

Journal of Global Oral Health



Research Article

Patients awareness, perception, and willingness toward dental treatment during COVID-19 pandemic in India

Noopur Kokane¹, Vandana Kokane², Varsha Uttarwar², Pratik Burad², Jasleen Kaur²

Department of Public Health Dentistry, Government Dental College and Hospital, 2Department of Conservative Dentistry, VSPM Dental College, Nagpur, Maharashtra, India.



*Corresponding author:

Noopur Kokane, Assistant professor, Department of Public Health Dentistry, Government Dental College and Hospital, Nagpur, Maharashtra, India.

nkokanegupta@gmail.com

Received: 05 February 2021 Accepted: 03 May 2022 Published: 29 July 2022

DOI

10.25259/JGOH_3_2021

Quick Response Code:



ABSTRACT

Objectives: COVID-19 has badly affected the global economy, also affecting the health-care sector with a major effect on dentistry. It is important to understand the reason behind it from patient's perspective, by knowing their awareness, perception, and willingness toward dental treatment during COVID-19 times. This might help the dentist to increase patient inflow.

Materials and Methods: A cross-sectional study was conducted using an online survey. A validated questionnaire was circulated to participants by investigators, consisting questions related to demographic data, awareness, perception, and willingness toward dental treatment. A total of 616 participants responded. Statistical analysis was performed using Statistical Package for the Social Sciences version 22.

Results: More than 90% of participants are aware of COVID-19 and various precautions to be taken to prevent the spreads of the disease. The majority of participants about 74% are aware that dentists are at higher risk of acquiring COVID-19 infection. Many respondents 76.6% are afraid to visit the dentist, due to fear of acquiring COVID-19 infection 74% prefer to delay dental treatment. Around 71.8% are willing to consult through teledentistry, 69.8% are not willing to provide medical certificates, and 58.2% are willing to pay more fees than usual for the extra precaution taken by the dentist to prevent COVID-19 spread.

Conclusion: People are afraid to visit dental clinics due to fear of cross infection. People are ready to pay more for precautions taken by their dentists. People should be made aware of precautionary measures taken by the dentist so that they feel safe to visit a dental clinic during COVID-19 times.

Keywords: COVID-19 fear, Knowledge, Perception, Willingness

INTRODUCTION

Coronavirus is a family of viruses that causes respiratory infections, the new coronavirus (SARS-CoV-2) discovered in December 2019 in China comes from the same family. This recent COVID-19 turned into a global public health outbreak.[1] There is a multi-sectorial impact of the virus as the economic activities of most nations have slowed down. [2]

Dentistry is one such sector that is severely affected. However, for decades dentists have been dealing with various blood-borne, bacterial, and airborne infections and have been tackling these infections effectively by following various guidelines issued by associations and administrations to prevent cross infection in dental settings. However, due to the mysterious nature of COVID-19, dentists have reduced their patients to only emergencies or completely closed their clinics for fear of spreading COVID-19 infection among their patients and family.

This is an open-access article distributed under the terms of the Creative Commons Attribution-Non Commercial-Share Alike 4.0 License, which allows others to remix, transform, and build upon the work non-commercially, as long as the author is credited and the new creations are licensed under the identical terms. ©2022 Published by Scientific Scholar on behalf of Journal of Global Oral Health

However, this has created a tremendous financial burden on the dentist.

In united states, after gradual lifting of lockdown, all dental clinics were open but, only 1.2% did business as usual^{,[3]} conditions are the same globally as in India. It is important to know the reason behind it from patient perspective. Plenty of literature is available to know the knowledge, perception, and attitude of dentists and dental students about COVID-19. However, dentists are just one side of the coin when it comes to practicing dentistry, patients are the other side. Awareness among patients is equally important as it might help to reduce cross-infection. It is important to know patients' perception of dental treatment during COVID-19 infection to understand their willingness toward dental treatment. Hence, this study aims to find out the awareness, perception, and willingness of patients toward dentists and dental treatment procedure.

