

ROLE OF SOCIAL MEDIA IN COVID-19: EVIDENCE FROM PAKISTAN

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Abstract

This study investigates the public sphere role of social media during the COVID-19 Pandemic in Pakistan. The pandemic has severely affected Pakistani society, especially the working class. Young, middle, and lower middle-class, during the religious festivals, did not care about adopting preventive measures against COVID-19. Besides a huge number of people being hospitalized and dying, the pandemic also brought catastrophic social and economic misers to people in Pakistan. The results show that people used social media intensively for COVID-19 and trust government information to seek awareness about the pandemic. The study found a relationship between the variables of life-threatening factors such as perceived severity, immunity, and age and the adoption of preventive measures against COVID-19. Along with scientific treatment, many people in Pakistan believe in the Islamic curation against COVID-19.

Keywords: COVID-19, Social Media, Perceived Immunity, Perceived Severity, Age, Preventive Measures, Remedies

Introduction

This article relates to the COVID-19 pandemic as a public health issue in Pakistani society, which is poor, traditional, and religious. This research was conducted during the peak period of the COVID-19 pandemic in the major cities of Islamabad and Rawalpindi. Specifically, this study shed light on how social media played a role in making people aware of adopting the SOPs for the COVID-19 pandemic. Adopting preventive measures against the disease were a new phenomenon for the people of Pakistan, who are mostly poor, traditional, and religious. Besides many religious and cultural factors, the adoption of SOPs was expensive. Therefore, the social media role is appreciative for awaking people about the disease and convincing them to take preventive measures. The notable impediments in the preventative measure were religious and cultural congregations, poverty, and daily wage labour.

The world has seen many respiratory disease outbreaks in the history of health issues, but COVID-19 is the worst, deadliest, longest, and most catastrophic global crisis.¹ Covid-19 appeared first on November 18, 2019, in Wuhan, China, and spread quickly everywhere.² On January 31, 2020, the World Health Organization declared the Covid-19 Pandemic a World Health Emergency concern. Until January 2022, there were 59,365,688 Covid-19 confirmed cases and 934,735. Covid-19 is a respiratory disease that spreads quickly. The major cause of the Covid-19 transfer from one person to another is respiratory droplets. In addition, the virus develops severe acute reparatory syndromes.³ Covid-19 has affected millions of people worldwide. The pandemic has led to unprecedented human loss and badly affected public health, food supply, jobs, work, and

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education worldwide.⁴ The devastation of the global economic and social system due to the pandemic risks millions of people falling into extreme poverty. In addition, the pandemic has threatened millions of enterprises suffering 3.4 billion global workforces for losing their livelihoods.⁵ COVID-19 has hit almost every country globally. Each country in the world took notice of the approved sops such as social distancing, travel restrictions, lockdowns, quarantines, and vaccination. Pakistan also used the standard, SOPS, and proper testing to diagnose COVID-19 in patients.⁶

Research studies on COVID-19 reveal that Corona-infected people are asymptomatic or have mild to severe symptoms. Two of these studies indicate that 80% of patients present mild disease symptoms. The death rate is about 2.3% among critical and aged patients. Most studies pointed out some noticeable signs of the covid-19 patients: sore throat, flu, cough, fever, and shortness of breath, headache, chills, fatigue, nausea, abdominal pain, vomiting, and diarrhea.⁷ Many studies highlighted that the virus is not harmful to a child and does not harm those suffering from underlying cardiovascular disorders. Corona Virus became fatal for people over 70 years ago. The fatality rate is 14.8 percent. Some studies reveal that Coronavirus causes death from 07 to 14 days depending on the patient's immunity system, age, and underlying health condition.⁸ The new variant 'Omicron' of Covid-19 spreads faster than the previous variants. However, it does not appear fatal.

