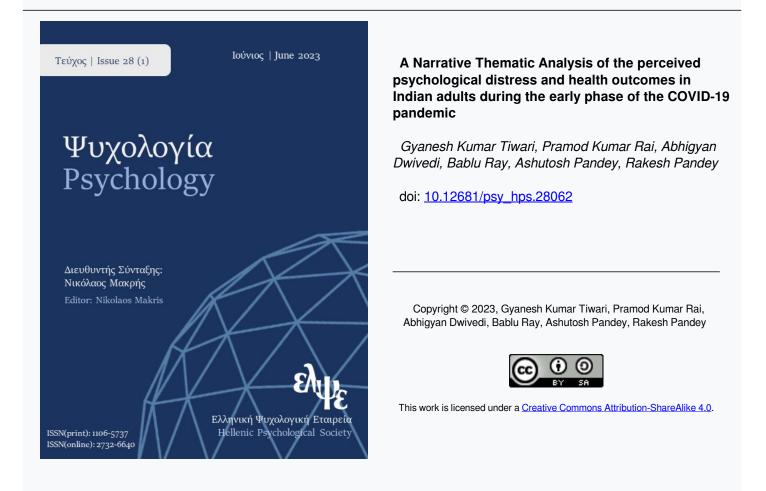




Psychology: the Journal of the Hellenic Psychological Society

Vol 28, No 1 (2023)

Special Section: Approaching intersectionality in gender psychology research



To cite this article:

Tiwari, G. K., Rai, P. K., Dwivedi, A., Ray, B., Pandey, A., & Pandey, R. (2023). A Narrative Thematic Analysis of the perceived psychological distress and health outcomes in Indian adults during the early phase of the COVID-19 pandemic. *Psychology: The Journal of the Hellenic Psychological Society*, *28*(1), 213–229. https://doi.org/10.12681/psy_hps.28062

A Narrative Thematic Analysis of the perceived psychological distress and health outcomes in Indian adults during the early phase of the COVID-19 pandemic

Gyanesh Kumar TIWARI¹, Pramod Kumar RAI¹, Abhigyan DWIVEDI², Bablu RAY², Ashutosh PANDEY³, Rakesh PANDEY³

¹Department of Psychology, School of Humanities & Social Sciences, Doctor Harisingh Gour Vishwavidyalaya, Sagar, Madhya Pradesh, India

²Department of Linguistics, School of Languages, Doctor Harisingh Gour Vishwavidyalaya, Sagar, Madhya Pradesh, India ³Department of Psychology, Faculty of Social Sciences, Banaras Hindu University, Uttar Pradesh, India

KEYWORDS

ABSTRACT

COVID-19 pandemic, Psychological distress & health outcomes, Social support, Religious practices, Narrative thematic analysis

CORRESPONDENCE

Gyanesh Kumar Tiwari Department of Psychology, School of Humanities & Social Sciences, Doctor Harisingh Gour Vishwavidyalaya, Sagar, 470003, Madhya Pradesh, India gyaneshpsychology@gmail.com COVID-19 represents a severe, novel, and harmful disease that posed worldwide new challenges to the well-being of people and culminated in negative life outcomes. The current study explored the perceived psychological distress and consequent health outcomes caused by COVID-19. The Narrative Thematic Analysis design was employed. Eighteen participants comprising 12 males and 6 females responded about their experiences of the recent outbreak of COVID-19. The data were collected through a telephonic semi-structured interview which was analyzed through the Thematic Analysis Method. Four themes were generated: maladaptive psychological outcomes of COVID-19, perceived poor social support, increased religious practices, and the development of physical health symptoms. Extreme anxiety, panic experiences, insecurity, helplessness, hyper-vigilance, and negative attributions represented the psychological distress, while decreased social interactions and imposed social distancing characterized the perceived social support. Increased reliance on myths, divine interpretations, and faith in God showed religious practices. Decreased hunger, insomnia, headache, breathing problems, and palpitation were some ill-health outcomes. The pandemic shaped the nature and extent of perceived psychological distress, social support, and religious practices. The first two may have caused negative health and well-being outcomes while the religious practices maintained equilibrium among the rest three. Immediate trans-disciplinary efforts for the effective prevention, treatment, and promotion of the affected people are recommended. Positive health practices embedded in different socio-cultural systems may also be explored to help people facing the negative consequences of the recent and future pandemics. The implications and limitations of the study have been discussed.

Introduction

The recent outbreak of COVID-19 has shaken the people of the whole world to their core, mind and heart. Coronavirus disease (COVID-19) is a respiratory infection caused by the coronavirus that can be transmitted through respiratory droplets and contact routes by droplets particles (>5-10 μ m) or droplet nuclei (<5 μ m) (Li et al., 2020; Liu et al., 2020). The pandemic of COVID-19 has resulted in many negative consequences on a mass scale involving physical and mental health, social behaviours and relationships, psychological and emotional functioning. A review indicated that a variety of negative psychological consequences are associated with the spread of COVID-19 (Brooks et al., 2020). For instance, the study observed that a pandemic like COVID-19 culminates in acute stress, confusion, anger, restrictions, fear of infection, frustration, boredom, poor supplies of goods and services, insufficient information, loss, and stigma (Brooks et al., 2020). The vulnerability of COVID-19 may be dissimilar for different persons depending on their social groups, gender, age and socioeconomic status, occupation, health, education, ethnicity, history of physical and psychological illness

© 2023, Gyanesh Kumar Tiwari, Pramod Kumar Rai, Abhigyan Dwivedi, Bablu Ray, Ashutosh Pandey, Rakesh Pandey Licence CC-BY-SA 4.0

(disabilities, heart diseases, diabetes, etc.), economic and social conditions, domicile and working conditions (Pan American Health Organization, 2019).

The consequences of an epidemic involve a set of complex social and psychological processes which may become very serious if the disease is new, unexpected, or very harmful (Strong, 1990). Strong (1990) has argued that the resultant psychological processes are epidemics in themselves that may spread at a fast pace in a variety of forms to individuals and collectives. Epidemic psychology may comprise three types of psycho-social epidemics: fear, explanation and moralization, and the epidemic of action. These may be even more severe when the disease is less well-known (Strong, 1990). These facts may further carry suspicion, insecurity of infection by any method, irrationality, misinformation, panic, stigmatization, avoidance, segregation, abuse, and theories of the origin of disease and its effects and metaphysical explanations among educated as well as illiterate people (Weber & Goldmeier, 1983).

The upsetting impacts of the recent pandemic may be very serious as it has stopped all essential human activities, tore out socio-economic and cultural fabric of people across the globe, and imposed a sanction on all human interactions and productivities. In addition to the disease itself, many negative consequences of the psychological impacts of epidemics have been observed. For example, quarantine during the pandemic has been reported to develop symptoms of acute stress, fatigue, the feeling of isolation, anxiety, irritability, insomnia, and indecisiveness (Lee et al., 2005; Sprang & Silman, 2013; Wang et al., 2011). Besides, general psychological symptoms (Mihashi et al., 2009), emotional disturbance (Yoon et al., 2016), depression (Hawryluck et al., 2004), and stress (DiGiovanni et al., 2004) have also been reported as a result of quarantine and other restraints during a pandemic. Some qualitative studies have also observed confusion (Pan et al., 2005) and anger (Cava et al., 2005) resulting from quarantine.

A variety of theoretical explanations may be used to explain the negative psychological and other life outcomes caused by pandemic or pandemic-like situations by previous researchers. For instance, it has been argued that the unexpected, uncertain, and threatening nature of the pandemic, including COVID-19 may convert the psychological environment into a crisis (Seeger et al., 1998). A crisis, if not checked timely and effectively, may eventually lead one to face increasing tension, depression, and finally to breakdown (Yeager & Roberts, 2015). The threats to life posed by the previous and the recent pandemics may lead people to make a set of physiological and psychological responses according to the Fight or Flight theory of Cannon which may appear in the forms of various psychological distress and health symptoms (Sellnow & Seeger, 2013).

The Illness Perceptions Theory suggests that coping outcomes of stressful situations involve representations, coping responses, and appraisal of coping outcomes (Leventhal et al., 1998). According to this theoretical model, the basic features of the illness representations (identity, cause, timeline, consequences, and curability) acting with the recent normative guidelines of an epidemic known to individuals may cause them to perceive psychological distress, decreased social support and to face negative health outcomes (Leventhal et al., 1998). According to the Self-Efficacy Theory (Bandura, 1977), negative psychological and other life outcomes may also be linked with the perturbed sense of self-efficacy of individuals as a result of extreme life situations. Self-efficacy refers to a person's belief in his/her abilities to accomplish a task in a given situation according to some accepted criteria (Bandura, 1977). It denotes a sense of control to fulfil environmental demands and a set of abilities to shape positive life outcomes (Bandura, 1997). The uncertainties and ambiguities in human interactions and social environment caused by pandemic situations may lower the response efficacy and self-efficacy, which, in turn, may cause psychological distress and ensuing ill-health symptoms (de Zwart et al., 2009).

