

Anxiety During the Covid-19 Pandemic in Indonesian Society

Agung Sutriyawan

Bachelor Programme Public Health, Bhakti Kencana University

ABSTRACT

*Published Online: 31 July 2021

Background: New cases of COVID-19 are currently experiencing an increase and are becoming a major public health problem in Indonesia, causing it in society. Public knowledge and attitudes affect the level of action required to prevent the spread of COVID-19 by the government.

Objectives: This research aims to find out the influence of knowledge and attitudes to anxiety during the COVID-19 period.

Methods: Quantitative studies with cross sectional design, sampling techniques using snowball sampling. The questionnaire has four sections: socio-demographic, knowledge, attitude, and anxiety during the COVID-19 pandemic. Online questionnaires are developed using google forms. Questionnaire links are sent via email, WhatsApp, Facebook.

Results: Results showed that knowledge related to anxiety levels were those who knew how to spread (0.008), transmission (0.020), risk group (0.025), prevention (0.018) and treatment (0.027). Those who agreed to follow the news about COVID-19 (0.007), follow the government's advice (0.006) and purchase preventive equipment (0.001) showing a sense of anxiety during the COVID-19 period.

Conclusion: This study proves anxiety occurs in those who know how to spread COVID-19, know that COVID-19 is more dangerous in the elderly and have chronic diseases, know how to prevent it, and know that there is no cure for COVID-19 today. Often they follow the news about COVID-19, follow government recommendations, and are willing to buy COVID-19 prevention equipment, indicating that they are anxious about the COVID-19 pandemic.

Keywords:
COVID-19,
Anxiety,
Knowledge, Attitude

INTRODUCTION

The coronavirus pandemic 2019 (COVID-19) is a problem that is happening in more than 200 countries around the world. COVID-19 has been identified as the cause of an outbreak of infectious respiratory disease in Wuhan, China.¹ COVID-19 is highly contagious because most people do not have immunity to this new virus. Currently COVID-19 efforts are made only to treat symptoms, treatment and prevention of complications, but there is no cure for this disease. Therefore, the best prevention strategies such as maintaining social distance or wearing a mask may help us to prevent infection.² Government action to close public services causes industrial collapse that negatively impacts the economy.³

The spread of COVID-19 is causing confusion, anxiety and fear among the general public.

*Corresponding Author: Agung Sutriyawan

*Cite this Article: Agung Sutriyawan (2021). *Anxiety During the Covid-19 Pandemic in Indonesian Society. International Journal of Clinical Science and Medical Research, 1(1), 34-40*

Covid-19 research, many facts are constantly changing and many myths are not uncommon in the general population regarding infection prevention and management. This is sometimes very annoying for certain individuals.⁴

The absence of appropriate protective measures is a major cause of concern among the general public. At the community level, there is distrust of others in terms of the spread of disease and the role of the government in tackling outbreaks. Especially in a country like Indonesia which is a densely populated country without strong health infrastructure, it is a cause for concern. Some levels of panic also appear in public due to the unavailability of basic protective measures.

COVID-19 was first reported in Indonesia on February 2, 2020, to date continues to increase. Government, media, doctors, researchers, celebrities, police and other community stakeholders urge the public to avoid public gatherings such as sports, religious ceremonies, family events, meetings and classes in schools, this is done to prevent the spread of coronavirus infection.⁴ Distrust of others in terms of the spread of disease and the role of the government in tackling the outbreak, making the spread of COVID-19 in Indonesia

difficult to overcome. To comply with the government's recommendations, the public needs knowledge about the spread, prevention of COVID-19. The fact that many people still ignore the importance of social distance because of attitude problems. Public anxiety and concern in general affect each individual. Recent evidence suggests that individuals in isolation and quarantine experience anxiety, anger, confusion.⁵ Public knowledge and attitudes largely influence the level of compliance with disease prevention measures already recommended by the government. Therefore, it is important to study these domains in the Indonesian population. Based on the relevance of all of the above factors, researchers aim to assess the influence of knowledge, attitudes towards anxiety felt during the COVID-19 pandemic in Indonesia.

MATERIAL AND METHODS

The type of research used is quantitative with cross sectional design.⁶ This approach is done to determine the influence of knowledge, attitudes to anxiety levels during the COVID-19 pandemic on Indonesians. This research was conducted in 34 provinces in Indonesia. The implementation of the research began in May - August 2020. The population in this study is the entire population in Indonesia. The samples in this study were people who met the criteria: 1) ≥ 18 years old, have social media accounts and have access to the Internet, and are able to understand Indonesian.