The virus seriously affected the USA, Russia, Brazil, India, France, Iran, the U.K., and Italy. Pakistan also suffered greatly from COVID-19. As a result, many people were hospitalized and killed during the peak period from April to September 2020.⁹ In addition, the virus developed severe complications due to high age, weak immunity, and other associated conditions such as cardiac, diabetes, respiratory disease, hypertension, cancer, and others. Senior citizens and health workers were more vulnerable and badly affected by the virus.¹⁰ Media, in general, plays a vital role in providing interpretative information for the general public awareness about COVID-19. The use of digital media specifically developed empathic feelings with the health worker, as the pandemic resulted in many deaths of health workers across the country.¹¹

Susceptibility of COVID-19

Risk factors are the people's perceived likelihood, susceptibility, and severity of the threat to health. Studies show that age, sex, and the presence of comorbidities are susceptibility to COVID-19. A young patient aged 19 to 25 usually has mild disease symptoms. However, this is true only when there is no other associated disease. Some studies indicate that men suffer more than females from COVID-19.¹² Studies suggest that smoking and drinking alcohol can increase vulnerability to COVID-19. Another study documents that males and females are susceptible to the virus, yet female patients have more mortality chances than females. Studies indicate that children are generally not highly vulnerable to the virus; the symptoms are mild even if they catch it. These studies, however, highlighted that cardiac involvement in children could be an issue.¹³ Therefore, supportive care for COVID-19 is a prime requirement. Nutritional supplements like vitamins C, D, and Zinc, increase immunity and reduce the risk of getting COVID-19. Low

immunity and other physiological factors flare up the seriousness of the disease.¹⁴ The huge level of perceived likelihood and severity of Coronavirus are significant predictors of the protective behaviour of people towards this disease.

Covid-19: A Symbol of Fear

Coronavirus is a deadly disease and has become a symbol of fear throughout the globe. It affected a high level of anxiety, distress, and depression among the population worldwide, particularly worldwide, particularly in countries where the pandemic. Major causes of the fear and depression were strict lockdown and quarantine, job and education loss, age, immune system, underlying health issues, and others. At the beginning of the pandemic, studies in China found signs of anxiety and depression. Depression during the D-19 was high among the high age people. In addition, the researcher conducted studies in Latin America and some other countries that found depression and anxiety levels moderate to high among health workers.¹⁵

Fitzpatrick found 7 out of 10 on the fear index scale for corona in the American population.¹⁶ They further explained that the sense of distress increased with the highest reported COVID-19 cases. Moreover, the researchers found that fear about the virus was not the same across females, races, ethnicity, children, married couples, and high and w age population. Jobless persons had a high level of COVID-19 fear. Additionally, the same study indicates that the symptoms of depression and anxiety increased during the pandemic. The studies also reported that suicide cases increased due to the fear of COVID-19.¹⁷

The high-frequency media reporting of the horribleness of the pandemic and the death rates affected people's mood disorders. In addition, due to the persistent lockdown, uncertainty, and students 'suffering from the disease, the university's management converted the conventional educational learning and assessment system to an online mode, affecting many students' anxiety, stress, and depression regardless of their gender. Closure of borders, trade restrictions, quarantine measures, and the lockdown has badly affected the local and international supply system of food and other essential product and the access to the markets for buying and selling. As a result, people lost jobs, got ill, and died.

Adoption of Preventive Measures

Many factors shape people's behaviour in accepting and adopting preventive measures. Social determinants like socioeconomic status (education, occupation, and income), age and gender, values related to culture and tradition, beliefs, attitudes, knowledge, risk perception, and usefulness are crucial factors for analysing protective health behaviour. Every country, therefore, took protective measures according to its situation. For example, since COVID-19 is a global health threat and greatly affects the population, a study in Pakistan argues that people were serious about the standard operating procedures for COVID-19 to contain the infection and decrease the fatalities. Their study also reveals that about 99.0% used facemasks in public places and avoided

public contact. Similarly, study in China found that participants had good knowledge about the disease and a positive attitude towards preventive measures.