According to Social Brain Hypothesis (Adolphs, 2003), the human brain has evolved over a long passage of time to consolidate and increase survival values through a set of significant social interactions and social information. It has been argued that these social interactions regulate the selection of useful interpersonal and moral behaviours, relationships, effective methods of communication, and mutual understanding (Adolphs, 2003; Dunbar, 2009). Thus, the reduced frequency and quality of social interactions due to the restrictions of the pandemic may cause distress and negative life outcomes. Likewise, the Camaraderie Effect states that the reward inherent in social interactions carry the ability to motivate individuals to choose behavioural strategies which carry significant adaptive values and help individuals to sense positive and negative feelings associated with various interpersonal relationships through empathy (Krach, 2010). This theory further states that the lack of optimal reward associated with appropriate social interactions and connectedness may cause a variety of psychopathological symptoms which may include mood disorders, schizophrenic disorders, and social phobia (Krach, 2010).



Although the recent pandemic caused a global challenge to the health, well-being, and the very existence of people of the globe alike, cultural factors may have mediated the process, mechanisms, and outcomes of its impacts. For example, people from collectivistic societies like India have been reported to self-affirm in the collectivistic values comprising religious practices and group identity activities. Moreover, the prevalence of a joint family system and a higher reliance on a self-reliant village economy helped Indian people to feel more secure and remain more optimistic in the face of the adversities of the recent pandemic (Tiwari et al., 2020). A recent study identified the role of gender, age, education, and other socio-cultural attributes relevant to understand the nature and extent of the impacts of the recent pandemic on people of Eastern and Western societies (Rossi et al., 2020). Thus, the structural, cultural, and individual factors are significant to understanding and explaining diverse reactions to the recent pandemic (Qiu et al., 2020). Understanding the peculiarities of psychological distress, mechanisms of facing unusual threats, and consequent health outcomes will constitute an important contribution.

The current study

Indian healthcare systems and practices have evolved in consonance with its cultural context, traditions, existing values, and ethos. There is a blend of modern and traditional medicine systems that include Ayurveda, yoga, and folk healing as supplementary roles in providing health care services in India (Dalal, 2016). Thus, peculiar to India is the existence of varieties of healthcare practices in dealing with the health-care that is known as medical pluralism. This medical pluralism provides different forms of healing practices on the one hand and leads to a variety of perceptions, explanations, and management of illness on the other (Biswal et al., 2017). Research reported that cultural beliefs about the illness of Indian people are closely linked with their responses and psychological adjustment to diseases. For example, Karma and the will of God underlie the attribution of disease in India that acquires different symbolic meanings as per changing illness and social context (Dalal, 2000).

It is noticeable from the above discussion that the epidemic and its socio-psychological aftermaths lead to a variety of challenges that may catalyze many sorts of psychological distress and poor health outcomes for the affected people. Understanding the dynamics of the psychological distress and negative health outcomes of the recent pandemic (COVID-19) may be significant for many reasons. The worldwide chaos created after the outbreak of COVID-19 is novel, unprecedented, and serious as it is the first epidemic that has gripped the whole human society simultaneously for the first time. Previously, epidemics have been limited only to some smaller or larger parts of the world. Besides, the current poor knowledge about the nature, sources, and methods of infections of COVID-19 and its ill effects have created furor never before and overwhelmed people with coronized thinking. COVID-19 has caused lockdowns in the majority of the human societies of the world. This sudden worldwide lockdown has paralyzed economic, social, educational, cultural, and familial activities and led people to think nothing more than the recent pandemic. These multiple negative impacts of the outbreak of the disease may have serious psychological and health consequences for most of the population across the globe. In the backdrop of these observations, the present study attempted to explore the impacts of the outbreak of COVID-19 on the perceived psychological distress and health outcomes of a heterogeneous adult sample rooted in the sociocultural tradition of Indian villages and residing currently in urban dwellings employing the Narrative Thematic Analysis. Qualitative methods have been suggested to be appropriate for studying phenomena that are either less explicit or lack a guiding framework for the study (Creswell, 2004).

Methods

The current study employed a qualitative research design that involved a semi-structured interview protocol to collect, process, and analyze the data. A heterogeneous sample of 18 participants (Age Range = 25-56 years, $M_{Aqe} = 36.22, SD = 8.51$) was chosen. These belonged to Sagar, Delhi, Varanasi, Prayagraj, Bangalore, and Bhopal cities of India. Initially, 45 individuals were contacted through phone calls. Out of these, only 12 males (Age *Range* = 25-56 years, M_{Age} = 37.33, SD = 9.54) and 6 females (*Age Range* = 28-44 years, M_{Age} = 34.00, SD = 6.10) gave their consent to respond to their experiences and multiple consequences of the outbreak of the COVID-19 for their life. The data for the current study were collected during March and April 2020.

This study is a unique attempt to understand the psycho-social responses and health outcomes of an Indian sample having their roots in villages, brought up in a joint family system, and currently located in urban dwellings and performing roles as office employees, housewives, and students. The socio-cultural milieu of the respondents was quite different from the Euro-American-centric population in social orientation and gender role perception, and even adult roles. The age range of the sample comprised 25-45 years, barring two, which is the age of rather mature persons and relatively free from emotional and other desire-related vulnerabilities. Their responses may be obtained in average ranges devoid of early adult apprehensions and late adulthood blues. The selected age range involves relatively mature adults who have a clear perspective of their psycho-social responses to the recent pandemic. The participants were chosen through a purposive sampling method. The sample size was determined as per the suggestions of Guest et al. (2006). The participants were debriefed about the basic goals of the study. The demographic features are presented in Table 1.

Table 1

Demographic Features		Frequency	Percentage
Age (Years	6)		
	25-30	5	27.78
	31-35	4	22.22
	36-40	4	22.22
	41-45	3	16.67
	46-50	1	5.56
	51-56	1	5.56
Gender			
	Males	12	66.67
	Females	6	33.33
Religion			
	Hindu	15	83.33
	Jain	2	11.11
	Muslim	1	5.56
Domicile			
	Rural	7	38.89
	Urban	11	61.11
Education	al Levels		
	Postgraduation	10	55.56
	Doctoral	8	44.44

Demographic Features of the Participants

**Note*. N = 18

A telephonic semi-structured interview protocol was used to collect data. Some initial discussions among the researchers and a pilot study on four participants helped to come up with a useful preliminary interview protocol. The data of the pilot study was not included in the analysis of the data of the actual study. The protocol was developed as per the goals. The data was recorded through an audio-recording device available on a mobile phone after the telephonic consent was taken. The basic questions covered the sources, causes, and impacts of COVID-19 on the various aspects of the participant's life. The data collection was started after the approval of the proposal by the Ethics Committee, Doctor Harisingh Gour Vishwavidyalaya, Sagar, 470003, Madhya Pradesh, India. Data collection was done in a single attempt during the stay of the participants at their homes during the lockdown. The interviews were held for 32 to 45 minutes with an average interview time of 38.83 minutes. The contents of the interviews were audiotaped through mobile phones and transcribed verbatim. No new themes and codes generated from additional interviews consistent with the research questions were indicative of saturation (Saunders et al., 2018). In practice, saturation was observed after 14 interviews were conducted. Further data collection on four additional participants was done to confirm the saturation as per the recommendations of previous researchers (Fusch & Ness, 2015; Isham et al., 2019). Thus, it resulted in a final sample of 18 participants. A Constructivist approach of inquiry and an inductive method was used to develop a deeper understanding and exploration of the impacts of the recent pandemic on the life of the participants.

The Narrative Thematic Method was used to analyze the data of the current study (Creswell, 2014). This method consists of organization and preparation of the data, making a general sense of the information, coding, generating categories or themes, and interpreting the data (Creswell, 2014). Allotment of codes to each participant and checking/rechecking of the codes ensured their confidentiality and ascertained their reliability.



Familiarity with the meanings, insights, and descriptions of the data was achieved by reading and rereading (Barbour, 2001). Coding categories emerged from the analysis. A Handwritten Code Book was used to maintain a record of the codes. An iterative approach was adopted to enhance the quality of coding. Iteration has been suggested to be important as it involves a systematic, repetitive, and recursive process in qualitative data analysis. It refers to a sequence of performing tasks multiple times in precisely the same manner each time. Thus, iteration is a reflexive process that sparks insight and helps in identifying meaning leading to refined focus and understanding (Srivastava & Hopwood, 2009). It also helped in the inclusion and review of relevant codes. This process was carried on until the complete analysis was done. All transcripts were scrutinized, checked, and reviewed after a gap with a fresh look to decrease the distortions due to the over-involvement in the data (Guest et al., 2012). Methodological integrity was maintained through the assessment of the adequacy of the data, approach of inquiry, discussion, focus on the evidence, coherency, and the use of a consistent analysis process as per research goals (Levitt et al., 2018). Following these steps, final themes were generated.

