

An Overview of the Psychological Impact of COVID - 19 on the School Children

Najia Albashir Mahdawi^{1*}, Zainab S Abdul-hafed Shagloof²

^{1*} Medicine Department, Faculty of Medicine, Gharyian University, Libya

² Pediatric department, Primary Health Care Corporation, Doha. Qatar

*Najia.mahdawi@gu.edu.ly , zainabshagloof@gmail.com

Abstract

Pandemics have taken place throughout history at various times. Infections known as pandemics cause the deaths of millions and severely harm society's emotional wellbeing. Additionally, it interfered with kids' ability to learn. Similar to the horrific occurrences that have caused various psychological problems in people throughout history, COVID-19 would have a negative psychological influence on every person. It is crucial to conduct scientific studies on COVID-19 to prevent it from having negative societal, cultural, psychological, academic, and economic implications, especially on children. Once the COVID-19 epidemic has been contained for a duration, it'll be simpler to comprehend the emotional effects on individuals. The severe psychological repercussions of the COVID-19 Outbreak do not spare kids. They undergo major shifts in behavioral habits, parental anguish, worries, and social and physical isolation. It is essential to successfully grasp their thoughts and behaviors to meet their needs throughout this Outbreak. The potential psychological impacts of COVID-19 on schoolchildren's susceptibility are examined in this study, along with a summary of the warning signs of stress across various demographics and the treatments and tools that exist to enhance children's wellbeing and mental wellbeing throughout these challenging circumstances. It is globally supported that children and adolescents' mental health is a top priority as an integral part of any global, locally-driven response to the COVID-19 Outbreak.

Keywords: School children, mental health, psychological stress

Introduction

In the course of human history, outbreaks have occasionally occurred. These illnesses kill thousands of people and have a detrimental impact on the general public's psychological health. A pandemic, as defined by the World Health Organization in 2020, is the global

transmission of a new illness that has caused injury and death to many people. Since civilization, pandemics have occurred frequently. Every pandemic has a devastating societal, political, and psychological impact on people. For instance, millions of individuals have been adversely impacted by pandemics like Middle East Respiratory Syndrome (MERS), influenza and Severe Acute Respiratory Syndrome (SARS) [1].

Global public welfare is being threatened by the coronavirus disease pandemic COVID-19, which was initially discovered and recognized in individuals who were infected at a seafood market in Wuhan Town, Hubei Region, China, in Dec. 2019, causing the disease that led to COVID-19 comparable to studies on the Middle East respiratory syndrome coronavirus and SARS-CoV [2].

The World Health Organization has raised issues about the pandemic's psychological and mental health impacts. They hypothesize that proposed laws like self-quarantine and containment have given a different perspective on people's normal tasks, procedures, and way of life, which might also increase the sense of isolation, nervousness, depressed mood, sleeping problems, detrimental alcohol and drug utilization, and self-harm or suicidal behaviour for all people worldwide. Nearly every element of everyday life has been impacted by this horrific epidemic, which has contributed to an increase in mental health and associated illnesses. Additional difficulties for people, organizations, and organizations have resulted from the impending spike in mental health conditions and a rise in drug addiction and suicidal fatalities. Like COVID-19, people of various colours and ethnicities, kids, seniors, members of economically disadvantaged sectors, and healthcare providers were all impacted by the quarantine and their psychological health. There are so many risk variables that have been linked to depressive symptoms in the COVID-19 Outbreak. When contrasted with their male counterparts, women are reportedly typically more prone to have depression disorders. It is believed that to prevent the health care system from being overburdened, a global health approach is essential. Such a technique was developed with the understanding that emotional benefits and the upholding of interpersonal, social, regional, and regional cultural and religious customs about death and grief considerably aid healing from loss. These customs, such as the opportunity to say farewell to the departed, had been interrupted by social separation, which also created solitude. Youngsters who suddenly lose a parent or a grandparent due to COVID-19 have been impacted by similar techniques. It upset the child's perception of the outside world as secure and dependable and of the caregivers as a

"protective barrier" [3]. Parents were overburdened and unable to control their kids' anxieties and melancholy. In moments of emergency, it is easy to forget about the emotional anguish a grieving child is going through. To help with the execution of this preventative, public health programs and public policy proposals were developed.