Covid-19 Vaccine

Although medical scientists worked hard and still trying to discover drugs and proper treatment for the disease. However, different countries have found vaccines to decrease the virus's infection and severity. The vaccine has shown results in mitigating the pandemic. Currently, there are some popular brands of vaccines developed by the USA, China, the U.K., and Russia. Pfizer Inc. and BioNTech S.E., Moderna, Oxford-AstraZeneca, Sinopharm, and Sinovac. The efficacy of these vaccines varies. However, these companies have reported the effectiveness of their action. For example, "The Pfizer-BioNTech BNT162b2 efficacy rate of 95% requires refrigeration at -70°C for transportation. The Moderna efficacy rate of 94.1% is stable for six months, requiring less stringent traction conditions at -20°C . The Oxford-AstraZeneca AZD1222 vaccine uses a stable vector below the average refrigerator temperature. Russia developed Sputnik V. It is a viral two-vector vaccine with a storage temperature of $2-8^{\circ}\text{C}$). The Chinese-developed Sinopharm BBIBP-Cor-V and Sinovac CoronaVac vaccines are conventional inactivated vaccines. The efficacy of BBIBP-Cor-V is 79.34% and can be transported and refrigerated at $2-8^{\circ}\text{C}$.190".

Though the vaccines against Covid-19 are underused, medical experts still advise that preventive measures like wearing masks, social distancing, avoiding crowded places, and regular washing of hands are still imperative to prevent the further spread of the disease. These preventive measures should continue until medical science achieves sufficient herd immunity globally. The booster shots are in progress and effectively working to prevent the infection. However, studies are underway to investigate its efficacy thoroughly.

Social Media and COVID-19

Social media is a useful communication tool that allows users to communicate with other tools for user-generated content. Social media is a useful device for seeking information, including health information. The importance of social media use for research in collecting data on news, health, economics, and politics has increased over the last two decades. This importance has augmented the emergence of the COVID-19 pandemic. According to WHO, social media has become the first COVID-19 info-demic for information and misinformation, fuelling terror and distress worldwide.

The importance of this study resides in how social media highlighted the pandemic and how media coverage affected the relationship between life-threatening factors and the adoption of Covid-19 SOPs. Both traditional and digital media in the world highly covered the pandemic issues. The study mainly focused on the media coverage during the pandemic on deaths, hospitalization, severity, depression, restrictions, lockdown, SOPs, and other associated socioeconomic issues developed due to the disease. Media always affects public interest issues during a crisis, requiring needful information. Requiring needful information is certain and can easily reach the masses. The media has

the discursive power to spread vital information about issues and events as people do not have first-hand experience. The media during the COVID-19 pandemic remains the primum source of information. The use of media, especially social media, has greatly augmented. Uncertainty increases an individual's social and psychological need for information. Ultimately, this phenomenon leads individuals to news media to clarify their uncertainties.

People learn from the media, especially about protection from the pandemic. Generally, in times of crisis, the public is inclined toward the media to seek information to keep them updated. Contrary to traditional media, social media disseminates information characterized by general inactivity, allowing people to connect from personal networks and share their experiences during crises. A study investigated that individuals' emotional and collective behaviour are involved while using social media to understand and manage a difficult situation. Smith document that social media gives people access to a vast amount of information. Individuals need real-time access to vital information to comment or share the news on their networks. Apart from situational and information, social media platforms like Twitter, Facebook, YouTube, and others, offer direct access to an unequal quantity of content, which may intensify rumours and doubt. The government of Pakistan also used social media and mobile phones to update people about hotspots, smart lockdowns, and the adoption of SOPs.

Social media coverage is even more critical for reflection, amplification, and influence. Media often facilitate public opinion in a crisis that leads to behavioural change. Media information related to criticism is also essential for the authorities to learn the foremost concerns of the public. Social media, however, also outlines the risks of misinformation during the virus outbreak. The information spreading through media can greatly affect people's behaviour and change the usefulness of countermeasures set up by the government. In light of the severity of the pandemic, it is essential to explore how far the social media platforms played their supportive role along with the efforts of government authorities to provide accurate and timely information to prevent the disease. Within this context, how far did the media reports affect the life of people during the pandemic? Through this analytical study, we aim to explore the role of social media in developing public attitudes and behaviours.