Results and discussion

The analysis of the data generated four themes regarding the psychological distress and negative health consequences of the recent pandemic. The novelty, fatality, and suddenness of the occurrence of the recent pandemic, uncertainty, panic experiences, and a variety of psychological distress symptoms among the participants were reported by the participants.

Theme 1: Maladaptive psychological outcomes of COVID-19

Anxiety, fear, and panic experiences were rampant. The majority of the participants reported experiences of anxiety due to fear, apprehension, uncertainty, perceived loss of the positive aspects of life, threats to their existence, and commune experiences caused by COVID-19:

"I am very afraid that many people will get afflicted by this virus...There is no treatment for this disease." $(M \ 9)$

"People may die of hunger and other diseases... We have heard that even the use of currency notes is not safe.....then what is safe?" (F_6)

Helplessness was reported by them due to the apprehension of negative consequences, loss of various sorts of threats to their life, and unpredictability and uncontrollability of the pandemic.

"I am very worried about the consequences... It will stop all the income... How essential needs of food, education, employment, and social interactions will be satisfied if it continues for long." (F_{-4})

"If anyone of my family members will get ill how we will seek medical help... What will happen I don't know?" (M 2)

"I fear that all citizens of my city will get infected... I have read in the newspaper that one infected person can infect 50000 persons... then what will happen." (M_5)

The disease generated extreme panic experiences. The participants shared the frequent strange physical and psychological experiences due to the uncontrollability of the situation worldwide, unavailability of medicines or vaccines, unexpected negative outcomes, and perceived severe loss after the outbreak of COVID-19:

"The lockdown has stopped all the activities even very important for life... sometimes I feel dizzy and feeling of insertion in my head." (F_4)

"I experience my feelings being out of control and fragmented... I also frequently experience nausea, feelings of illness, heaviness of the body and its parts, especially the heart, and less self-control." (M_12)

Restrictions of face-to-face social and interpersonal interactions, and quarantine culminated in the feeling of loneliness in the participants after the outbreak of the pandemic:

"The disease has resulted in lockdown... how we will interact with one another? If the problem persists for a long (one or two months) it will be very boring and monotonous for everyone." (F_{-1}) "Society will become a zoo with no freedom." (*M*_10)

Imagined difficulties in various aspects of life led them to involve in frequent rumination of vivid apprehensions of negative outcomes:

"I think some untoward to happen...The restrictions are very painful... I frequently think of severe illconsequences... The prices will go up." (M_{-7})

"How essential needs will be satisfied if the lockdown is again imposed after Mid-April?" (F_3)

The lack of the knowledge of roots of transmission, symptoms, and prognosis of COVID-19 made the participants hyper-vigilant, feel uncertain, and attribute negatively of the causes of the events of life previously predictable and controllable.

"Now, I observe precautions... I wash my hands even if I touch anything at home and also ask my family members to do so." (M_3)

"I fear of infection... I even do not want to go for a walk just very near to my house." (F_2)

The unavailability of medicines or vaccines caused them to feel strong uncertainty:

"I don't understand how far this problem will persist... How long it will take to discover effective medicine or vaccine?" (M_9)

"How life will come in order as before. How much time it will take to become everything normal and working?" (F_3)

Unavailability of the scientific information about the causes, origin, and effective treatment methods compelled the participants to attribute negatively:

"There are some countries that have created this virus for their benefit... The disease is not affecting adults... Only older adults and children will get affected." (M_1)

"People say that there is a complete cure in Homeopathy and Ayurveda ... The villagers are safer... It will not affect people from small towns... The disease is a kind of biological weapon." (F_{-5})

The helplessness, fear, negative consequences, and fast pace of infections of the disease caused emotional disturbances in the participants:

"When my father asked me about when my son will come back, it gets me angry... It teases me... Staying in one place for a long time has made me irritable." (M_8)

"I see many people getting infected and dying of this disease in dreams... once I saw that I got infected... There is no food or water in my house... It makes me nervous... I cannot think what to do and what not to do... Sometimes, I don't feel good... When I think of the consequences, I feel down." (F_1)

The study findings showed that the pandemic has significantly impacted the various aspects of participants' lives. Similar to the findings of the current study, Italian researchers recently reported the development of post-traumatic stress symptoms, depression, anxiety, insomnia, perceived stress, and adjustment disorder symptoms caused by COVID-19 and consequent restrictions of lockdown (Rossi et al., 2020; Tiwari et al., 2023). Moreover, the study also observed that these symptoms were more prevalent among women and children (Rossi et al., 2020). In the same vein, some more recent studies have unequivocally reported that the recent pandemic has increased the level of psychological distress among both the general population and serving medical/security personnel (Kang et al., 2020; Qiu et al., 2020). Mental health issues of stress, anxiety, depression, frustration, and uncertainty during COVID-19 have been observed in other studies also (Luo et al., 2020; Serafini et al., 2020). Anxiety and depression and self-reported stress have been commonly reported reactions to the recent pandemic in Eastern (Chinese, Singapore, India, and Japan) as well as Western populations (Iran, Canada, and Brazil) countries (Rajkumar, 2020; Varshney et al., 2020). New adaptive demands due to the need for a new lifestyle such as working from home, temporary job loss, altered work hours, and social isolation may cause psychological distress during the recent pandemic for the participants since these factors may naturally lead to fear, uncertainty, and stress (Government of Canada, 2020).

Gender differences in psychological distress were also observed. For example, the female participants (n = 6) reported more distress and panic than their male counterparts (n = 12). Their perceived distress was more confined to the distress and well-being of their family members and known persons while the males did show more concerns regarding larger collectives and other people.

"I have been feeling extreme fear about my children who show carelessness. I am frightened that they may get infected as they get very close to the persons visiting occasionally my home to supply food, vegetables, and milk during the lockdown." ($F_{-}6$)

"I am very much terrified of this disease since it is very infectious and fatal. I am very much worried about my family members, especially the children who flew away to play with their neighbouring friends in the evening." (F_2)

"Human history has not witnessed such type of infectious disease whose method of infection is unknown as well as its treatments. I am very worried about those who have to remain out of their home to extend health, security, and other essential services. Poor people may be extremely affected." (M_{5})

The female participants also reported more distress symptoms as compared to the males. The females reported depression, mood fluctuations, and panic experiences more frequently than the males while the later reported anxiety and fear of loss more often.

"I get nervous when I read news about dying people of coronavirus. It takes a few hours for me to get normal. I frequently feel down and have low energy." (F_3)

"I feel low motivation and negative emotions. I become restless sometimes. I become hopeless to hear that people are dying in large numbers. I feel insecure when I think about my family." (F_{-5})

"Whenever I think of the fatal and incurable nature of COVID-19, I get extremely anxious. I am afraid of the different kinds of loss such as employment, education, business, and social relationships." (M_3)

To understand age differences in psychological distress, the interview contents of participants below (n = 13) and above (n = 5) the age of 40 years were compared. The participants below the age of 40 years showed more distress related to their life goals and relationships whereas the participants with the age of above 40 years expressed concerns for safety and health.

"This pandemic has made me confined to my home. It will seriously harm my studies and future success in getting employment." (F_{-4} , Age < 40 years)

"The restrictions of COVID-19 are causing depression in me because it is badly affecting my career and long-term life goals." (M_{-7} , age <40 years)

"I am extremely worried about my body weight. It is increasing day by day. My current earnings are also getting affected negatively." (M_5. 40 years)

"My son is away from home for his studies. I am concerned about his health and life. His studies may be completed after the menace of the pandemic will get over." (M_{12} , Age > 40 years)

Theme 2: perceived poor social support

Extreme restrictions, quarantine, and fear of negative consequences compelled the participants to live and remain confined to their homes which led them to perceive decreased social support:

"After the lockdown was announced, I could not understand what to do... I hardly find the opportunity of face-to-face talks with my friends... even unfamiliar ones due to the lockdown." (M_6)

"I cannot talk even to my immediate neighbours..... When I look outside from the window of my house I don't see anyone walking over the road." (F_4)

The compulsory restrictions on face-to-face social interactions with previously available and easy interpersonal resources caused them to perceive lowered social support:

"I don't believe that a person who has been well-known to me will not come when I will be in need." (F-5)

"There is no one to whom I can say to bring my child back to the home that has been staying outside for his studies." (M_8)

"My neighbours are not talking to me... Previously they used to visit my home every evening and sit there for hours... We used to walk together every evening... Now, I cannot call anyone even in an emergency." (F_6) The unusual restrictions on interpersonal interactions and lack of previous similar experiences resulted in the perceived difficulty in practicing social distancing:

"I have to learn how to make a distance from others." (F_1)

"Even two persons of the same family are not allowed to ride on a two-wheeler... I have to buy anything from a distance of one meter... It is very irritating." (M_10)

The severity of the disease resulted in the participants having eagle-eyes on the information and facts related to COVID-19:

"I read everything about this disease from the media.....more than ninety percent f messages on WhatsApp and other social media are related to coronavirus." (F_1)

"Sometimes I see some contradictory information regarding the disease." (M_{5})

The outbreak of the pandemic forced the Indian government to impose mass lockdowns and social distancing to check its further spreading and to reduce causalities lowered the social interactions and social support (Theme 2). It has been suggested that social support satisfies instrumental, emotional, belongingness, recreational, spiritual, informational, and self-esteem needs (Barrera & Ainlay, 1983). Another study has suggested that social support is capable of buffering the impacts of stressful cognition and thus, may lower depression, anxiety, and emotional stress (Shi et al., 2020). Thus, the lowered social support perceived by the participants during the lockdown period of the recent pandemic may have deprived them of these benefits which, in turn, may have aggravated their perceived psychological distress and poor physical health symptoms. As social

beings, all humans have a strong need for interactions and for making sense of their world to experience satisfaction, and well-being and to live well (Sun et al., 2019). This loss of social connection is significant psychologically for people during the pandemic, but their inability to make sense of this, due to the lack of similar past experiences, challenged their ways of being. The distress caused by poor social interactions may find some comfort in the worldwide shared nature of this experience and collective consciousness, a need that could be satisfied by religion. As others are also sailing in the same boat, poor social support may have increased apprehension of the unavailability of medical and other facilities leading to perceived distress and increased physical health complaints as reported in previous studies (Reblin & Uchino, 2008; Zhang et al., 2020).

The females reported more decreased lack of social support than the males. The reasons for lacking social interactions for them were also different.

"The restrictions of lockdown have made me a statue. Before that, I used to walk regularly with my neighbouring friends. We enjoy gossiping with one another. We were visiting nearby markets and enjoyed fast food." (F_{-1})

"Before the pandemic, I used to watch movies with my female friends. We were periodically organizing entertainment and religious activities. We were enjoying a lot at the university women's club. This pandemic has decelerated all these. I feel frustrated when I think about earlier days. I feel sometimes helpless." (F_{-4})

"Although I used to be very busy in my professional life before the restrictions of lockdown, even if I spared some time for morning walks and social visits. I occasionally visited my friends' houses. On Sundays and holidays, I used to complete my financial and other job-related work. Now, all these have fully lost pace. It makes me feel tense and helpless." (M_2)

Age differences in decreased social support and interactions were also visible. The younger and older groups reported dissimilar reasons for their longing for social interactions.

"I regularly walked with my friends. We regularly discussed our future plans. We also used to help in managing social relationships and studies. Now, I miss all these things in my life. It makes me feel frustrated and isolated." (F-3, age < 40 years)

Although the lockdown is harming people in many ways but it has seriously distanced people from one another. My studies and future plans will face a great loss. I used to study with the help of my friends. We were availing of coaching for appearing in competitive examinations. Now the restrictions of the pandemic have snatched this opportunity. (M_{-10} , age < 40 years)

"I am very frustrated with the extreme restrictions due to the lockdown. I cannot meet people for help and support. I was planning to enlarge my business but this lockdown has finished this opportunity." (M_{5} , age > 40 years)

"Most of my earnings were based on my supporting hands. The restrictions have lowered my income seriously. I cannot talk or visit anybody even for important purposes. I am afraid of the consequences when someone will get seriously ill during this pandemic period. $(M_9, age > 40 \text{ years})$ "

Theme 3: Increased religious practices

The severity of the disease, lack of preventive and curative methods, and lockdown made the participants involved themselves in the enhanced religious faith and practices which provided them with some relief from the fear, pain, and negativity caused by the pandemic:

"After the outbreak of disease and restrictions on movement, I am regularly praying to God to save humanity from this disease." (M_{5})

"It may be the reflection of the anger of God. I also started observing fast." (F_3)

"Only God will save us.... We have started regular Hawan and puja (a kind of sacrifice and worship)." (M_{-7}) "I usually don't believe in God... The outbreak of this disease has compelled me to develop a strong faith in God." (M_{-3})

The uncertainty of the mode of infection, the unfamiliarity of the comprehensive symptomatic features, perceived incurability and fatality of the disease led to emerging myths and religious interpretations:

"Someone was telling me that this disease was predicted in a religious book." (M_{12})

"This disease is the symbol of the anger of God... People have become sinful." (F_1)

"Human beings have become opportunists... They deserve it." (M_8)



The pandemic also increased religious practices and reaffirmed faith in God and other supernatural powers (Theme 3). Religious practices have been suggested to have prophylactic impacts on health and other positive life outcomes. For example, religious practices have been observed to cultivate and catalyze meaning, connectedness, wisdom, awareness, adaptive attribution styles, moral judgment, positive relationships, and positive self-construal for their adherents irrespective of life and health conditions (Cohen, 2015; Paloutzian, 2013; Sharma et al., 2020). To some extent, these benefits of religious practices may have buffered the effects of perceived psychological distress and poor social support caused by COVID-19 and may have provided some relief from the perceived pains from the physical problems. Even death has a specific meaning in the Indian psyche, where the soul is believed to survive after death. The body is only a temporary shelter of the soul. Therefore, fear of death is not reflected very prominently in the themes of the current study.

Gender differences were most prominent in religious beliefs and practices. Although both genders described higher levels of religious engagement during the pandemic, women were more frequent and devoted more time to religious activities than men.

"I have always had a strong faith in God. I used to perform Hawan (a sacrifice) and Pooja (worship), but the experiences of this pandemic have made me more religious than before. It has realized me that only God can save me and my family. Now I devote a longer time to perform Pooja than before." (F_{-1})

"Doing Pooja is not new to me but the recent realities of life have made me realize the importance of religious activities and the existence of God. I always remain afraid of negative happening in my life. I have now become more devoted and dedicated to religious activities." (F_5)

"The pandemic has shaken me from within. It is God who is helping me nowadays. Now I have become more devoted and concentrated on religious activities. It instills a sense of security and confidence in my inner core of existence and helps to develop a feeling of strength to face this odd situation in my life." (M_10)

Age differences also surfaced in the religious practices. Although both age groups did believe in God and reported sufficient involvement in religious activities but the older group accepted more dependency on religious beliefs and practices.

"I intermittently used to involve in religious activities due to the pressure of my parents to a large extent. The current hopelessness has made me realize that God is everything. Now I can admit that my faith in religion and God have increased and got consolidated. It fills within me with a sense of support and security. Now I read Hanuman Chalisa (a Hindu religious text devoted to God Hanuman) more frequently." (M_11, age <40 years)

God is everywhere. I used to have a firm belief in religious practices as well as the existence of divine forces. These uncertain situations have made me more religious and believe in God. I do have a strong belief that *God will save my career.* (*F*_1, age <40 years)

"I used to believe in God and did worship regularly. Now I do more worship so that this bad time may pass away safely. God will save all." (F_3 , age >40 years)

"I firmly believe that God will save all of us. It is the God who is behind all these odds. Time will change. This situation has made me realize more strongly the existence of God and divine forces. The loss I am facing today will be returned to me by God at an appropriate time. I do practice Pooja with stronger faith and devotion." (M_{6} , age >40 years)

Theme 4: Development of physical health symptoms

Most of the participants reported severe psychological distress symptoms, panic experiences, and unparallel helplessness which may have caused them to develop negative physical health symptoms.

"The uncertainty of the lockdown has caused me regular headaches and stomach disturbance." (F_{-5})

"After I heard about this disease, my hunger has gone down... Usually, I take four to five loaves of bread; now *I* take only two ... *I* don't find enough taste in food." (M_{-7})

"Even a small intake of food takes a long to get digested... I have developed acidity... My throat burns." (M_11) "The lockdown has lowered my movement... I find my body stiff." (M 2)

"Usually, I used to sleep seven to eight hours... but fear of the unknown has dropped the duration and quality of sleep." (F_2)

The novelty, suddenness, and fatality of the recent pandemic caused the participants to perceive severe psychological distress and helplessness which resulted in the development of a variety of ill-physical symptoms:

"When I think about the future, I start getting nervous and afraid... Sometimes I feel a slow pain in my chest." (M_3)

"I felt tremors when my father was in the market and the Police were trying to impose a lockdown forcibly." (M_6)

"My daughter is outside for her studies... When I think about her loneliness and problems, my body gets shivering and my mouth gets dry." (F_1)

"When I heard people dying of this disease and facing a shortage of food and shelter... It makes me disturbed and my heartbeat frequently becomes abnormal. " (F_6)

Gender differences in the reporting of physical health were also observed. The females reported more health issues than the males.