MATERIALS AND METHODS

A Google form of the questionnaire was created. A close ended questionnaire (pre-tested and pre-validated with Cronbach's alpha as 0.83) and a small message explaining the aims and objectives of the study were sent to participants. The participants were approached by the principal investigator and coinvestigator through personal connections and WhatsApp groups timely reminder were sent weekly. Participation was voluntary and all had an option of opting out of the study by not filling out the questionnaire. The study duration was 30 days. The sample size was calculated using Epi Info and came to be 616.

The questions were close ended. Participants were first asked about their demographic data, age gender, and education. Then, they were asked if they had any dental problems? Three response options were available "ves," "no," and "maybe." The next three questions were on awareness of patients on COVID-19 infection, three response options were available "yes," "no," and "maybe." The next five questions were on participant's perceptions toward dental treatment and COVID-19 infection, and three questions were on the willingness, with responses of "yes" and "no." Descriptive statistical methods were used to summarize data on demographic characteristics and responses to questions concerning knowledge, perceptions, and willingness toward dental treatment during COVID-19. ANOVA tests were used to determine the relationship between variables. All data analyses were performed using Statistical Package for the Social Sciences software, version 22. A value of P < 0.005 was considered statistically significant.

RESULTS

The basic data of all questions and the obtained answers percentage are mentioned in [Figures 1-4]. The majority of respondents belong to 40-60 years of age, are females, and with a postgraduate degree. The majority 95.1% were aware

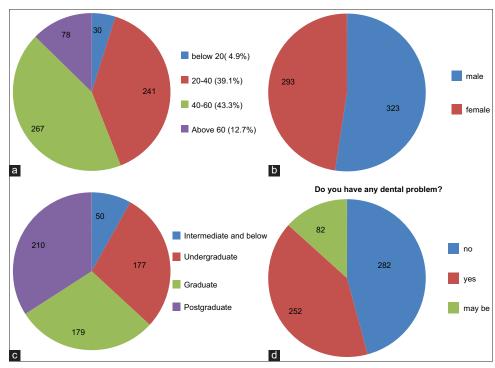


Figure 1: (a) Data on distribution of age. (b) Data on distribution of gender. (c) Data on the distribution of education. (d) Data on dental problem.

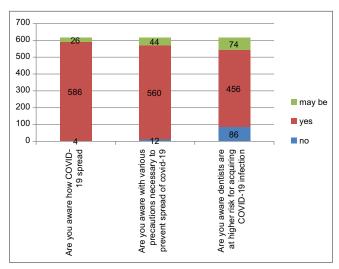


Figure 2: Data on awareness.

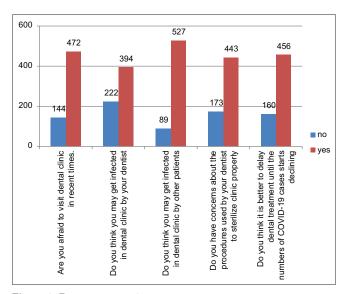


Figure 3: Data on perception.

of how COVID-19 spreads and 90.9% are aware of various precautions necessary to prevent the spread of the disease. The majority of 74% of respondents are aware that dentists are at higher risk of acquiring COVID-19 infection. Many respondents 76.6% are afraid to visit the dentist, 64% fear being infected in the dental clinic by their dentist, and 85.6% fear being infected by other patients. Around 71.9% of people are concerned about the procedures used by their dentist to sterilize clinics. The majority of 74% think that it is better to delay dental treatment until the numbers of COVID-19 cases start declining. Only 28.2% are not willing to consult a dentist through teledentistry, 30.2% are not willing to provide medical certificates of being COVID negative, and 41.8% are not willing to pay more fees than

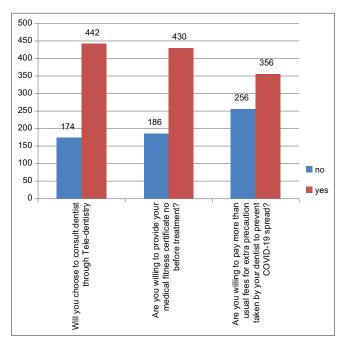


Figure 4: Data on willingness of patient.

usual for the extra precaution taken by the dentist to prevent COVID-19 spread.