The first case of COVID-19 reported in Pakistan was on February 26, 2020. Pakistan is a developing country within the South Asia South Asian region. Its population is around 220 million. Karachi, Lahore, Rawalpindi, and Faisalabad are the largest populated cities in the grip of COVID-19 in 2020-21.¹⁸ According to the government of Pakistan, as of 30.8.2020, the number of confirmed cases in Pakistan was 293,261, with 6,244 casualties and 276,829 recoveries of 686 critical issues. Pakistan's sluggish economy, high population density in the urban cities, socioeconomic inequalities, and low Public Health care resources remain detrimental factors. The medical system in Pakistan, with large unregulated private health centres/hospitals, was a challenge during the first quarter of the pandemic, and COVID-19 affected the healthcare system badly. COVID-19 has badly disturbed routine matters in the counties, leading to intense public fear. Despite the poor

development indicators, Pakistan's response to spreading the virus with relatively well against spreading the virus by using appropriate measures to subside the disaster. Risk screening, testing, lockdown, vaccination, travel control, quarantine, medical facilitation, and others.

Initially, it was difficult for the government to control the disease, as the public was noncompliant and unaware of the gravity of the situation. The COVID-19 cases on April 15, 2020, reached 5020, with the death of 75 individuals. The government used social and traditional media for public health messages about the preventive mechanism (social distancing, hand washing, masks, and others). Pakistan increased its health resources and introduced emergency health control mechanisms. The government increased the testing of public labs and used nationwide mobile units. These efforts contained the pandemic to a manageable level until November 2021. Media News reports highlighted an unprecedented rush of critical COVID-19 patients seeking medical care in government hospitals. Many failed to get admission due to a lack of medical facilities. The private hospitals were costly, and people could not afford the heavy expenditures on treatment. They treated a critical Corona patient ranging from one to five million Pakistani Rupees. The shortage of ventilators was a major issue, but the problem was handled by producing the ventilator locally within a few months. In addition, many NGOs, companies, and individuals helped the poor in the walk of the pandemic in various capacities like medicines, food supplies, and relief packages to the poor affected population during the difficult pandemic. The governmental and non-governmental efforts slowly but progressively declined the affected patients.

Although the government's Pakistan reaction to control COVID-19 was strict and widespread, the lockdown and closing of all educational institutions, wedding halls, cinema halls, sports tournaments, and Sunday markets limited religious congregation. However, the strict measurement has severely affected the daily paid workers. In the later stage, the low strata people did not strictly observe the government SOPs, specifically the social distancing. Pakistan is a developing and populous country. The GDP per capita in Pakistan is 1190.00 USD. In addition, religious festivals like Eid, Juma prayers, and Ramadan could not make the government's social control effective. The government seemed relaxed in dealing with the issue, and people were not taking the virus seriously, especially during the Omicron variant of Covid-19. Therefore, people adopted a mixed and matched SOPs.

Methodology

This study analysed impact of social media on the relationship between Life Threatening Factors and the Adoption of COVID-19 using a survey questionnaire based on social media for various COVID-19-related information, specifically perceived risk factors and adoption of COVID-19-related SOPs. With the strict preventive measures for COVID-19, convenient sampling technique was used to collect data from the cross-sectional populations in Rawalpindi and Islamabad from April to June 2021. In addition, questionnaires were sent through Emails, WhatsApp, Instagram, and other social media platforms.

The questionnaire used for data collection contained questions on socio-demographics, media use, and knowledge about COVID-19. It also had to query the severity of the disease, the importance of the immune system, trust in government agencies, and believability in Islamic and scientific explanations to cure the illness. The questions relate to people's attitudes toward adopting SOPs to prevent COVID-19. Questionnaire was first pre-tested on a few people from the target population to check linguistic and conceptual understanding. Finally, it was updated to make it culturally understandable. 320 responses were received which was later analysed through the SPSS version 23. Descriptive statistics and inferential statistics were applied to answer to the research question and test the hypotheses. For testing the hypotheses, path analysis model was also employed to explain the causes of COVID-19 related to perceived severity, perceived immunity, and age of the respondents in adopting preventive measures against COVID-19. To check the reliability of the data, Cronbach's Alpha was used and found 77.0 reliability strengths for the 50 questionnaire items. This result shows that data was reliable and the respondent properly filled in the questionnaire.