"I have developed regular headaches and body aches after the pandemic has emerged. My digestion has been disrupted and my food intake has been seriously reduced. Before the pandemic, I only occasionally faced these health issues. It may be due to extreme fear and concerns of my family members." (F_1)

"The negative experiences and pain arising out of the uncertainties of the recent pandemic have significantly affected my physical health. Now it is difficult for me to have a good and sound sleep. I feel depressed. I have developed pain in my chest and lower abdomen." (F_{-7})

"I am facing some sort of problems in digesting even simpler foods. It has happened never to me before the pandemic. I feel uneasiness also." (M_3)

"I have developed a kind of obese tendency in my body. It takes me longer to digest even simpler food items. I feel heaviness and moderate pain in my body. It may be due to the decreased opportunity for movement." (M_2)

The current study has revealed specifically that the female participants reported higher psychological distress, lowered social support, and more physical health symptoms than their male counterparts during the pandemic period. These findings have been mirrored in many earlier studies. For example, a Chinese study reported that females were more vulnerable to mental or physical health problems than males (Song et al., 2020). Similar findings were also observed in other studies, which reported that females do show poor psychological and health outcomes in the face of stressful situations (Ishiguro et al., 2019; Vigna et al., 2019). Poor life outcomes during extremely stressful situations for females may be caused by many reasons. For example, gender differences in responsivity to the social environmental stimulations and differences in psychodynamic and cognitive processes of males and females may be significant causal factors behind their poor health and other life outcomes (Slavich & Sacher, 2019; Stevens et al., 2016). Moreover, females use self-perspective to overestimate the pain of negative stimulation, whereas males do the reverse (Luo et al., 2018). Thus, the gender differences in behavioural responses to distress, cognitive structuring, and experiences of emotions have been suggested to be important for dissimilar experiences of psychological distress during odd situations among males and females (Street & Dardis, 2018).

The restrictions on movement and physical contact with others may be another cause of gender differences in psychological distress (Government of Canada, 2020). The greater psychological distress during Covid-19 for females may occur because of the burden of responsibilities due to the full-time stay of the family members at home, and the lack of support from other family members may overstress them (Bradbury-Jones & Isham, 2020). Further, a study has shown that women show more worry and concern about their family that they will get ill from COVID-19, and that their family may face financial problems. This may be another reason for their higher distress than the males (Fitzpatrick et al., 2020; Nelson, 2020). Gender role differences and expectations in India may contribute to specific responses. In India, women are supposed to be more confined to home affairs, including the welfare of their children and other kith and kin. Women are called 'Annapurna' (hunger satisfiers), and this is the reason for their primary concern about the shortage of food grains and other essential commodities. Due to restrictions, women hardly get any chance for socialization and participation in group and religious activities, which act as shock absorbers, emotional ventilators, and problem-solving skill boosters with illumination from other socially skilled women. Men have some benefits over women as gender expectations have taught them to be bold and face adversities confidently as they are supposed to be bread earners and protectors of their families. The quarantine experiences and home confinements have different meaning for males and females. Here men walk, shop, and involve in informal gossip and religious activities, which are also the sources of draining out their stress and developing skills for familial and social conflict resolutions, when the quarantine period is relaxed, which is not easily available to women.

Age differences were also recorded in their negative health symptoms. For example, older age group participants reported more physical health issues than younger ones.

"The passive and boring schedule of the lockdown has made me idle. Now I do feel decreased hunger. Sometimes, I do feel moderate headaches also." (M_3 , age< 40 years)

"I face some physical health issues during the restrictions of lockdown. My food intake has decreased significantly. I feel low." (F_2, age< 40 years)

"The negativity and inability of the restrictions of lockdown during COVID-19 have made me physically ill. I have developed some health problems. I feel moderate chest pain, lowered hunger, and a bad taste. These symptoms get more overt when I keep thinking about the loss in business for a longer time." (M_5 , age> 40 years)

"I have developed insomnia. I cannot sleep properly since my daughter is staying outside for her studies. I am worried as to how she will come back. My food intake has also decreased and I feel pain in my chest and stomach." (F_3 , age> 40 years)

Age comparison showed that there were significant perceived differences in the psychological distress, social support, religious practices, and physical health problems of the participants in the current study. Similar findings were reported by some recent studies which observed that younger adults perceive more distress than middle-aged adults or older adults (Huang & Zhao, 2020; Leung et al., 2020). It has been argued that elder adults pay more attention to positive stimulation and neglect negative ones as compared to younger ones (Jeronimus et al., 2019). Younger adults may face more stress due to the demands of life, social responsibility, parental expectations, worries about infection, and lack of resources as compared to middle-aged adults. These may be the reasons behind their higher stress and health problems and lower social support as compared to middle-aged adults (Jeronimus et al., 2019). Due to the differences in life goals, career prospects, employment status, family responsibilities, interpersonal conflicts, concerns for the pandemic threats, experiences of positive and negative affect, perceived control over stressors, perceived coping efficacy, attentional, appraisal, and behavioural resources, broader stress context, stressor reactivity and physical health and safety issues of the younger and middle-aged adults, they may experience dissimilar distress, social support, religious practices/beliefs, and physical health problems (Charles, 2010; Klaiber et al., 2020; Scott et al., 2013; Wrzus et al., 2013).¹

Conclusions, implications, and directions for future research

The findings substantiated the contention that the pandemic of COVID-19 catalyzed a variety of perceived psychological distress and poor social support, which may be argued to cumulatively cause many ill-physical symptoms. Extreme fear, anxiety, panic experiences, insecurity, apprehension, and helplessness were the chief perceived psychological distress that may have caused ill-health symptoms.

There are many strengths of the current study. For instance, it attempted to understand the psychological impacts of the COVID-19 pandemic and collected data during the quarantine period characterized by unparallel restrictions and uncertainty in the life of people, which may not be expected to get repeated in their lifetime. It also contributes at a methodological level by collecting data on phone calls, and the findings reveal that this method proved to be an efficacious one and may contribute to the scientific field of inquiry. The study attempted to capture the unparallel psychological distress caused by uncertain, fatal, and restrictive experiences of the participants during a nationwide lockdown in India to prevent further spreading of COVID-19. Though Indian women and men belonging to 'a collectivistic society whose psychological structuring is shaped and guided by larger collective values, group-based identity, strong adherence to religious beliefs and interdependent self-construal', women (as opposed to men) do not have the opportunity to "utilize" the collective values of sharing sources or being helped or well treated in the certain situation of the pandemic, studies reported similar outcomes in Western as well as non-Western cultures due to the restrictions and fear (Gebhard et al., 2020) and differences in attitudes and behaviours to the pandemic of both genders(Galasso et al., 2020).

The findings of the current study necessitate that new assumptions and methods should be discovered on a priority basis with their ground in realities, which should be able to call individual as well as collective actions to deal with the menace of the recent and future epidemics. Future researchers may consider exploring positive health practices and health conceptualizations prevalent among diverse cultural groups to help people to face

¹ Codes from M_1 to M_12 and F_1 to F_6 were assigned to the males and females, respectively.

the negative consequences of an epidemic in the future. Concerted efforts from researchers, policymakers, health professionals, and the public are recommended to face the present and future threats.

Limitations

The findings were based on a qualitative study that exclusively relied on data collected through phone calls. Thus, the strengths of face-to-face interactions may be lacking as the method of responding to their experiences and involvement may differ significantly on phone calls. The participants were Hindi-speaking, and the contents of the interviews were translated into English; thus, it may be possible that some important aspects of meaning may be missing in the process of translation. The participants belonged to Indian culture, where most people are religious and adhere to various religious beliefs and practices. Here the mindset of people is more collectivistic, and their self-construal is more group-identity oriented. This may limit the generalizability of the findings to persons carrying individualistic values. Thus, some cross-cultural issues and methodological challenges may represent some important limitations. Lastly, the current study recruited a heterogeneous adult sample (25 and 56 years of age) due to the difficulties in the availability of older adults and elderly persons as well as young adults, adolescents, and children. Thus, the findings will require precautions in generalization.