When one considers how outbreaks influence various populations, it becomes clear that sufferers, their loved ones, medical professionals, and everyone else susceptible to the illness are all highly influenced. Children are among the demographics most impacted by harmful occurrences like pandemics, war, forced displacement, and natural calamities. Kids are thought to be more mentally vulnerable than other age categories because they have a harder time making sense of all these COVID-19 events and lack of support. Kids who live in households where a pandemic has struck demonstrate frequent crying behaviour, struggle to fall asleep, and feel ashamed. Youngsters are also another demographic badly impacted by the COVID-19 epidemic. According to research linking the MERS epidemic and anxiety among young adults, 77% have low-stress levels, and 18.4% have moderate ones.

Additionally, due to online and social media technology developments, younger people are more vulnerable than the elderly to the negative consequences of the COVID-19 Outbreak. It may be claimed that this situation renders young people more psychologically dangerous than certain other age groups. Additionally, it is thought that young people have behavioural side effects such as loneliness, sadness, wrath, despair, and despair. Comparing attendance records to other employment situations, it was discovered to act as a key risk factor for acquiring greater anxiety and depression [4].

The COVID-19 epidemic interfered with the academic procedure for students. Closings and other limitations affect millions of instructors and trillions of pupils. In an attempt to slow the development of the pandemic outbreak, several nations around the world have shuttered academic institutions temporarily. Approximately 70% of the world's students are affected due to cancellations. Thousands of pupils were indeed prevented from pursuing their studies at educational places. Several governments responded to the immediate prerequisites to give students access to digital and remote education chances. Despite the safeguards undertaken, the process of learning for the children suffered. Children who already have lost their independence due to COVID-19 are extremely anxious about the schedules in online learning [5].

COVID's impact on children's mental health

Pandemics and other healthcare crises have a negative effect on both physical and psychological disorders. Kids are particularly susceptible because of how little they grasp the situation. Individuals have few coping mechanisms, making it impossible for them to practically or psychologically ignore the negative effects of the scenario. They might not be able to express their emotions as well as professionals. Youngsters may feel anxious and stressed due to school closures and being separated from peers. Proximity to crisis occurrence coverage in the press and inaccurate information being shared on Facebook may make mental suffering worse. Pandemics and other public health crises have a negative impact on both one's physical and psychological disorders. Kids are particularly susceptible due to the way they grasp the situation. Individuals have few coping mechanisms, making it impossible for them to practically or psychologically ignore the negative effects of the scenario. Children might not be capable of expressing their feelings as well as adults. Children may experience stress and anxiety due to school closures and being separated from peers. Access to media attention from disaster events and inaccurate information on social networks may worsen emotional discomfort. A child's reaction to severe damage to their previous experience with emergency cases, mental and physical wellbeing, parental economic condition, and ethnic heritage. Much of the research has demonstrated that emergencies have a detrimental impact on a child's emotional wellbeing. The most frequent manifestations are stress, sadness, fatigue, food disorders, and difficulty in social relations. According to a recent Chinese investigation, the Covid-19 epidemic has caused behavioural and mental suffering in adolescents and young people. The more prevalent behavioural issues found were emotional neediness, preoccupation, irritation, and worry that family members would get the debilitating illness [6].

Increased screen time

For kids under the age of two, the WHO advises against any sitting screen time, and for kids between the ages of two and five, the WHO recommends limiting sedentary time on screen to no or more than one hour (less is preferable). Comparable screen time limitations have also been approved by the American Academy of Pediatrics (AAP). The WHO or other state or national healthcare recommendations do not advocate precise screen time limits for older kids or teenagers.

Research by [7] found that children's screen time rose during the covid Outbreak compared to normal times. Families submitted data on the estimated duration their kid spent reading material on displays and playing computer games during free time, in minutes and hours. During the Outbreak, children's daily screen use rose from almost 2 hours (average=2.6 hours) to almost 6 hours (average=5.9 hours). Even during the epidemic, television viewing increased by more than 3 hours daily. A GLM investigated parental stress and kids' screen time usage. Earnings were included because a covariate and parent stress was added as a continuous function. After correcting for family income, higher parent stress levels substantially indicated longer hours of children's screen time usage. Children whose parents indicated high-stress levels used screens for longer periods.

Parents and caregivers of the kids were questioned about the variables of interest in a study carried out in Japan by [8], including sexual identity and test scores; time was spent watching Television and/or videos and playing video games. Sleeping patterns (wake-up duration and sleep time) all through school completion and after school resurfaced, and behaviour patterns questionnaire, which acknowledged behavioural issues (emotional dysregulation, incapability to prevent playing computer games, prevalent fighting, etc.). Excessive screen time was measured as the aggregate of time spent playing computer games, watching Television, and/or watching youtube videos. Additionally, information on weight changes both before and after classes resumed was gathered (by binary response).