This research is an online study, Sampling techniques using Snowball. this technique is done on a rolling or chained basis. Researchers took 1 sample from each province to be sampled (this is called a sample phase I), then the sample was asked to spread the google form link to a friend, relatives sacara random (this is called a sample phase II), then the

sample disseminated the questionnaire to friends or relatives (this is called a sample phase III), and so on. Data collection starts on June 16, 2020 at 13.00 WIB and closes on June 23, 2020 at 12.00 WIB. Semi-structured online questionnaires are developed using Google forms, with consent forms also available. Questionnaire links are sent via email, WhatsApp, Facebook, or other social media to respondents.

Grouping data on anxiety variables is done by making a total score of answer results for each respondent, then conducted a test of normality of data using skewness, then if the data is normal then cut off point between anxious and not anxious using mean value. If the data is not normally distributed then it uses a median value. Statistical analysis is performed to see the distribution of frequency and percentage of socio-demographic characteristics, knowledge question items, and attitude question items, and anxiety question items. The advanced analysis used is binary logistics regression.

FINDINGS

An online survey, about knowledge, attitudes, and anxiety during the COVID-19 pandemic was conducted in Indonesia. Total responses were recorded as many as 1051 participants. All participants are 18 years of age or older and are from Indonesia. This study only includes participants who understand Bahasa Indonesia, have a mobile phone / tablet / internet network, and have access to the Internet.

Table 1. Show respondent characteristics based on socio-demographics. Among the respondents who gave the answer, there were 511 (48.6%) 21 –30 year old age group, 732 (69.6%) female gender, 782 (74.4%) college graduates, 383 (36.4%) with the status of working as a private employee, 894 (85.1%) Muslims.

Table 1. Characteristics of Respondents

Characteristics of Respondents	n	Percentage
Age		
≤ 20	163	15,5
21 - 30	511	48,6
31 - 40	277	26,4
41 - 50	67	6,4
51 - 60	28	2,7
> 60	5	0,5
Gender		
Man	319	30,4
Woman	732	69,6
Education		
No school	2	0,2
Elementary school	2	0,2
Middle School	3	0,3
High school	262	24,9
College	782	74,4

Characteristics of Respondents	n	Percentage
Profession		
Government employees	174	16,6
General employees	383	36,4
entrepreneur	95	9,0
Housewives	54	5,1
Student	310	29,5
Labor	21	2,0
Not working	14	1,3
Religion		
Islam	894	85,1
Christian	136	12,9
Hindu	17	1,6
Buddhist	3	0,3
Confucius	1	0,1
Total	1051	100

Table 2. Demonstrated knowledge among study participants about COVID-19. The majority of respondents responded to the COVID-19 virus (61.3%) spread through touch, sneezing and kissing, about (93.5%) respondents knew COVID-19 was more dangerous for the elderly and had

chronic diseases, about (95.1%) respondents knew the isolation of someone who had symptoms of COVID-19 could stop the spread of COVID-19 and about (75%) respondents responded that antibiotics could not treat COVID-19.

Table 2. Overview of COVID-19 knowledge in Indonesian society

No	Knowledge Questions	n	%
1	COVID-19 can be spread through touching, sneezing, and kissing		
	Yes	644	61,3
	Not	407	38,7
2	COVID-19 can be transmitted from people without symptoms		
	Yes	983	93,5
	Not	68	6,5
3	COVID-19 is more dangerous for the elderly and has chronic diseases		
	Yes	1024	97,4
	Not	27	2,6
4	Isolation of someone with symptoms of COVID-19 can stop the spread of COVID-19		
	Yes	51	4,9
	Not	1000	95,1
5	Frequent hand washing can prevent the spread of COVID-19		
	Yes	999	95,1
	Not	52	4,9
6	Antibiotics can treat COVID-19		
	Yes	251	23,9
	Not	800	76,1

Table 3. Demonstrate preventive measures to limit the spread of COVID-19 based on respondents' responses. The majority of participants agreed when meeting friends, not shaking hands or cuddling. Almost all participants said they agreed to wash their hands using soap or hand sanitizer regularly and use masks to protect themselves from the

transmission of COVID-19. Most study participants agreed in isolation at home if they were in contact with a person infected with COVID-19 or who was infected. Approximately 93% of participants agreed to follow Government rules and purchase COVID-19 prevention equipment.