Results

This study analyses the research questions and tests the hypotheses using descriptive and inferential statistics. Following are the results. Table 1 shows the characteristics of the sample. Most respondents aged 15-25 who were Male had 16 years of education and were getting less than 50,000 Pakistani rupees per month. In addition, most respondents used social media and television to seek COVID-19-related information (see table 1).

Table -1: COVID-19 Related of Sample

Variables	Freq. & Percentage
Gender	
Male	209 (56.9)
Female	154 (42.0)
Age	
15-25	135 (36.8)
26-35	108 (29.4)
36-45	53 (14.4)
46-55	38 (10.4)
56 and above	33 (9.0)
Education	
Less and 10-year Edu	5 (1.4)
(12-year Edu)	38 (10.4)
14-year Edu)	124 (33.8)
16-year Edu)	16-year Edu)
Media Dependency	
Male	201 (54.8)
Female	166 (45.2)
Income	

Less than 50,000	182 (49.6)
51,000-100,000	89 (24.2)
101,000-150,000	36 (9.8)
151,000-200,000	21 (5.7)
201,000-250,000	39 (5.7)

Note: Percentages are given in parentheses

Table 2 shows the results of various media use by the respondents during COVID-19. The table shows that the respondents relied heavily on Facebook, television, and newspaper.

Table 2: Use of Different Media Plates Forms

Media Use	Freq.	%
Facebook	206	(37. %)
Radio	134	(20. %)
Twitter	90	(10. %)
Television	80	(17. %)
Newspapers	121	(16. %)

Table 3 shows the relationship between the use of social media and its efficacy for COVID-19. As evident from the table, a significant positive relationship was found between the independent and dependent variables. Therefore, the social media content was supportive, informative, and helpful for the people about Covid-19.

Table 3: Correlations between social media use and efficacy for Covid-19

		Perceived Supportive	Perceived Informative	Perceived helpful
Social Media Use	Pearson Correlation	.535**	.433**	.264**
	Sig. (2-tailed)	.000	.000	.000
	N	367	367	367

** . Correlation is significant at the 0.01 level (2-tailed).

Table 4 shows regression results of the presumed influence of television, radio, newspapers, Facebook, and Twitter on the criterion variable, 'Awareness of COVID-19'. The computed values of F. 15.458 and Sig .000 in the ANOVA indicate that the regression model is fit and overall statistically significant. Furthermore, it suggests that the regression model is appropriate and statistically significant for the overall relationship between the criterion variable (Awareness of COVID-19) and all the independent variables. The model shows an overall 18% relationship (R Square: .180). In addition, a significant relationship was found between the awareness of COVID-19 and the influence of Facebook (B=2.120, P=.000). Whereas. In contrast, we did not find any connection between the effects of other media platforms.

Table 4: Multiple Regression about Media influence and Awareness of COVID-19

	Sum of Squares	DF	Mean Square
Regression	1907.715	5	381.543
Residual	8293.142	336	24.682

Media Use	B	Std. Error	Beta	t	Sig
(Constant)	17.944	.960		18.689	.000
Influence of Television	.240	.349	.039	.687	.492
Influence of Radio	.592	.342	-.092	1.732	.084
Influence of Newspapers	.587	.340	-.091	1.728	.085
Influence of Facebook	2.120	.370	.330	5.728	.000
Influence of Twitter	.309	.293	.060	1.056	.292

a. Dependent Variable: Awareness
 b. R: .424; R Square: .180; Adjusted R Square: .168; Standard Error: 5.758; F Value: 15.458; P: .000

Table 5 explains the question of to what extent the respondents took COVID-19 seriously and adopted preventive measures. As evident from the table, both male and female respondents were serious about the table, which shows all the necessary preventive measures. First, however, masks were highly adopted, followed by washing hands, avoiding public gatherings, and staying home.