[Tables 1-3] represent data on awareness, [Table 1] shows data on awareness about the spread of disease, and there is a high statistical significance between age, education, and awareness about how COVID-19 spreads. However, no significance is seen between gender and awareness about the spread of COVID-19 infection (P = 0.013). [Table 2] shows data on awareness about various precautions necessary to prevent the spread of COVID-19. There is a statistical significance between age, gender, education, and awareness of various precautions necessary to prevent the spread of COVID-19 (P = 0.002, 0.001, and 0.005, respectively). [Table 3] shows data on awareness about dentists being at higher risk for acquiring the COVID-19 infection. There is no statistical significance in any group.

[Tables 4-6] show the perception of responses toward the dentist and spread of COVID-19 in the dental clinic. [Table 4] shows that data of respondents afraid to visit the dentist during the COVID-19 period. Although the majority of respondents are afraid to visit the dentist during the COVID-19 period, there is no significant difference between the groups based on age, education, and problem in oral health. [Table 5] shows that data on probable cause of why people may be afraid to visit the dental clinic during COVID period. Being aware that dentists are at higher risk for acquiring COVID-19 infection is not the statistically significant reason for people to be afraid to visit the dentist P = 0.862. Getting infected in the dental setting by the dentist (64%) and by other patients (85.6%) shows a highly statistically significant reason for patients being afraid

Table 1: Awareness on how COVID-19 spread.					
	No (%)	Yes (%)	May be (%)	P-value	
Age					
Below 20	0(0.0)	30 (100.0)	0 (0.0)	0.001	
20-40	0(0.0)	241 (100.0)	0(0.0)		
40-60	0(0.0)	241 (90.3)	26 (9.7)		
Above 60	4 (5.1)	74 (94.9)	0(0.0)		
Gender					
Male	4 (1.2)	311 (96.3)	8 (2.5)	0.013	
Female	0(0.0)	275 (93.9)	18 (6.1)		
Education					
Intermediate	4(8.0)	46 (92.0)	0 (100)	0.001	
and below					
Undergraduate	0(0.0)	177 (100.0)	0(0.0)		
Graduate	0(0.0)	171 (95.5)	8 (4.5)		
Postgraduate	0	192 (91.4)	18 (8.6)		

Table 2: Data about patients who are aware about various precautions necessary to prevent spread of COVID-19.

	No (%)	Yes (%)	May be (%)	P-value
Age				
Below 20	0(0.0)	22 (73.3)	8 (26.7)	0.002
20-40	2 (0.8)	227 (94.2)	12 (5.0)	
40-60	4 (1.5)	243 (91.0)	20 (7.5)	
Above 60	6 (7.7)	68 (87.2)	4 (5.1)	
Gender				
Male	11 (3.4)	298 (92.3)	14 (4.3)	0.001
Female	1 (0.3)	262 (89.4)	30 (10.2)	
Education				
Intermediate	6 (12.0)	42 (84.0)	2 (4.0)	0.005
and below				
Undergraduate	2 (1.1)	153 (86.4)	22 (12.4)	
Graduate	0(0.0)	169 (94.4)	10 (5.6)	
Postgraduate	4 (1.9)	196 (93.3)	10 (4.8)	

Table 3: Patients those who are aware about dentists being at higher risk for acquiring COVID-19 infection.