References

- Adolphs, R. (2003). Cognitive neuroscience of human social behaviour. *Nature Reviews Neuroscience*, *4*(3), 165–178. <u>https://doi.org/10.1038/nrn1056</u>
- Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavioral change. *Psychological Review*, *84*(2), 191–215. <u>https://doi.org/10.1037/0033-295X.84.2.191</u>
- Bandura, A. (1997). Self-efficacy: The exercise of control. W.H. Freeman.
- Barbour, R. S. (2001). Checklists for improving rigour in qualitative research: A case of the tail wagging the dog? *BMJ*, 322(7294), 1115–1117. <u>https://doi.org/10.1136/bmj.322.7294.1115</u>
- Barrera, M., & Ainlay, S. L. (1983). The structure of social support: A conceptual and empirical analysis. *Journal of Community Psychology*, *11*(2), 133–143. <u>https://doi.org/10.1002/1520-6629(198304)11:2<133::AID-JCOP2290110207>3.0.CO;2-L</u>
- Biswal, R., Subudhi, C., & Acharya, S. (2017). Healers and healing practices of mental illness in India: The role of proposed eclectic healing model. *Journal of Health Research and Reviews*, *4*(3), 89. https://doi.org/10.4103/jhrr.jhrr_64_17
- Bradbury-Jones, C., & Isham, L. (2020). The pandemic paradox: The consequences of COVID-19 on domestic violence. *Journal of Clinical Nursing*, 29(13–14), 2047–2049. https://doi.org/10.1111/jocn.15296
- Brooks, S. K., Webster, R. K., Smith, L. E., Woodland, L., Wessely, S., Greenberg, N., & Rubin, G. J. (2020). The psychological impact of quarantine and how to reduce it: Rapid review of the evidence. *The Lancet*, 395(10227), 912–920. https://doi.org/10.1016/S0140-6736(20)30460-8
- Cava, M. A., Fay, K. E., Beanlands, H. J., McCay, E. A., & Wignall, R. (2005). The Experience of Quarantine for Individuals Affected by SARS in Toronto. *Public Health Nursing*, *22*(5), 398–406. https://doi.org/10.1111/j.0737-1209.2005.220504.x
- Charles, S. T. (2010). Strength and vulnerability integration: A model of emotional well-being across adulthood. *Psychological Bulletin*, *136*(6), 1068–1091. <u>https://doi.org/10.1037/a0021232</u>
- Cohen, A. B. (2015). Religion's Profound Influences on Psychology: Morality, Intergroup Relations, Self-Construal, and Enculturation. *Current Directions in Psychological Science*, 24(1), 77–82. https://doi.org/10.1177/0963721414553265
- Creswell, J. W. (2004). Designing A Mixed Methods Study In Primary Care. *The Annals of Family Medicine*, 2(1), 7–12. <u>https://doi.org/10.1370/afm.104</u>
- Creswell, J. W. (2014). *Research design: Qualitative, quantitative, and mixed methods approaches* (4th ed). SAGE Publications.
- Dalal, A. K. (2000). Living with a Chronic Disease: Healing and Psychological Adjustment in Indian Society. *Psychology and Developing Societies*, *12*(1), 67–81. <u>https://doi.org/10.1177/097133360001200105</u>
- Dalal, A. K. (2016). Cultural psychology of health in India: Well-being, medicine and traditional health care. SAGE.
- de Zwart, O., Veldhuijzen, I. K., Elam, G., Aro, A. R., Abraham, T., Bishop, G. D., Voeten, H. A. C. M., Richardus, J. H., & Brug, J. (2009). Perceived Threat, Risk Perception, and Efficacy Beliefs Related to SARS and Other

(Emerging) Infectious Diseases: Results of an International Survey. *International Journal of Behavioral Medicine*, *16*(1), 30–40. <u>https://doi.org/10.1007/s12529-008-9008-2</u>

- DiGiovanni, C., Conley, J., Chiu, D., & Zaborski, J. (2004). Factors Influencing Compliance with Quarantine in Toronto During the 2003 SARS Outbreak. *Biosecurity and Bioterrorism: Biodefense Strategy, Practice, and Science*, 2(4), 265–272. <u>https://doi.org/10.1089/bsp.2004.2.265</u>
- Dunbar, R. I. M. (2009). The social brain hypothesis and its implications for social evolution. *Annals of Human Biology*, 36(5), 562–572. <u>https://doi.org/10.1080/03014460902960289</u>
- Fitzpatrick, K. M., Harris, C., & Drawve, G. (2020). Fear of COVID-19 and the mental health consequences in America. *Psychological Trauma: Theory, Research, Practice, and Policy, 12*(S1), S17–S21. https://doi.org/10.1037/tra0000924
- Fusch, P., & Ness, L. (2015). Are We There Yet? Data Saturation in Qualitative Research. *The Qualitative Report*, 20(9), 1408–1416.<u>https://doi.org/10.46743/2160-3715/2015.2281</u>
- Galasso, V., Pons, V., Profeta, P., Becher, M., Brouard, S., & Foucault, M. (2020). Gender differences in COVID-19 attitudes and behavior: Panel evidence from eight countries. *Proceedings of the National Academy of Sciences*, 117(44), 27285–27291. <u>https://doi.org/10.1073/pnas.2012520117</u>
- Gebhard, C., Regitz-Zagrosek, V., Neuhauser, H. K., Morgan, R., & Klein, S. L. (2020). Impact of sex and gender on COVID-19 outcomes in Europe. *Biology of Sex Differences*, *11*(1), 29. <u>https://doi.org/10.1186/s13293-020-00304-9</u>
- Government of Canada, S. C. (2020, July 9). *Gender differences in mental health during the COVID-19 pandemic.* <u>Gender differences in mental health during the COVID-19 pandemic (statcan.gc.ca)</u>
- Guest, G., Bunce, A., & Johnson, L. (2006). How Many Interviews Are Enough?: An Experiment with Data Saturation and Variability. *Field Methods*, *18*(1), 59–82. <u>https://doi.org/10.1177/1525822X05279903</u>
- Guest, G., MacQueen, K. M., & Namey, E. E. (2012). *Applied thematic analysis*. Sage Publications.<u>https://doi.org/10.4135/9781483384436</u>
- Hawryluck, L., Gold, W. L., Robinson, S., Pogorski, S., Galea, S., & Styra, R. (2004). SARS Control and Psychological Effects of Quarantine, Toronto, Canada. *Emerging Infectious Diseases*, *10*(7), 1206–1212. https://doi.org/10.3201/eid1007.030703
- Huang, Y., & Zhao, N. (2020). Generalized anxiety disorder, depressive symptoms and sleep quality during COVID-19 outbreak in China: A web-based cross-sectional survey. *Psychiatry Research*, *288*, 112954. https://doi.org/10.1016/j.psychres.2020.112954
- Isham, L., Griffith, L., Boylan, A., Hicks, A., Wilson, N., Byrne, R., Sheaves, B., Bentall, R. P., & Freeman, D. (2019). Understanding, treating, and renaming grandiose delusions: A qualitative study. *Psychology and Psychotherapy: Theory, Research and Practice*, papt.12260. <u>https://doi.org/10.1111/papt.12260</u>
- Ishiguro, A., Inoue, M., Fisher, J., Inoue, M., Matsumoto, S., & Yamaoka, K. (2019). Gender-Based Risk and Protective Factors for Psychological Distress in the Midterm Recovery Period Following the Great East Japan Earthquake. *Disaster Medicine and Public Health Preparedness*, *13*(03), 487–496. <u>https://doi.org/10.1017/dmp.2018.80</u>
- Jeronimus, B. F., Snippe, E., Emerencia, A. C., Jonge, P., & Bos, E. H. (2019). Acute stress responses after indirect exposure to the MH 17 airplane crash. *British Journal of Psychology*, *110*(4), 790–813. https://doi.org/10.1111/bjop.12358
- Kang, L., Ma, S., Chen, M., Yang, J., Wang, Y., Li, R., Yao, L., Bai, H., Cai, Z., Xiang Yang, B., Hu, S., Zhang, K., Wang, G., Ma, C., & Liu, Z. (2020). Impact on mental health and perceptions of psychological care among medical and nursing staff in Wuhan during the 2019 novel coronavirus disease outbreak: A cross-sectional study. *Brain, Behavior, and Immunity*, *87*, 11–17. <u>https://doi.org/10.1016/j.bbi.2020.03.028</u>
- Klaiber, P., Wen, J. H., DeLongis, A., & Sin, N. L. (2020). The ups and downs of daily life during COVID-19: Age differences in affect, stress, and positive events. *The Journals of Gerontology: Series B*, gbaao96. https://doi.org/10.1093/geronb/gbaa096
- Krach, S. (2010). The rewarding nature of social interactions. *Frontiers in Behavioral Neuroscience*. <u>https://doi.org/10.3389/fnbeh.2010.00022</u>
- Lee, S., Chan, L. Y. Y., Chau, A. M. Y., Kwok, K. P. S., & Kleinman, A. (2005). The experience of SARS-related stigma at Amoy Gardens. *Social Science & Medicine*, *61*(9), 2038–2046. https://doi.org/10.1016/j.socscimed.2005.04.010