Table 5: Preventive measures by gender

	Male		Female	
Stay Home	140	(16.5%)	122	(18.2%)
Avoid Public Gathering	145	(17.1%)	109	(16.3%)
Wash Hands Regularly	150	(17.7%)	105	(15.7%)
Use of Masks/ Sanitizers	170	(20.1%)	129	(19.3%)
Social Distancing	127	(15.0%)	113	(16.9%)
Avoid Meeting Risk Groups	115	(13.6%)	91	(13.6%)

Table 6 shows respondents' trust in government agencies for handling the COVID-19 situation in the country. As evident from the table, most respondents were satisfied and trusted the government to provide important and timely information, take the problem seriously, help people, respond to the issue, provide medical facilities, and take remedial action. However, the repeat ANOVA test revealed that people's trust in government information on COVID-19 was highly significant (Repeat ANOVA: 5198.703, P > 0.000).

Table 6: People Trust on Government information on COVID-19

Trust Factors	Mean	V. Untrusted	Untrusted	Neutral	Trusted	V. Trusted
Information	3.32	27	44	114	148	34
Handling	3.26	26	54	113	145	29
Helpful	2.74	62	99	98	86	22

Govt Response	2.88	41	106	96	103	21
Medical Facility	2.84	38	100	120	98	11
Remedial Inst	3.26	23	54	117	147	26

Note: Percentages are in parenthesis
Repeat ANOVA: 5198.703, P > 0.000

Table 7 shows curative believability by gender against COVID-19. The table shows that both males and females believe in curative believability from the Islamic perspective than a scientific explanation for COVID-19 (rated four on the five rating scale) (Males 96, 45.89% and Female 78, 50.6%. Mean 3.534). The believability of the Islamic perspective as a corrective measure against COVID-19 was five by males and females (Males 72, 34.4% and females 67, 43.5. Mean 3.913). This rating score was significantly different on the Repeat ANOVA test (11073.889, P > 0.000). Likewise, both genders rated vaccination as three for remedial action against COVID-19. (Male 99, 47.4% and Female 84, 54.5. Mean 3.174).

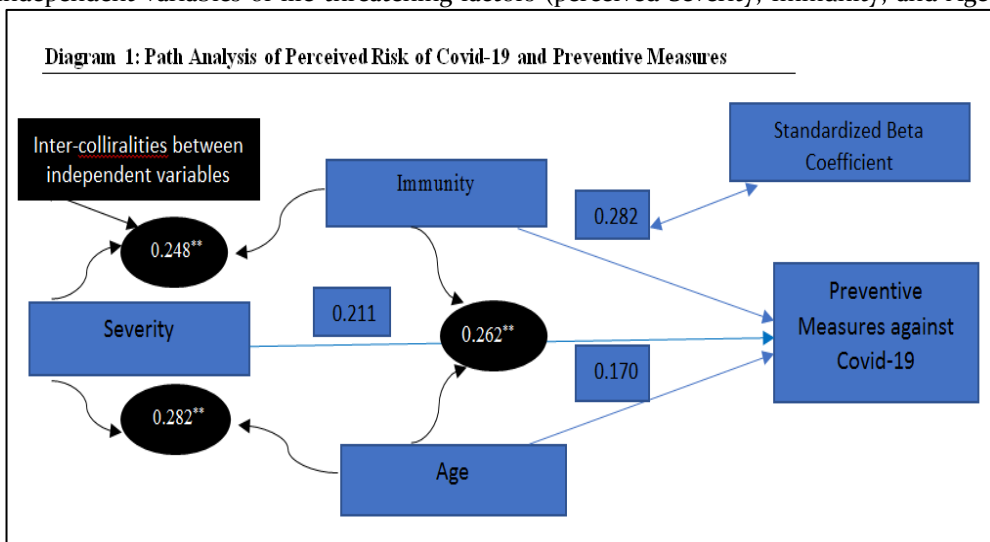
Table 7: Islamic and Scientific Curative Believability of COVID-19 by Gender

	Gender	1	2	3	4	5	Total
Scientific ¹ Explanation	M	13	13	70	96	17	209
	F	3	8	46	78	19	154
Islamic ² Remedies	M	11	11	57	58	72	209
	F	2	11	30	44	67	154
Vaccination ³	M	17	16	99	65	12	209
	F	8	14	84	42	6	154