	No (%)	Yes (%)	May be (%)	P-value
Age	· /		, ,	
Below 20	2 (6.7)	20 (66.7)	8 (26.7)	0.230
20-40	46 (19.1)	179 (74.3)	16 (6.6)	
40-60	30 (11.2)	191 (71.5)	46 (17.2)	
Above 60	8 (10.3)	66 (84.6)	4 (5.1)	
Gender				
Male	38 (11.8)	248 (76.8)	37 (12.6)	0.201
Female	48 (16.4)	208 (71.0)	37 (12.6)	
Education				
Intermediate	14 (28.0)	28 (56.0)	8 (16.0)	0.043
and below				
Undergraduate	21 (11.9)	138 (78.0)	18 (10.2)	
Graduate	29 (16.2)	120 (67.0)	30 (16.8)	
Postgraduate	22 (10.5)	170 (81.0)	18 (8.6)	

to visit the dentist p-value 0.00l. Being concerned about the procedures used by the dentist to sterilize the clinic properly are also one of the reasons for respondents being afraid to visit the dentist p-value 0.001. [Table 6] shows data for do you think it is better to delay dental treatment until the number of COVID-19 cases starts declining. Distribution of age group shows a statistical significance P = 0.001 to wait for cases to decline before going for dental treatment. The majority of people think it is better to delay dental treatment. However, a greater percentage of people below 20 years of age do not think it is better to delay. There is no statistical significance between male and female to delay dental treatment, till cases are on decline P = 0.136. According to the education, those who are

Table 4: Patients afraid to visit dentist.				
	No (%)	Yes (%)	P-value	
Age				
Below 20	12 (40)	18 (60.0)	0.130	
20-40	43 (17.8)	198 (82.2)		
40-60	62 (23.2)	205 (76.8)		
Above 60	27 (34.6)	51 (65.4)		
Gender				
Male	86 (26.6)	237 (73.4)	0.046	
Female	58 (19.8)	235 (80.2)		
Education				
Intermediate and below	15 (30.0)	35 (70.0)	0.109	
Undergraduate	44 (24.9)	133 (75.0)		
Graduate	43 (24.0)	136 (76.0)		
Postgraduate	42 (20.0)	168 (80.0)		
Do you have any dental pro	oblem			
No	82 (29.1)	200 (70.9)	0.261	
Yes	35 (13.9)	217 (86.1)		
May be	27 (32.9)	55 (67.1)		

Table 5: Data on probable cause of being afraid to visit dentist.					
Cause	No (%)	Yes (%)	P-value		
Are you aware dentist are at higher risk for acquiring COVID-19					
infection					
No (86)	25 (29.1)	61 (70.9)			
Yes (456)	99 (21.7)	357 (78.3)	0.862		
May be (74)	20 (27.0)	54 (73.0)			
Do you think you	may get infected	in dental clinic by	your		
dentist					
No (222)	108 (48.6)	114 (51.4)	0.001		
Yes (394)	36 (9.1)	358 (90.9)			
Do you think you	may get infected	in dental clinic by	other		
patients					
No (89)	53 (59.6)	36 (40.4)			
Yes (527)	91 (17.3)	436 (82.7)	0.001		
Do you have concerns about the procedures used by your dentist					
to sterilize clinic properly'					
No (173)	No (67 (38.7)	Yes (106 (61.3)			
Yes (443)	77 (17.4)	366 (82.6)	0.001		

below intermediate (80%) think that they should not delay their dental treatment. There is no statistical significance in that group P = 0.64.

[Tables 7-9] show the preference and willingness of respondents toward dental treatment.

[Table 7] shows the willingness to choose to consult a dentist through teledentistry. The majority prefer to consult a dentist through teledentistry, no statistical significance was found in the age group and gender (P = 0.291 and 0.753), respectively. Statistical significance is found in the education group 0.001 and the presence of dental problems 0.005. [Tables 8 and 9] show the willingness of respondents to provide a medical certificate before treatment and willingness to pay more than usual fees for extra precautions taken by the dentist to prevent COVID-19 spread. No significance was found in any group except for those who have any dental problem and willingness to pay more than usual fees for extra precaution taken by your dentist to prevent COVID-19 spread P = 0.001.

DISCUSSION

The outbreak of COVID-19 brought dentistry at lowest point economically. In his study, we tried to find out the reason behind it, by knowing the perception of people toward dentist and dental treatment. Perception is built by knowledge and awareness. Hence, in this study, we study the awareness, perception, and willingness of patients toward dentist and dental treatment during COVID-19 times.