Table 3. Overview of Attitudes towards COVID-19 Prevention in Indonesian Society

No	Statement of Attitude	Agree and Strongly agree	
		n	%
1	When I meet friends, I always greet them without shaking hands and not hugging	908	86,4
2	I wash my hands using soap or hand sanitizer regularly	986	93,8
3	I usually use a mask to protect myself from the risk of contracting COVID-19	1027	97,7
4	If I make contact or interaction with people infected with COVID-19, I am willing to be in isolation at home for a certain period until I prove that I am not infected with COVID-19	1014	96,5
5	I usually follow updates or updates about the spread of COVID-19 in my country	902	85,8
6	I usually follow the latest updates or news about the spread of COVID-19 in the world	752	71,6
7	If there is a browsur or leaflet containing information about COVID-19, I will read it and follow the instructions described in it	912	86,8
8	I am willing to follow the Government's recommendations regarding the prevention of COVID-19 transmission	987	93,9
9	I am willing to buy COVID-19 prevention tools such as masks and hand sanitizers	983	93,5

Table 4. Shows respondents' answers about the impact during the COVID-19 pandemic period. About 60% of paranoid participants with thoughts contracted COVID-19 during the pandemic. About 85% of participants avoid parties, social contacts, and avoid meetings such as worship, meetings, and more for fear of being displaced by COVID-

19. About 35% of participants always order food online to avoid contact with others. In our study, 60% of people confirmed feeling scared when someone in their social circle became ill, more than 90% of participants always felt the need to use hand sanitizer and continued to wash their hands using soap or hand sanitizer.

Table 4. Overview of Anxiety during the COVID-19 Pandemic in Indonesian Society

No	Anxiety During the COVID-19 Pandemic Period	Often and Always	
		n	%
1	During the COVID-19 pandemic, how often do you think about COVID-19	855	81,4
2	During the COVID-19 pandemic, how often do you feel paranoid/frightened about COVID-19	618	58,8
3	During the COVID-19 pandemic, how often do you avoid partying	939	89,3
4	During the COVID-19 pandemic, how often do you avoid direct social contact	882	83,9
5	During the COVID-19 pandemic, how often do you avoid large gatherings in person such as Worship, Meetings, and more	873	83,1
6	During the COVID-19 pandemic, how often do you order food online	384	36,5
7	During the COVID-19 pandemic, how often do you talk to your friends about the COVID-19 pandemic	778	74,0
8	During the COVID-19 pandemic, how often do you have trouble sleeping because you are worried about the spread and transmission of COVID-19	273	26,0
9	During the COVID-19 pandemic, how often do you feel affected by the news in newspapers and TV	540	51,4
10	During the COVID-19 pandemic, how often do you feel the need to buy and store all your needs at home	569	54,1
11	During the COVID-19 pandemic, how often do you feel frightened if someone in your neighborhood is reported to be infected with COVID-19	635	60,4
12	During the COVID-19 pandemic, how often do you feel the need to use hand sanitizer	970	92,3
13	During the COVID-19 pandemic, how often do you feel the need to constantly wash your hands using soap or hand sanitizer	958	91,2

No	Anxiety During the COVID-19 Pandemic Period	Often and Always	
		n	%
14	During the COVID-19 pandemic, how often do you feel worried about yourself, and those closest to you about the spread and transmission of COVID-19	874	83,2
15	During the COVID-19 pandemic, how often do you use a mask even without any obvious symptoms of infection	972	92,5
16	During the COVID-19 pandemic, how often stories about COVID-19 scare you leads to unnatural behavior towards others	318	30,3
17	During the COVID-19 pandemic, how often stories about COVID-19 cause you to panic on social media	321	30,5

Table 5. Showing that the item of knowledge questions that affect anxiety is knowing how to spread, knowing that transmission can occur through people without gejala, COVID-19 is more dangerous in those who suffer from chronic diseases, washing hands can prevent the spread, and knowing the absence of anti-COVID-19 drugs. While the

items of attitude questions that affect anxiety are those who actively follow the latest news about COVID-19, those who have followed the news either through browsur or leaflets, are willing to follow the advice of the government and willing to buy personal protection tools to prevent the spread of COVID-19.

Table 5. Binary Regression Between Knowledge and Attitudes towards Anxiety (Anxiety and Not) during the COVID-19 Pandemic