¹. Mean 3.534 ². Mean 3.913 ³. Mean 3.174
Repeat ANOVA: 11073.889, P > 0.000

Path Analysis on Adoption Preventive Measure

Path Analysis Model was performed to investigate the relationship between the independent variables of life-threatening factors (perceived Severity, Immunity, and Age



against Covid-19) and the dependent variable (Adoption of preventive measures for Covid-19). First a simple correlation test was conducted to check the collinearity between the independent variables. Secondly, multiple linear regression was performed to study the causal relationship between the independent and dependent variables. Diagram 1 represents the causal connection between the independent and dependent variables and the actual outcome of the relationship. As evident from the table, significant prediction of the independent variables (perceived Severity, Immunity, and Age) was found on the dependent variable (adopting preventive measures against Covid-19). Furthermore, the table also shows an input path analysis of the inter-relationship between the independent variables, indicating a substantial positive impact on the overall relationship towards the hypnotized direction.

Discussion

The media frequently focused on the coverage of the COVID-19 pandemic on the number of newly infected cases, deaths, preventive measures against COVID-19, health facilities, food supply, and vaccine development. People in highly infected countries perceive the COVID-19 pandemic as an irreversible disease. Like other South Asian countries, Covid-19 hit Pakistan badly, suffering thousands of people. Although the media brought emotionally laden content during the COVID-19 pandemic, that helped educate the public about the various life-threatening effects and the preventive measure. People gloved to all sorts of media to seek information about the COVID-19 pandemic for the needful information. Some media scholars believe COVID-19 was a crisis of information. The life-and-death scenario of the COVID-19 pandemic led social media to construct horrifying opinions and emotions. Fake news/disinformation added fuel to the fire. Vaccine uncertainty mostly ascribed to misleading information about COVID-19 on social media. However, people trusted government information and indicated that handling COVID-19 was high and timely.

The present study aimed to shed light on the particular situation and the role of social media in the overall pandemic situation. Along with another key variable, the study also focused on life-threatening factors such as age, perceived severity of the disease, individual immunity against COVID-19, and adoption of preventive measures. The data was collected from Pakistan's rural and urban Islamabad and Rawalpindi cities. The reason for taking data from the rural area was that they were less educated and had issues adopting the prevention measures against COVID-19. They belong to low-income strata, and the pandemic increased their miseries during the peak. Studies in other countries like India, Sri Lanka, and other third-world Asian countries found that people with lower education were susceptible to COVID-19 infection. Even the United States of America examined factors relevant to perceived COVID-19 susceptibility between urban and rural adults in Alabama.

In adopting preventive measures against COVID-19, both males and females were serious about the disease and the severity of the virus. The study found that people used masks, washed hands, avoided public gatherings, and stayed home. These results show that people in Pakistan had adequate knowledge and positive practices for COVID-19.

Their study shows that most who adopted serious SOPs were over 50 years old and had higher SOPs were 50 years older. However, these preventive measures were relaxed when the severity was lower, specifically in the lower strata of the population.

There are many studies of the role of social media in the pandemic especially in providing information about government decisions regarding the effects of the virus on people, the economy, and food supply. In Pakistan, the public health messaging was creative, responsive, inclusive, and nuanced, creating fears, expectations, and perceptions. This study found that the social media contents were supportive, informative, and helpful for the people to handle the sensitivity of Covid-19. The study also focused on the relationship between perceived severity, immunity, and age regarding COVID-19 and its relationship with the adoption of preventive measures. Strong collinearity was found between the independent variables and a positive causal relationship between the independent and dependent variables. It is indicative of the substantial impact of some of the threatening factors on the behaviour of individuals for adopting preventive measures in health crises.

Conclusion

COVID-19 is a highly complex and highly destructive virus. Successful management against the spread of the disease in China and South Korea shows wonder with close contact tracing and isolation. The life-and-death scenario of the COVID-19 pandemic led social media to construct horrifying opinions and emotions. Fake news/ disinformation added fuel to the fire. The study found that people with lower education were more susceptible to COVID-19 infection. It was found that along with the scientific treatment, quite a good number of people in Pakistan also believe the Islamic healing about COVID-19. The use of vaccination as remedial action was rated 3/5. The study found that more people with perceived high severity, less immunity, and higher age led to serious adoption of preventive measures against COVID-19.