The majority of participants are in age group 20-60, and well educated, this distribution may be due to two reasons; first, the use of mobile phone and access to internet, second, the interest in filling the questionnaire. The number of people with dental problems is 282; it is important to know if the population is suffering from the dental problem or not as it greatly influences their perception and attitude toward dentist and dental treatment.

Awareness

Nowadays, everyone has access to news and COVID is also one of the hot topics of discussion everywhere. More than 95% of people think that they are aware of how COVID-19 spreads. More than 90% of people think that they are aware of various precautions necessary to prevent the spread of COVID-19. In agreement with our findings, the previous studies conducted in different Asian countries, Egypt, Kenya, and Nigeria indicated high COVID-19 knowledge among the population.^[4] The previous studies have shown that the knowledge about the disease is due to novel channels like the social media platforms and the Internet, which represented the most important sources of information at the expense of more traditional media platforms, like newspapers.^[5] The

reasons for people being aware maybe because most of them are educated and as this was an online survey, people who can read and understand English participated in the survey, the same people have access to the internet and social media making them aware. The COVID-19 virus can be spread through saliva, bodily fluids, feces, and airborne droplets when people cough or sneeze, which is the major route of transmission.^[6] Dentists are exposed to aerosols and droplets splashing out of the patient's oral cavity as they work close to patients. Therefore, the dental department has a higher risk of cross infection than other departments or other places,

Table 6: Data on do you think it is better to delay dental treatment until the number of COVID-19 cases starts declining.

	No (%)	Yes (%)	P-value
Age			
Below 20	16 (53.3)	14 (46.7)	0.001
20-40	76 (31.5)	165 (68.5)	
40-60	48 (18.0)	219 (82.0)	
Above 60	20 (25.6)	58 (74.4)	
Gender			
Male	92 (28.5)	231 (71.5)	0.136
Female	68 (23.2)	225 (76.8)	
Education			
Intermediate and	40 (80.0)	10 (20.0)	0.001
below			
Undergraduate	48 (27.1)	129 (72.9)	
Graduate	24 (13.4)	155 (86.6)	
Postgraduate	48 (22.9)	162 (77.1)	
Do you have any denta	l problem		
No	82 (29.1)	200 (70.9)	0.64
Yes	62 (24.6)	190 (75.4)	
May be	16 (19.5)	66 (80.5)	

Table 7: Data on will you choose to consult your dentist through teledentistry.

,			
	No (%)	Yes (%)	P-value
Age			
Below 20	12 (40.0)	18 (60.0)	0.291
20-40	66 (27.4)	175 (72.6)	
40-60	78 (29.2)	189 (70.8)	
Above 60	18 (23.1)	60 (76.9)	
Gender			
Male	93 (28.8)	230 (71.2)	0.753
Female	81 (27.6)	212 (72.4)	
Education			
Intermediate and below	24 (48.0)	26 (52.0)	0.001
Undergraduate	57 (32.2)	120 (67.8)	
Graduate	43 (24.0)	136 (76.0)	
Postgraduate	50 (23.8)	160 (76.2)	
Do you have any dental pro	oblem		
No	100 (35.5)	182 (64.5)	0.005
Yes	52 (20.6)	200 (79.4)	
May be	22 (26.8)	60 (73.2)	

Table 8: Data on are you willing to provide your medical fitness certificate before treatment.

	No (%)	Yes (%)	P-value
Age			
Below 20	4 (13.3)	26 (86.7)	0.019
20-40	73 (30.3)	168 (69.7)	
40-60	75 (28.1)	192 (71.9)	
Above 60	34 (43.6)	44 (56.4)	
Gender			
Male	90 (27.9)	233 (72.1)	0.186
Female	96 (32.8)	197 (67.2)	
Education			
Intermediate and below	20 (40.0)	30 (60.0)	0.32
Undergraduate	60 (33.9)	117 (66.1)	
Graduate	50 (27.9)	129 (72.1)	
Postgraduate	56 (26.7)	154 (73.3)	
Do you have any dental pro	oblem		
No	78 (27.7)	204 (72.3)	0.581
Yes	86 (34.1)	166 (65.9)	
May be	22 (26.8)	60 (73.2)	

Table 9: Data on are you willing to pay more than usual fees for extra precaution taken by your dentist to prevent COVID-19 spread.