- Leung, K., Wu, J. T., Liu, D., & Leung, G. M. (2020). First-wave COVID-19 transmissibility and severity in China outside Hubei after control measures, and second-wave scenario planning: A modelling impact assessment. *The Lancet*, 395(10233), 1382–1393. <u>https://doi.org/10.1016/S0140-6736(20)30746-7</u>
- Leventhal, H., Leventhal, E. A., & Contrada, R. J. (1998). Self-regulation, health, and behavior: A perceptual-cognitive approach. *Psychology & Health*, *13*(4), 717–733. <u>https://doi.org/10.1080/08870449808407425</u>
- Levitt, H. M., Bamberg, M., Creswell, J. W., Frost, D. M., Josselson, R., & Suárez-Orozco, C. (2018). Journal article reporting standards for qualitative primary, qualitative meta-analytic, and mixed methods research in psychology: The APA Publications and Communications Board task force report. *American Psychologist*, 73(1), 26–46. <u>https://doi.org/10.1037/ampo000151</u>
- Li, Q., Guan, X., Wu, P., Wang, X., Zhou, L., Tong, Y., Ren, R., Leung, K. S. M., Lau, E. H. Y., Wong, J. Y., Xing, X., Xiang, N., Wu, Y., Li, C., Chen, Q., Li, D., Liu, T., Zhao, J., Liu, M., ... Feng, Z. (2020). Early Transmission Dynamics in Wuhan, China, of Novel Coronavirus–Infected Pneumonia. *New England Journal of Medicine*, 382(13), 1199–1207. <u>https://doi.org/10.1056/NEJM0a2001316</u>
- Liu, J., Liao, X., Qian, S., Yuan, J., Wang, F., Liu, Y., Wang, Z., Wang, F.-S., Liu, L., & Zhang, Z. (2020). Community Transmission of Severe Acute Respiratory Syndrome Coronavirus 2, Shenzhen, China, 2020. *Emerging Infectious Diseases*, 26(6). https://doi.org/10.3201/eid2606.200239
- Luo, M., Guo, L., Yu, M., Jiang, W., & Wang, H. (2020). The psychological and mental impact of coronavirus disease 2019 (COVID-19) on medical staff and general public A systematic review and meta-analysis. *Psychiatry Research*, 291, 113190. <u>https://doi.org/10.1016/j.psychres.2020.113190</u>
- Luo, P., Xu, D., Huang, F., & Wei, F. (2018). Emotion intensity modulates perspective taking in men and women: An event-related potential study. *NeuroReport*, 29(9), 773–778. <u>https://doi.org/10.1097/WNR.00000000001030</u>
- Mihashi, M., Otsubo, Y., Yinjuan, X., Nagatomi, K., Hoshiko, M., & Ishitake, T. (2009). Predictive factors of psychological disorder development during recovery following SARS outbreak. *Health Psychology*, *28*(1), 91–100. <u>https://doi.org/10.1037/a0013674</u>
- Nelson, A. (2020). *How Women and Men React to COVID-19* | *Psychology Today*. <u>How Women and Men React to</u> <u>COVID-19</u> | <u>Psychology Today</u>
- Paloutzian, R. F. (2013). Psychology of Religion. In A. L. C. Runehov & L. Oviedo (Eds.), *Encyclopedia of Sciences and Religions* (pp. 1904–1910). Springer Netherlands. <u>https://doi.org/10.1007/978-1-4020-8265-8_939</u>
- Pan American Health Organization. (2019). *Public Policies and Health System and Services*. Pan American Health Organization Editors: Pan American Health Organization. <u>Core Indicators 2019: Health Trends in the</u> <u>Americas (paho.org)</u>
- Pan, P. J. D., Chang, S.-H., & Yu, Y.-Y. (2005). A Support Group for Home-Quarantined College Students Exposed to SARS: Learning from Practice. *The Journal for Specialists in Group Work*, 30(4), 363–374. https://doi.org/10.1080/01933920500186951
- Qiu, J., Shen, B., Zhao, M., Wang, Z., Xie, B., & Xu, Y. (2020). A nationwide survey of psychological distress among Chinese people in the COVID-19 epidemic: Implications and policy recommendations. *General Psychiatry*, 33(2), e100213. <u>https://doi.org/10.1136/gpsych-2020-100213</u>
- Rajkumar, R. P. (2020). COVID-19 and mental health: A review of the existing literature. *Asian Journal of Psychiatry*, 52, 102066. <u>https://doi.org/10.1136/gpsych-2020-100213</u>
- Reblin, M., & Uchino, B. N. (2008). Social and emotional support and its implication for health: *Current Opinion in Psychiatry*, 21(2), 201–205. <u>https://doi.org/10.1097/YCO.ob013e3282f3ad89</u>
- Rossi, R., Socci, V., Talevi, D., Mensi, S., Niolu, C., Pacitti, F., Di Marco, A., Rossi, A., Siracusano, A., & Di Lorenzo, G. (2020). COVID-19 Pandemic and Lockdown Measures Impact on Mental Health Among the General Population in Italy. *Frontiers in Psychiatry*, *11*, 790. <u>https://doi.org/10.3389/fpsyt.2020.00790</u>
- Saunders, B., Sim, J., Kingstone, T., Baker, S., Waterfield, J., Bartlam, B., Burroughs, H., & Jinks, C. (2018). Saturation in qualitative research: Exploring its conceptualization and operationalization. *Quality & Quantity*, *52*(4), 1893–1907. <u>https://doi.org/10.1007/s11135-017-0574-8</u>
- Scott, S. B., Sliwinski, M. J., & Blanchard-Fields, F. (2013). Age differences in emotional responses to daily stress: The role of timing, severity, and global perceived stress. *Psychology and Aging*, 28(4), 1076–1087. https://doi.org/10.1037/a0034000
- Seeger, M. W., Sellnow, T. L., & Ulmer, R. R. (1998). Communication, Organization, and Crisis. Annals of the International Communication Association, 21(1), 231–276. https://doi.org/10.1080/23808985.1998.11678952

Sellnow, T. L., & Seeger, M. W. (2013). Theorizing crisis communication. Wiley-Blackwell.

- Serafini, G., Parmigiani, B., Amerio, A., Aguglia, A., Sher, L., & Amore, M. (2020). The psychological impact of COVID-19 on the mental health in the general population. *QJM: An International Journal of Medicine*, *113*(8), 531–537. <u>https://doi.org/10.1093/qimed/hcaa201</u>
- Sharma, D. N., Tiwari, G. K., & Rai, P. K. (2020). The spiritual beliefs of cancer survivors: A thematic analysis. *Psychology, Community & Health*, *8*(1), 139–157. <u>https://doi.org/10.5964/pch.v8i1.290</u>
- Shi, J., Huang, A., Jia, Y., & Yang, X. (2020). Perceived stress and social support influence anxiety symptoms of Chinese family caregivers of community-dwelling older adults: A cross-sectional study. *Psychogeriatrics*, 20(4), 377–384. <u>https://doi.org/10.1111/psyg.12510</u>
- Slavich, G. M., & Sacher, J. (2019). Stress, sex hormones, inflammation, and major depressive disorder: Extending Social Signal Transduction Theory of Depression to account for sex differences in mood disorders. *Psychopharmacology*, 236(10), 3063–3079. https://doi.org/10.1007/s00213-019-05326-9
- Song, K., Xu, R., Stratton, T. D., Kavcic, V., Luo, D., Hou, F., Bi, F., Jiao, R., Yan, S., & Jiang, Y. (2020). *Sex differences and Psychological Stress: Responses to the COVID-19 epidemic in China* [Preprint]. Epidemiology. https://doi.org/10.1101/2020.04.29.20084061
- Sprang, G., & Silman, M. (2013). Posttraumatic Stress Disorder in Parents and Youth After Health-Related Disasters. *Disaster Medicine and Public Health Preparedness*, 7(1), 105–110. https://doi.org/10.1017/dmp.2013.22
- Srivastava, P., & Hopwood, N. (2009). A Practical Iterative Framework for Qualitative Data Analysis. *International Journal of Qualitative Methods*, *8*(1), 76–84. <u>https://doi.org/10.1177/160940690900800107</u>
- Stevens, J. S., van Rooij, S. J. H., & Jovanovic, T. (2016). Developmental Contributors to Trauma Response: The Importance of Sensitive Periods, Early Environment, and Sex Differences. In E. Vermetten, D. G. Baker, & V. B. Risbrough (Eds.), *Behavioral Neurobiology of PTSD* (Vol. 38, pp. 1–22). Springer International Publishing. <u>https://doi.org/10.1007/7854_2016_38</u>
- Street, A. E., & Dardis, C. M. (2018). Using a social construction of gender lens to understand gender differences in posttraumatic stress disorder. *Clinical Psychology Review*, *66*, 97–105. <u>https://doi.org/10.1016/j.cpr.2018.03.001</u>
- Strong, P. (1990). Epidemic psychology: A model. *Sociology of Health and Illness*, *12*(3), 249–259. https://doi.org/10.1111/1467-9566.ep11347150
- Sun, J., Harris, K., & Vazire, S. (2019). Is well-being associated with the quantity and quality of social interactions? *Journal of Personality and Social Psychology*. <u>https://doi.org/10.1037/pspp0000272</u>
- Tiwari, G. K., Singh, A. K., Parihar, P., Pandey, R., Sharma, D. N., & Rai, P. K. (2023). Understanding the perceived psychological distress and health outcomes of children during COVID-19 pandemic. *The Educational and Developmental Psychologist*, 40(1), 103-114. <u>https://doi.org/10.1080/20590776.2021.1899749</u>
- Tiwari, G. K., Tiwari, R. P., Pandey, R., Ray, B., Dwivedi, A., Sharma, D. N., Singh, P., & Tiwari, A. K. (2020). *The life outcomes of children during COVID-19: Exploring the protective roles of the joint and nuclear families in India* [Preprint]. Authorea: Open Research Collaboration and Publishing. https://doi.org/10.22541/au.159769493.33057412
- Varshney, M., Parel, J. T., Raizada, N., & Sarin, S. K. (2020). Initial psychological impact of COVID-19 and its correlates in Indian Community: An online (FEEL-COVID) survey. *PLOS ONE*, *15*(5), Article e0233874. <u>https://doi.org/10.1371/journal.pone.0233874</u>
- Vigna, L., Brunani, A., Brugnera, A., Grossi, E., Compare, A., Tirelli, A. S., Conti, D. M., Agnelli, G. M., Andersen, L. L., Buscema, M., & Riboldi, L. (2019). Determinants of metabolic syndrome in obese workers: Gender differences in perceived job-related stress and in psychological characteristics identified using artificial neural networks. *Eating and Weight Disorders - Studies on Anorexia, Bulimia and Obesity*, 24(1), 73–81. https://doi.org/10.1007/s40519-018-0536-8
- Wang, Y., Xu, B., Zhao, G., Cao, R., He, X., & Fu, S. (2011). Is quarantine related to immediate negative psychological consequences during the 2009 H1N1 epidemic? *General Hospital Psychiatry*, 33(1), 75–77. https://doi.org/10.1016/j.genhosppsych.2010.11.0011
- Weber, J., & Goldmeier, D. (1983). Medicine and the Media. *British Medical Journal*, *287*(6389), 420-420. https://doi.org/10.1136/bmj.287.6389.420
- Wrzus, C., Müller, V., Wagner, G. G., Lindenberger, U., & Riediger, M. (2013). Affective and cardiovascular responding to unpleasant events from adolescence to old age: Complexity of events matters. *Developmental Psychology*, 49(2), 384–397. <u>https://doi.org/10.1037/a0028325</u>