Endnotes

- ¹ Maria Nicola et al., "The Socio-Economic Implications of the Coronavirus Pandemic (COVID-19): A Review," *Int. J. Surg.* 78 (June 2020): 185–93.
- ² Hussin A Rothan and Siddappa N Byrareddy, "The Epidemiology and Pathogenesis of Coronavirus Disease (COVID-19) Outbreak," *J. Autoimmun.* 109, no. 102433 (May 2020): 102433.
- ³ CDC COVID-19 Response Team, "Geographic Differences in COVID-19 Cases, Deaths, and Incidence - United States, February 12-April 7, 2020," *MMWR Morb. Mortal. Wkly. Rep.* 69, no. 15 (April 2020): 465–71.
- ⁴ Qing Cao et al., "SARS-CoV-2 Infection in Children: Transmission Dynamics and Clinical Characteristics," *J. Formos. Med. Assoc.* 119, no. 3 (March 2020): 670–73.
- ⁵ Nicola et al., "The Socio-Economic Implications of the Coronavirus Pandemic (COVID-19): A Review."
- ⁶ Shazia Aziz, Akifa Imtiaz, and Rabea Saeed, "Framing COVID-19 in Pakistani Mainstream Media: An Analysis of Newspaper Editorials," *Cogent Arts Humanit.* 9, no. 1 (December 2022).
- ⁷ Wei Wei Wang, "Three Essays on Climate Change Impacts, Adaptation and Mitigation in Agriculture" (PhD Thesis, Texas, Texas A&M University, 2012).
- ⁸ Carl Heneghan, "COVID-19: What Proportion Are Asymptomatic?," *The Centre for Evidence-Based Medicine*, April 2020, <https://www.cebm.net/covid-19/covid-19-what-proportion-are-asymptomatic/>.
- ⁹ Khadijah Abid et al., "Progress of COVID-19 Epidemic in Pakistan," *Asia. Pac. J. Public Health* 32, no. 4 (May 2020): 154–56.
- ¹⁰ Aleksandra Rajewska et al., "COVID-19 and Pregnancy – Where Are We Now? A Review," *J. Perinat. Med.* 48, no. 5 (June 2020): 428–34.
- ¹¹ Aziz, Imtiaz, and Saeed, "Framing COVID-19 in Pakistani Mainstream Media: An Analysis of Newspaper Editorials."
- ¹² Clare Wenham et al., "COVID-19: The Gendered Impacts of the Outbreak," *Lancet* 395, no. 10227 (March 2020): 846–48.
- ¹³ Aso Faeq Salih et al., "Pediatric COVID-19 Infection in Sulaimaniyah Governorate, Iraq," *Am. J. Otolaryngol.* 43, no. 1 (January 2022): 103199.
- ¹⁴ Li Duan and Gang Zhu, "Psychological Interventions for People Affected by the COVID-19 Epidemic," *Lancet Psychiatry* 7, no. 4 (April 2020): 300–302.
- ¹⁵ Yaling Peng et al., "Knowledge, Attitude and Practice Associated with COVID-19 among University Students: A Cross-Sectional Survey in China," *Research Square* (April 2020).
- ¹⁶ Kevin M Fitzpatrick, Casey Harris, and Grant Drawve, "Fear of COVID-19 and the Mental Health Consequences in America," *Psychol. Trauma* 12, no. S1 (August 2020): S17–21.
- ¹⁷ Mohammed A Mamun and Mark D Griffiths, "First COVID-19 Suicide Case in Bangladesh Due to Fear of COVID-19 and Xenophobia: Possible Suicide Prevention Strategies," *Asian J. Psychiatr.* 51, no. 102073 (June 2020): 102073.
- ¹⁸ Aziz, Imtiaz, and Saeed, "Framing COVID-19 in Pakistani Mainstream Media: An Analysis of Newspaper Editorials."