Knowledge	P-value	OR	95% C.I	
			Lower	Upper
COVID-19 can be spread through touch, sneezing, and kissing (Yes & No)	0,008*	1,408	1,093	1,814
COVID-19 can be transmitted from people without symptoms (Yes & No)	0,020*	0,523	0,304	0,902
COVID-19 is more dangerous for the elderly and has chronic diseases (Yes & No)	0,025*	2,698	1,130	6,441
Isolation of someone with symptoms of COVID-19 can stop the spread (Yes & No)	0,297	1,397	0,745	2,619
Frequent hand washing can prevent the spread of COVID-19 (Yes & No)	0,018*	2,182	1,142	4,169
Antibiotics can treat COVID-19 (Yes & No)	0,027*	1,395	1,039	1,872
Attitude				
When I meet friends, I always greet them without shaking hands and not hugging	0,779	1,057	0,718	1,556
I wash my hands using soap or hand sanitizer regularly	0,118	1,649	0,881	3,086
I usually use a mask to protect myself from the risk of contracting COVID-19	0,934	0,956	0,333	2,744
If I make contact or interaction with people infected with COVID-19, I am willing to be in isolation at home for a certain period until I prove that I am not infected with COVID-19	0,153	0,538	0,230	1,260
I usually follow updates or updates about the spread of COVID-19 in my country	0,220	1,333	0,842	2,109
I usually follow the latest updates or news about the spread of COVID-19 in the world	0,007*	1,608	1,141	2,267
If there is a browsur or leaflet containing information about COVID-19, I will read it and follow the instructions described in it	0,006*	1,477	1,116	1,956

I am willing to follow the Government's recommendations regarding the prevention of COVID-19 transmission	0,027*	0,596	0,376	0,944
I am willing to buy COVID-19 prevention tools such as masks and hand sanitizers	0,001*	3,468	1,710	7,033

DISCUSSION

Indonesia is currently unable to effectively suppress the transmission of COVID-19. COVID-19 still leads to an increase in positive confirmed cases above 1000 cases per day. This study was conducted to assess the knowledge, attitudes and anxieties of Indonesian people in the face of the COVID-19 pandemic. The population of Indonesians who participated in this study, most of the people have good knowledge, which is evident from some of the questions we asked. The level of good knowledge in this study is thought to be because most of the participants had a higher level of education. Studies conducted on Chinese populations prove that there is a positive relationship between education and knowledge levels.⁷

The knowledge covered in the cognitive domain includes knowing what is defined as recalling a material that has been studied before, understanding an object not just knowing, mentioning but correctly representing the known object, and applying if someone who has understood the object in question can apply it.⁸ Respondents in this study who have higher knowledge is also due to the majority of respondents over the age of 20 years. The results of research conducted in three countries (Jordan, Saudi Arabia and Kuwait), that a higher COVID-19 knowledge score was significantly proven related to age and educational attainment.⁹ Research conducted in China, suggesting older people over the age of 29 show a significant increase in knowledge compared to younger people.¹⁰

Knowledge is considered important in covid-19 prevention efforts, if the public has good knowledge, it is expected that the public is more obedient in covid-19 prevention efforts recommended by the Indonesian government.¹¹ Our study proves that anxiety occurs in those who know how covid-19 spread, know that COVID-19 is more dangerous in elderly people and have chronic diseases, know how to prevent, and know that there is no cure for COVID-19 at this time. Anxiety has an adverse impact on mental health. Studies in China prove that people who spend too much time thinking about outbreaks are at high risk of suffering from mental illness.¹²

Participants of this study expressed an optimistic attitude towards the prevention of COVID-19, most participants took measures to prevent the spread of infection by COVID-19, such as: not shaking hands and cuddling when meeting friends, always using a mask when out of the house and washing hands using soap or hand sanitizer regularly. This preventive behavior is also due to the strict rules of the central government and local governments. Previous research has shown that most of the population takes COVID-19 precautions, i.e. not traveling to crowded places,⁶ and

wearing masks.¹³ Studies in Vietnam state that the prevention of COVID-19 transmission is to wash your hands and use face masks.¹⁴

Almost all of the study participants agreed to be isolated at home if they made direct contact or interaction with people infected with COVID-19. It is necessary to rely on classic public health measures to curb this epidemic of respiratory diseases. The main purpose of these public health measures is to prevent the spread of the disease from person to person by separating people to stop transmission. Breaking the chain of transmission suggested is to apply social distance and isolation and quarantine to the general public who have symptoms of COVID-19. Patient isolation is very effective in stopping transmission if early detection is possible before clear release of the virus.¹⁵

The findings of this study, often they follow the news about COVID-19, follow the advice of the government and are willing to buy COVID-19 prevention equipment to show that they feel anxious during the COVID-19 outbreak, they do so in hopes of avoiding the transmission of COVID-19. Excessive anxiety in society will have an impact on mental health. Therefore, it is important to overcome mental health difficulties in pandemic situations. Studies in India state that when anxiety occurs a wide population, it can lead to panic for the community, which causes resources to quickly run out. It can also lead to limitations in daily activities, evasive behaviors that lead to limited socialization. Due to anxiety, people adopt a variety of unwanted lifestyles, which can affect mental health.⁴ Research in Iraq states that social media has a significant impact on the spread of fear and panic related to the COVID-19 outbreak, with the potential for negative influences on people's mental health and psychological well-being.¹⁶

CONCLUSION

Our study shows that those who feel anxious during a pandemic are those who know how to spread, which groups are more at risk of infection, prevention and no COVID-19 treatment yet. Anxiety during the COVID-19 pandemic is also shown from the attitude of those who follow updates or updates about the spread of COVID-19, follow the advice of the government and are willing to buy equipment for the prevention of COVID-19. The need for mental health consultation facilities to people throughout Indonesia to reduce the level of public anxiety.