It was discovered that even during the school shutdown, 50.3% of kids displayed behavioural issues; once schools resumed, fewer kids displayed these issues. Furthermore, more screen time was linked to children's behavioural issues during school shutdown. There weren't any differences in the sleeping patterns of children both with and without behavioural issues. 16.78 per cent of the kids gained weight while the school was closed, which linked to behavioural issues and spending a lot of time watching Television or movies.

Isolation and loneliness

Children maintained their homework virtually without physical interaction, a significant distinction between schools shut down during the Outbreak and much more frequent school shutdowns such as breaks or faculty protests. Among many other factors, their capacity to focus on academic work, their capacity to achieve deadlines for projects, and their perception of the degree of assistance from instructors and families, children's experiences with the new

school day have differed. Increased freedom could have benefited some people, but it may have been difficult for others to stay motivated and maintain self-control. And younger kids, in particular, appear to have performed worse [9].

Children's abilities to actively interact with classmates and peers were therefore restricted without their consent while they were homeschooled by COVID-19, even if they could not have exactly followed the guidelines. There are indications that throughout the epidemic, alienation was linked to depression, bad effects on children's mental wellbeing and other mental wellbeing activities. For instance, even during the early stages of the Outbreak, adolescents and children showed significant amounts of depressive and anxious symptomatology, according to two Chinese investigations. Kids concerned about contracting an illness were much more likely than those who did not or were merely somewhat concerned to show signs of despair but not stress [10].

Other studies indicated that hours spent completing schoolwork were negatively correlated with depressive episodes and served as a buffering, while anxiety and stress linked to COVID-19 and time spent online with friends were linked to increased feelings of loneliness and melancholy in teenagers. Norwegian research [11] found that social media utilization and an absence of in-person interactions with friends were linked to teenage hopelessness and mental health issues. In contrast, a Spanish study found that home restriction was linked to diminished physical activity, enhanced screen time, and continued increased sleep hours. These researchers emphasize a few risk variables and, to a smaller extent, certain coping mechanisms for kids and teenagers who experience social exclusion. Nevertheless, it's probable that the findings are more about experiencing issues previously and throughout the Outbreak and that the same elements are linked to those problems than they are specifically about COVID-19 conditions. Researchers require continuous instead of cross-sectional research when it is feasible to account for any prior psychological susceptibility to give better objective support.

Interestingly, research on the effects of social exclusion (and loneliness) on children's psychological wellbeing has usually or under COVID-19 focused preferentially on younger and adolescent children. From the standpoint of developmental psychology, the correlation between loneliness and psychological health must be higher in teenage and young teens, given their more intense emotional states, immature self-control, and larger desire for counselling services. From just a constructivist point of view, it is a considerable time of

greater independence and parent-child bonding and making new friendships. As a result, attention gradually shifts from the families to friends and peers. The COVID-19 social exclusion restrictions could have proved exceptionally hard for older kids since they prevented intimate physical touch and friendly assistance. The above-described reconsideration of family norms by the parents has interfered with older students' education towards autonomy and independence. Consequently, it's important to incorporate a wider age spectrum of kids and to discover the mediating impact of children's age on any intercorrelations to fully comprehend the repercussions of private education and social alienation on a child's responses.

Parental stress

During the COVID-19 epidemic, the research looked at hazard and preventive variables related to parental stress levels and child abuse potential. The results show that COVID-19 caused parents to face cumulative stresses. Related to specific stresses, 21%-47% of respondents stated that COVID-19 impacted their child's health and education correspondingly. Differences in caregivers' mood and overall stress conditions constituted the most common stressors. In addition, most of their parents said they had trouble sleeping and signs of worry and despair. These findings align with earlier studies on how global health emergencies affect people's wellbeing and health.

Nevertheless, other research shows that financial pressure is another significant cause of stress for families, which was predicted to occur during the epidemic. Lower-income individuals have a higher likelihood to reside in urban areas, where circumstances are more congested both by neighbourhood and family structure, and they are also mostly to work in assignments that require public interactions (such as those in the travel and service industries), which may serve as an obstacle to physical separation. The 2008 financial crisis also impacted the job economy and people's health and wellbeing, illustrating the negative effects that financial and health disasters may have on people's stress and mental wellbeing. Key results shed more light on respondents' perceptions of how COVID-19 and the ban on stay-at-home mothers have impacted their lives, particularly in their finances, health, and psychological wellbeing, in addition to their children's wellbeing and capacity to help with their academic studies. A major risk factor for increased parent-perceived stress is an accumulation of stressors brought on by COVID-19, whilst depression and anxiousness are linked to both increased parent-perceived stress and the propensity for child maltreatment. Such findings imply that the increased number of stressors faced by COVID-19 may be a

significant factor in overall parenting stress. However, individuals who additionally report experiencing depression and anxiousness may be more likely to perceive stress negatively [12].