- Yeager, K. R., & Roberts, A. R. (2015). Bridging the Past and Present to the Future of Crisis Intervention and Crisis Management. In K. R. Yeager & A. R. Roberts, *Crisis Intervention Handbook: Assessment, Treatment, and Research* (Fourth, pp. 3–35). Oxford University Press.
- Yoon, M.K., Kim, S.-Y., Ko, H.-S., & Lee, M.-S. (2016). System effectiveness of detection, brief intervention and refer to treatment for the people with post-traumatic emotional distress by MERS: A case report of community-based proactive intervention in South Korea. *International Journal of Mental Health Systems*, 10(1), 51. https://doi.org/10.1186/s13033-016-0083-5
- Zhang, J., Wu, W., Zhao, X., & Zhang, W. (2020). Recommended psychological crisis intervention response to the 2019 novel coronavirus pneumonia outbreak in China: A model of West China Hospital. *PrecisionClinicalMedicine*, *3*(1), 3–8. <u>https://doi.org/10.1093/pcmedi/pbaa006</u>

ΕΜΠΕΙΡΙΚΗ ΕΡΓΑΣΙΑ | RESEARCH PAPER

Μια Αφηγηματική Θεματική Ανάλυση της αντιληπτής ψυχολογικής δυσφορίας και των αποτελεσμάτων υγείας σε ενήλικες Ινδούς κατά την πρώιμη φάση της πανδημίας του COVID-19

Gyanesh Kumar TIWARI¹, Pramod Kumar RAI¹, Abhigyan DWIVEDI², Bablu RAY², Ashutosh PANDEY³, Rakesh PANDEY³

¹ Department of Psychology, School of Humanities & Social Sciences, Doctor Harisingh Gour Vishwavidyalaya, Sagar, Madhya Pradesh, India

²Department of Linguistics, School of Languages, Doctor Harisingh Gour Vishwavidyalaya, Sagar, Madhya Pradesh, India ³Department of Psychology, Faculty of Social Sciences, Banaras Hindu University, Uttar Pradesh, India

ΛΕΞΕΙΣ ΚΛΕΙΔΙΑ

Πανδημία COVID-19, Ψυχολογική δυσφορία & αποτελέσματα στην υγεία, Κοινωνική υποστήριξη, Θρησκευτικές πρακτικές, Αφηγηματική θεματική ανάλυση

ΣΤΟΙΧΕΙΑ ΕΠΙΚΟΙΝΩΝΙΑΣ

Gyanesh Kumar Tiwari Department of Psychology, School of Humanities & Social Sciences, Doctor Harisingh Gour Vishwavidyalaya, Sagar, 470003, Madhya Pradesh, India gyaneshpsychology@gmail.com

ΠΕΡΙΛΗΨΗ

Η COVID-19 συνιστά μια σοβαρή, νέα και επιβλαβή ασθένεια η οποία έθεσε παγκοσμίως νέες προκλήσεις για την ευημερία των ανθρώπων και κατέληξε σε αρνητικές συνέπειες για τη ζωή τους. Η παρούσα μελέτη διερεύνησε την αντιληπτή ψυχολογική δυσφορία και τις επακόλουθες επιπτώσεις στην υγεία που προκλήθηκαν από την COVID-19. Χρησιμοποιήθηκε η μέθοδος της Αφηγηματικής Θεματικής Ανάλυσης. Δεκαοκτώ συμμετέχοντες, αποτελούμενοι από 12 άνδρες και 6 γυναίκες, απάντησαν σχετικά με τις εμπειρίες τους από την πρόσφατη επιδημία της νόσου COVID-19. Τα δεδομένα συλλέχθηκαν μέσω τηλεφωνικής ημιδομημένης συνέντευξης, η οποία αναλύθηκε με τη μέθοδο της Θεματικής Ανάλυσης. Δημιουργήθηκαν τέσσερα θέματα: δυσπροσαρμοστικές ψυχολογικές συνέπειες της COVID-19, αντιληπτή ανεπαρκής κοινωνική υποστήριξη, αυξημένες θρησκευτικές πρακτικές και ανάπτυξη συμπτωμάτων σωματικής υγείας. Το ακραίο άγχος, οι εμπειρίες πανικού, η ανασφάλεια, η αβοηθησία, η υπερ-επιφυλακτικότητα και οι αρνητικές αποδόσεις αντιπροσώπευσαν την ψυχολογική δυσφορία, ενώ οι μειωμένες κοινωνικές αλληλεπιδράσεις και η επιβεβλημένη κοινωνική αποστασιοποίηση χαρακτήρισαν την αντιληπτή κοινωνική υποστήριξη. Η αυξημένη εξάρτηση από μύθους, θεϊκές ερμηνείες και την πίστη στον Θεό ανέδειξαν τη θρησκευτικότητα. Η μειωμένη όρεξη για φαγητό, η αϋπνία, ο πονοκέφαλος, τα αναπνευστικά προβλήματα και το αίσθημα παλμών ήταν ορισμένα από τα αρνητικά αποτελέσματα στην υγεία. Η πανδημία διαμόρφωσε τη φύση και την έκταση της αντιληπτής ψυχολογικής δυσφορίας, της κοινωνικής υποστήριξης και των θρησκευτικών πρακτικών. Τα δύο πρώτα μπορεί να προκάλεσαν αρνητικά αποτελέσματα για την υγεία και την ευημερία, ενώ οι θρησκευτικές πρακτικές διατήρησαν την ισορροπία μεταξύ των υπόλοιπων τριών. Συνιστώνται άμεσες διεπιστημονικές προσπάθειες για την αποτελεσματική πρόληψη, θεραπεία και προαγωγή της ευημερίας των ατόμων που έχουν υποστεί τις επιπτώσεις της νόσου. Μπορούν επίσης να διερευνηθούν θετικές πρακτικές υγείας που ενσωματώνονται σε διαφορετικά κοινωνικοπολιτισμικά συστήματα για να βοηθηθούν οι άνθρωποι που αντιμετωπίζουν τις αρνητικές συνέπειες των πρόσφατων και μελλοντικών πανδημιών. Συζητούνται οι επιπτώσεις και οι περιορισμοί της μελέτης.

© 2023, Gyanesh Kumar Tiwari, Pramod Kumar Rai, Abhigyan Dwivedi, Bablu Ray, Ashutosh Pandey, Rakesh Pandey Licence CC-BY-SA 4.0