REFERENCES

- I. Setiati S, Azwar MK. COVID-19 and Indonesia. *Acta Med Indones*. 2020;52(1):84–9.
- II. Kim S-W, Su K-P. Using psychoneuroimmunity

- against COVID-19. *Brain Behav Immun*. 2020;87:4–5.
- III. Ho CSH, Chee CY, Ho RC. Mental health strategies to combat the psychological impact of COVID-19 beyond paranoia and panic. *Ann Acad Med Singapore*. 2020;49(1):1–3.
- IV. Roy D, Tripathy S, Kar SK, Sharma N, Verma SK, Kaushal V. Study of knowledge, attitude, anxiety & perceived mental healthcare need in Indian population during COVID-19 pandemic. *Asian J Psychiatr*. 2020;51:102083.
- V. Brooks SK, Webster RK, Smith LE, Woodland L, Wessely S, Greenberg N, et al. The psychological impact of quarantine and how to reduce it: rapid review of the evidence. *Lancet*. 2020;395(10227):912–20.
- VI. Sutriyawan A. *Metodologi Penelitian Kedokteran dan Kesehatan: Dilengkapi Tuntunan Membuat Proposal Penelitian*. Bandung: PT Refika Aditama; 2021.
- VII. Zhong B-L, Luo W, Li H-M, Zhang Q-Q, Liu X-G, Li W-T, et al. Knowledge, attitudes, and practices towards COVID-19 among Chinese residents during the rapid rise period of the COVID-19 outbreak: a quick online cross-sectional survey. *Int J Biol Sci*. 2020;16(10):1745–52.
- VIII. Sutriyawan A, Fitriyani S, Kurniawati RD. Relationship of Knowledge with the Motivation of Health Officers in COVID-19 Prevention at Humana Prima Mother and Children's Hospital. *Int J Converg Healthc [Internet]*. 2021 [cited 2021 May 28];1(1):1–5. Available from: <https://www.ijcih.com/index.php/ijcih/article/view/3>
- IX. Naser AY, Dahmash EZ, Alwafi H, Alsairafi ZK, Al Rajeh AM, Alhartani YJ, et al. Knowledge and practices towards COVID-19 during its outbreak: a multinational cross-sectional study. *medRxiv*. 2020;1–17.
- X. Lin Y, Huang L, Nie S, Liu Z, Yu H, Yan W, et al. Knowledge, attitudes and practices (KAP) related to the pandemic (H1N1) 2009 among Chinese general population: a telephone survey. *BMC Infect Dis*. 2011;11(1):128–36.
- XI. Sutriyawan A, Akbar H, Fibrianti IP, Somantri UW, Sari LY. Descriptive Online Survey: Knowledge, Attitudes, and Anxiety During the Period of Pandemic COVID-19 in Indonesia. *Med Leg Updat*. 2021;21(1):42–8.
- XII. Pappa S, Ntella V, Giannakas T, Giannakoulis VG, Papoutsis E, Katsaounou P. Prevalence of depression, anxiety, and insomnia among healthcare workers during the COVID-19 pandemic: A systematic review and meta-analysis. *Brain Behav Immun*. 2020;88:901–7.
- XIII. Dkhar SA, Quansar R, Saleem SM, Khan SMS. Knowledge, attitude, and practices related to COVID-19 pandemic among social media users in J&K, India. *Indian J Public Health*. 2020;64(6):205–10.
- XIV. Huynh G, Nguyen TNH, Vo KN, Pham LA. Knowledge and attitude toward COVID-19 among healthcare workers at District 2 Hospital, Ho Chi Minh City. *Asian Pac J Trop Med*. 2020;13(6):260–5.
- XV. Wilder-Smith A, Freedman DO. Isolation, quarantine, social distancing and community containment: pivotal role for old-style public health measures in the novel coronavirus (2019-nCoV) outbreak. *J Travel Med*. 2020;27(2):1–4.
- XVI. Ahmad AR, Murad HR. The impact of social media on panic during the COVID-19 pandemic in Iraqi Kurdistan: online questionnaire study. *J Med Internet Res*. 2020;22(5):5–22.