Child abuse and neglect

Numerous kids and their families have gone through many changes due to the pandemic outbreak, not due to quarantine, quantitative restrictions, social alienation, and the slight decrease in medical services available. There are few circumstances like the one COVID-19 creates. Still, we may draw on research on an emergency or exceptional circumstances when sudden changes to the status quo follow circumstances of quickly rising anxiety. The exposure dosage or compounded hazards that present serious dangers or disruptions to people, families, or societies can be used to illustrate how catastrophes and acts of mass violence affect individualization. Therefore, the COVID-19 Outbreak has been characterized as an operating model cascading worldwide calamity for which our communities were equipped and during which the lives of young people have been significantly impacted on several dimensions.

Furthermore, work on COVID-19 is emerging to emphasize the necessity for long-term studies of children's and teenagers' psychological health as it demonstrates the unfavourable impacts of the confinement and restrictions placed in addition to the consequences of social pressures on family and friends. Recent research on positive parenting practises on adolescent and child health emphasizes that the severity of the effects relies on risk variables, including developmental process, prior psychiatric problems, academic achievement, socio-economic status, and confinement. Social-ecological narratives can give a broad picture of how the COVID-19 epidemic has affected social ecologies and changed how people interact with their surroundings, directly or indirectly. Modifications in this mutual interaction may lead to new explanations for people's thoughts, feelings, actions, and associated functions. The continually changing psychological, economic, and political settings and the methods by which individuals adapt to and alter these surroundings are examples of how this reciprocal process presents itself.

Since child abuse is an interactive occurrence, the COVID-19 epidemic has had a wide range of effects on child's ecological systems. Regarding the traits of the child and caretakers, family situation, and the larger social and cultural context, it has created or made worse a

plethora of risk factors for neglect and abuse among children. COVID-19 is causing stress for parents and altering family life. Kids are not in school or childcare and don't have exposure to playgrounds, cooperative learning, or team sports. While trying to function from home, caregivers must also ensure that their children are entertained and safe; in certain cases, their free childcare responsibilities may prevent them from working. According to evidence of shared correlations, disputes and aggression amongst parents undoubtedly target children as well. It may have been particularly challenging to address the child's requirements due to the significantly increased likelihood of aggression between the parents during confinement caused by COVID-19. Recent studies have brought to light the challenges NGOs face in trying to help disadvantaged families and children while imprisoned [13].

Symptoms of stress in children

Young kids might pick up on their caregivers' anxiety and express it in ways that caretakers can mistake for disobedience, alternative political conduct, or tantrums. Caregivers may observe that their toddlers and preschoolers act more combative, scream more, and have trouble concentrating or participating in the play. Certain children might start exhibiting characteristic regressive behaviours, such as needing a bottle, nail-biting, having accidents when using the restroom, refusing to dress or feed themselves, growing clingier and needier, needing to be carried, and having trouble falling asleep. Modifications in sleep patterns may include difficulty falling asleep, repeated nighttime awakenings, frequent hallucinations, and inability to take sleep during the day, in addition to requesting special attention while napping [14].

Those certain stress responses in youngsters may result in familial insecurities and feelings of unworthiness, a complete absence of comprehension and empathy, an intensifying sense of anguish, depressed mood, and helplessness, sleep deprivation, caregivers withdrawing and discontinuing, in addition, may result in parenting practices trauma or stress responses. In addition to being unable to visit their grandparents, aunts, friends, and cousins, older kids and teenagers may feel frustrated for missing kids' parties, school plays, dance contests, trying to hang out with their friends, and sporting events like playing cricket with other team members in the play area. Personality vs Role Confusion is the fifth of eight psychological development phases that occur between the ages of 12 and nineteen, according to psychologist Erik Erikson. Interpersonal relationships are crucial during this period. Adolescents and college kids are difficult to isolate at home because of their increased power,

freshness, determination, excitement, and passion. Teenagers' social interactions and the physiological changes puberty brings together make them acutely aware of their social standing, the influence of peers, and relationships. Due to the social isolation caused by this disease, teenagers may experience frustration, anxiety, disconnection, nostalgia, and boredom. Special needs children are more susceptible to the significant adverse effects of disasters. People with special needs may have considerable negative effects due to closing schools. Interrupting their routines might aggravate children with neurocognitive impairment and autism spectrum conditions. Children may have interruptions to their scheduled therapy appointments and be more prone to exhibit negative behaviours, including irritation, hostility, and social disengagement.