	No (%)	Yes (%)	P-value
Age			
Below 20	0 (0.0)	30 (100.0)	0.544
20-40	123 (51.0)	118 (49.0)	
40-60	97 (36.3)	170 (63.7)	
Above 60	36 (46.2)	42 (53.8)	
Gender			
Male	136 (42.1)	187 (57.9)	0.773
Female	120 (41.0)	173 (59.0)	
Education			
Intermediate and	18 (36.0)	32 (64.0)	0.441
below			
Undergraduate	88 (49.7)	89 (50.3)	
Graduate	63 (35.2)	116 (64.8)	
Postgraduate	87 (41.4)	123 (58.6)	
Do you have any dent	al problem		
No	96 (34.0)	186 (66.0)	0.001
Yes	110 (43.7)	142 (56.3)	
May be	50 (61.0)	32 (39.0)	

74% are aware that dentists are at higher risk of acquiring COVID-19 infection. This again may be due to the vast knowledge available online today, there is a considerable awareness about cross-infection occurring in dental clinics. ^[7] This knowledge is good for both the patient and the dentist to prevent the spread of the disease. A well-aware patient will not only take precautions but hopefully will keep a check on the dental team encouraging them to take all necessary steps to prevent cross infection.

Perception

Dental anxiety is a common condition among the masses worldwide and remains a barrier to dental care for many.^[8] It has been established that subjects who are highly anxious have the greatest likelihood of avoiding dental treatment.^[9] With the increasing awareness about COVID-19 and cross infection in the dental setting, there is also an increase in dental anxiety and fear due to which, 76.6% are afraid to visit the dental clinic. Moreover, 74% are delaying their dental treatment. In a previous study about 50% of respondent have delayed their dental treatment due to fear of COVID-19 infection.^[10] About 90.9% of people who are afraid to visit the dentist fear getting infected in the dental clinic by their dentist and 82.7% feel that they may be infected by other patients visiting the dental clinic.

The nature of the virus remaining airborne through aerosols generated during dental procedures has created a lot of fear and awareness among many, about dentistry. About 82.6% of those who are afraid to visit the dental clinic are worried about the procedures used by the dentist to sterilize the clinic properly. The finding of our study does not match with the previous studies, which showed the patient had a positive attitude toward the dentist as they use various barriers method to prevent the spread of infection during dental practice. There is a need to spread proper awareness among the people about the safety precautions taken by the dentist to prevent cross infection in the dental setting, which may help to change people's perceptions.

Willingness

To reduce the spread of infection, the main aim is to avoid person-to-person contact. The word "tele" means "distant", and therefore, teledentistry satisfies the need for social distancing. Teledentistry can be incorporated into routine dental practice as it offers a wide range of applications such as remote triaging of the suspected COVID-19 patients for dental treatment and decreasing the unnecessary exposure of healthy or uninfected patients by decreasing their visits to already burdened dental offices and hospitals.[13] In our study, 71.8% are willing to consult their dentist through teledentistry, but the result does not match with the previous studies where teledentistry is not used by the patients in a previous study. Fewer than 1% of survey respondents indicated that they had a virtual dental appointment through the internet, phone, or video. [10] About 69.8% are willing to provide a medical fitness certificate before the treatment that they are COVID-19 negative if a dentist brings this in practice that treats all patients only after the certificate it will be very easy to prevent the spread of coronavirus in the dental setting and will also be reassuring for patients.

With patients delaying their treatment and extra cost occurring for sterilization process precautions, for example,

PPE kits, it only adds up to the financial burden. To incur the additional cost, dentist must raise their usual fees and according to results of our study around 60% are ready to pay more than usual fees for extra precaution taken by the dentist to prevent COVID-19 spread.

