callous attitude and to determine what beliefs drive the conspiracy theorists, who are so convinced that there is a nefarious scheme hidden behind this pandemic. The psychological effects of the outbreak and the lockdown on different sectors of the population were deliberated on, and recommendations for dealing with the fallout of this situation were also discussed.

The primary cause of people trying to go about their lives as normal was likely due to an unrealistic expectation that positive experiences are more likely to happen to them in the future than negative experiences, referred to as an optimism bias. This bias was also given a boost in young and healthy people due to early news that the virus was dangerous only to the old and immunocompromised. The behavior of the Pakistani public could also be attributed to the presence of viral misinformation. While there are several sources of these lies, of particular interest to this report are conspiracy theorists. Their misguided beliefs could be linked to three different phenomena; fundamental attribution error, confirmation bias, and a psychological need for uniqueness.

The mortal danger of the virus coupled with the economic burden and isolation of the lockdown will certainly be there to the widespread development of depression and anxiety across all sectors of the population. However, certain groups are more psychologically vulnerable than the common man. The disruption in daily routine will likely have a greater impact on people with pre-existing psychiatric conditions like Schizophrenia and Bipolar Disorder. Over time, it is likely that those who survive being infected with the disease will develop PTSD, in addition to the morbidities mentioned above. Children will also mirror the unease of the adults around them and become fussier and more difficult to manage as a result. Finally, HCPs are at a high risk of not only contracting the virus due to their proximity with the infected, but also of suffering fatigue from overworking, which could compromise their ability to effectively carry out their duties.

In order to solve these issues, several recommendations were provided. For starters, the government should follow the example of other countries, not just in how to deal with the pandemic and address the populace during these difficult times, but also in establishing several vital services like a mental health helpline. Additionally, they should make use of the numerous charities in the country to deploy aid to the people who desperately need it, and develop a plan to use this incident as a teachable moment for future generations. Further efforts should also be
made to de-stigmatize and educate people about mental illnesses and to encourage them to seek and provide help and support when needed.

Recommendations

Following the Example of Others

The National Health Commission of China has made mental health a key point of their strategy to combat COVID-19. They released a set of guidelines called the “Principles for Emergency Psychological Crisis Intervention for COVID-19 Pneumonia Epidemic” which called on mental health experts and associated organizations and academic groups to implement them across the nation. These then set up specialized teams that were dedicated to dealing with the psychological ramifications of the outbreak. They published multiple guidelines targeted at HCPs, the general public, and those with pre-existing psychiatric morbidities, as well as guidelines on online and tele-medicine, and released videos to de-stigmatize and educate the public about psychiatric issues. They were also responsible for identifying and carrying out psychological interventions for those people who were at high risk of suicide and aggression (Li, et al., 2020). Multiple medical institutions in China also collaborated to provide HCPs with emergency psychological intervention. However, most staff refused to get psychological help, claiming that being infected in the line of duty was not an immediate concern and that they did not want their families to worry about their mental well-being. They also requested the provision of necessary PPE and training on how to deal with unruly patients. Accordingly, these were provided, along with rest areas and leisure activities to ease their stress (Chen, et al., 2020).

In the UAE, the Ministry of Health and Prevention launched three programs to help their population manage psychological stress and anxiety during the pandemic. The Hayat program for mental health support is a campaign aimed at providing mental and moral support to federal employees. Government employees can get four free consultations, and a 30% discount for any further sessions for themselves or their immediate family (Federal Authority for Government Human Resources, 2020). The government has also launched a dedicated helpline where callers can talk about their COVID-19 related concerns and anxiety, and receive psychological counselling over the phone for free. There is also the online campaign, “The National Campaign for Mental Support”, which aims to release videos on SNS reassuring and encouraging the public to remain positive and compassionate during these difficult times (The United Arab Emirates Government, 2020).

Short-term Preventive Strategies

Although we can learn a lot from the example of others, it should be noted that we do not have access to the same resources that they do, nor are our challenges all the same due to specific cultural restraints. There are plenty of strategies that the government will need to take to address the issues mentioned above in both the
short and long terms. The following recommendations, along with those mentioned above, are those that can be implemented in the short-term at relatively lesser cost. They should, therefore, be prioritized. For starters, many national leaders, including those of USA, UK and New Zealand, addressed their citizens on a daily basis during the lockdown. The Prime Minister of Pakistan should also consider holding weekly, if not daily, briefings to reassure and update the public. Additionally, it is necessary for the national policy on combating COVID-19 to be consistent and unified. Inconsistent policies and arguments between the federal and provincial governments due to partisan politics will only serve to confuse and divide the public.

The government should also launch official pages on SNS, including WhatsApp, wherein official news, suggestions, tips, surveys, etc. can be provided. The government of Kanagawa Prefecture in Japan launched a survey using LINE’s chatbot which enquired about the user’s physical and mental condition. If the user reported symptoms like a high fever (>37.5°C), fatigue, and difficulty breathing, they were provided information on consultation and testing services and steps aimed at infection control. The survey also assessed their mental stress condition and if anyone close to them had been diagnosed with COVID-19 (Tanoue, et al., 2020). Such a survey would have also been useful in Pakistan, especially during the early stages of the outbreak, as it would have allowed for rapid assessment and statistical data collection, while reducing the burden on humans. However, it should be noted that this would only be beneficial to people with access to smartphones and the internet. Although this subset may be small elsewhere, there are likely many such people, especially in rural areas of Pakistan. As such, the information and news shared via the internet should also be broadcast over TV networks and radio, as many rural people at least have access to them. These networks should also be used to dispel any rumors that are making the rounds.

**Long-term Strategies to Accomplish**

Although these steps will certainly be beneficial in both the short and long term, there are many other things that the government and people of Pakistan can do that will be more expensive, but yield benefits over a longer period of time. As mentioned earlier, combating the pandemic and maintaining the psychological well-being of the nation is a gargantuan effort that requires the cooperation of many different parties. Of particular interest are the numerous charity organizations that operate in Pakistan. These are groups that provide many charitable services, such as providing ambulances, donating food, operating mental health and tele-medicine helplines, etc. They include large organizations like the Edhi Foundation, the Aman Foundation, etc. as well as many smaller groups. The government should turn to them as they have many resources that can be utilized to provide aid, medical and psychological consultation services, and testing for COVID-19. For those smaller groups, or for those just starting out, the government could also offer training in technical and soft skills for free or for a very small fee. This would ensure that their
service is of a desirable quality, and by getting approval and recognition from the government, the public would also feel more at ease donating money to them.
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