The information about death and illness everywhere may overwhelm adolescents with melancholy and anxiety problems. When under stress, a kid with OCD might have worsening compulsions and obsessive behaviours. In summary, illness prevention strategies and sickness can be extremely distressing for kids with psychiatric disorders. Children's mental health can be negatively impacted by illness and social isolation, among other things. According to studies, the adverse psychological effects of quarantine can still be felt for months or even years afterwards. According to research, children who were isolated had mean post-traumatic stress ratings that were four times higher than those of children who were not [15,16].

Suggestions to improve mental health among children

This mental health issue due to COVID-19 can be improved in various ways illustrated in Figure 1.

- Parents should first foster a culture of trust so that kids can freely speak their minds and emotions throughout this procedure.
- Children can communicate with themselves via techniques like sketching, playing games, and singing songs in line with their developmental characteristics.
- We are incorporating neural stimulation to improve the cognitive skills and functions of school children with the help of neuroscience-based concepts enhancing the factors such as better sleep, nutrition, physical activity, and mindfulness.

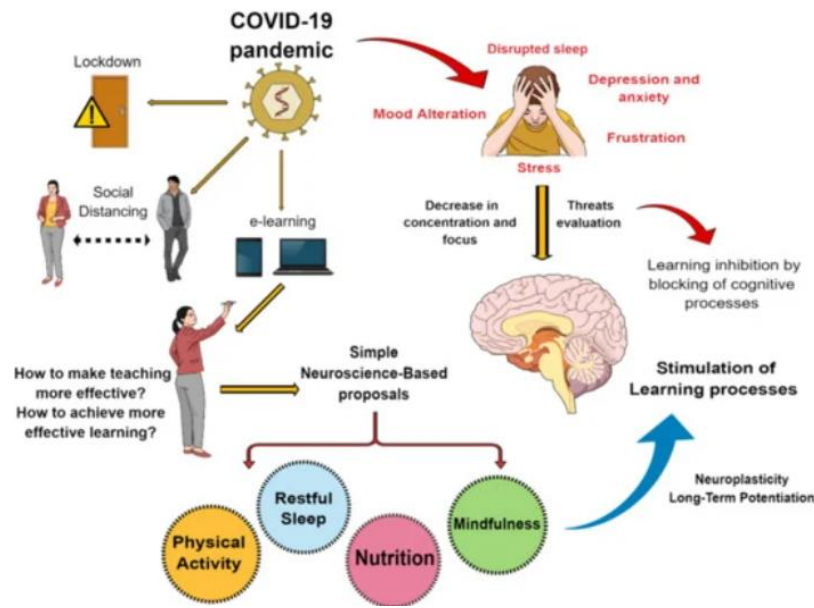


Figure 1. Schematic representation of pathways for Improving Cognitive skills and potential neuroscience-based ideas that can be employed in brain resilience of school children to promote learning processes, Reproduced with permission from [17].

- Children's inquiries concerning COVID-19 must not be ignored, glossed over, or deceived. In conformity with these individual characteristics, children must also be taught about the COVID-19 Outbreak, including what it is, when it could cease, and its potential implications.
- Throughout the experience, kids pick up various parenting techniques from their families. Parents must thus exhibit intellectual, behavioural, or emotional reactions that serve as models for their kids.
- Events like playing games at home, viewing famous films and videos, reading magazines, etc., may be advised to maintain the social bonds that kids require.
- To maintain children's academic growth, education programs may be conducted in a digital environment with the support and participation of instructors and associated professionals.
- Specialists should offer online mental counselling
- for kids who are under a great deal of stress.

- They must retain their interpersonal relationships, particularly online, to deal with the emotions of loneliness, hopelessness, and negativity that could occur even during solitude at residence.
- Calming exercises or indoor team sports could lessen the long-term emotional effect that living alone at residence may have.
- It is advised that people read books, watch a movie, television shows, or lectures, and engage in play activities to improve their self-improvement.
- Higher education institutions and organizations should offer and increase online education activities to suit the learning requirements of youngsters.
- Psychologists must provide younger generations who are stressed or afraid of online help [17].

Conclusion

Neglecting the COVID-19 Outbreak's consequences would be dangerous, particularly for youngsters and young people. The therapies should focus on fostering resilience in kids and teenagers through enhancing coordination to manage their anxieties, promoting rituals and regular exercise, and taking action to combat isolation. To help children and teenagers get through a challenging period, parents must take care of their mental health, develop coping mechanisms, and provide an example of a healthy mental approach.

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