CONCLUSION

Certainly, COVID-19 has economically affected many sectors, dentistry being one severely affected. Patients are delaying their treatment due to fear of acquiring the infection from the dentist and other patients in the dental setting. The perception of people needs to be changed about dental treatment and acquiring the infection. For perception to change; first, dentists should follow all the guidelines provided by various associations and OSHA for personal safety as well follow the sterilization process to prevent cross infection in the dental setting. Second, the dentist should also educate and make people aware of all the extra precautionary measures taken by them during the COVID-19 period to prevent cross infection and make people feel safer in the dental setting. Most people are ready to consult their dentist through teledentistry so the dentist can encourage this and consult the majority of patients online and call only emergency patients to the clinic so that the clinic is not crowded. If possible, teleconsultations could be charged. Routine fees can be increased as the majority is ready to pay more. Teledentistry, a medical fitness certificate before treatment, and extra precautionary measures are the need of time during this period, and also spread of awareness about this is equally important.

Limitations

The study was in English language and circulated through social media, so only one with access to internet and understanding of English language participated in survey.

Declaration of patient consent

Patient's consent not required as patients identity is not disclosed or compromised.

Financial support and sponsorship

Nil.

Conflicts of interest

There are no conflicts of interest.

REFERENCES

- Pereira LJ, Pereira CV, Murata RM, Pardi V, Pereira-Dourado SM. Biological and social aspects of coronavirus disease 2019 (COVID-19) related to oral health. Braz Oral Res 2020;34:e01.
- Chaudhary M, Sodani PR, Das S. Effect of covid-19 on economy in India: some reflections for policy and program. J Health Manag 2020;22:169-80.
- Reuben RC, Danladi M, Saleh DA, Djembe PE. Knowledge, attitudes, and practices towards covid-19: An epidemiological survey in North-Central Nigeria. J Community Health 2021;46:457-70.
- Abdelhafiz AS, Mohammed Z, Ibrahim ME, Ziady HH, Alorabi M, Ayyad M, et al. Knowledge, perceptions, and attitude of Egyptians towards the novel coronavirus disease (COVID-19). J Community Health 2020;45:881-90.
- Spagnuolo G, De Vito D, Rengo S, Tatullo M. COVID-19 outbreak: An overview on dentistry. Int J Environ Res Public Health 2020;17:2094.
- Sun J, Xu Y, Qu Q, Luo W. Knowledge of and attitudes toward COVID-19 among parents of child dental patients during the outbreak. Braz Oral Res 2020;34:e066.
- Rustage KJ, Rothwell PS, Brook IM. Evaluation of a dedicated dental procedure glove for clinical dentistry. Br Dent J 1987;163:193-5.
- Corah NL, Gale EN, Illig SJ. Assessment of a dental anxiety scale. J Am Dent Assoc 1978;97:816-9.
- Moore R, Brodsgaard I, Mao TK, Kwan HW, Shiau YY, Knudsen R. Fear of injections and report of negative dentist behavior among Caucasian American and Taiwanese adults from dental school clinics. Community Dent Oral Epidemiol 1996;24:292-5.
- 10. Kranz AM, Gahlon G, Dick AW, Stein BD. Characteristics of US adults delaying dental care due to the COVID-19 pandemic. JDR Clin Transl Res 2021;6:8-14.
- 11. Ghani F. Covid-19 outbreak immediate and long-term impacts on the dental profession. Pak J Med Sci 2020;36:S126-9.
- Nahlak I. Cross-infection and infection control in dentistry: Knowledge, attitude and practice of patients attended dental clinics in king Abdulaziz university hospital, Jeddah, Saudi Arabia. J Infect Public Health 2017;10:438-45.
- 13. Ghai S. Teledentistry during COVID-19 pandemic. Diabetes Metab Syndr 2020;14:933-5.

How to cite this article: Kokane N, Kokane V, Uttarwar V, Burad P, Kaur J. Patients awareness, perception, and willingness toward dental treatment during COVID-19 pandemic in India. J Global Oral Health 2022;5:25-31.