

THE PREVALENCE OF DENTAL ANXIETY AND FEAR IN PATIENTS REFERRED TO THAI MOOGAMBIGAI DENTAL COLLEGE AND HOSPITAL

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Article Received on 03/10/2019

Article Revised on 23/10/2019

Article Accepted on 13/11/2019

ABSTRACT

Aims and Objectives: To evaluate the prevalence and cause of patient's anxiety towards dental treatment and to improve patient management and development of better treatment strategies for anxious dental patients. **Materials and Methods:** This study was conducted among 100 patients referred to the outpatient clinic of Periodontics, Thai Moogambigai dental college, Chennai. Each patient was provided with a survey form and was asked to answer the questions given. The survey questionnaire consists of 20 structured questions. Ethical committee approval obtained from our university. Patients were clearly explained about purpose of the study and consent was obtained from them. The data collected from patients were kept confidential. **Results:** The prevalence of dental anxiety in the present study was found to be 73%. The results from the present study conducted reveals that In spite of many technological advances made in modern dentistry, anxiety associated with the dental treatment was extensive in the study population. **Conclusion:** The present cross-sectional study has been conducted on a limited population who has been referred to Thai Moogambigai Dental College and hospital during the study period. Studies on larger populations are required to reveal prevalence of dental fear and anxiety in the society. Also further studies with different designs should be conducted to investigate different factors causing dental anxiety and fear.

KEYWORDS: Hazard, knowledge, perception, protection, radiation.

INTRODUCTION

Dental anxiety refers to patient's response toward dental procedures, in which the stimulus is uncertain, unusual, or not present at the moment.^[1]

Fear is defined as an individual's response to a dangerous situation to protect their life.^[2] Dental fear is aroused by a real, immediately present, specific stimulus (e.g. needles, drilling), whereas anxiety, is aroused by unclear, not obvious, or not immediately present.^[3] An individual's emotional responses are almost the same in both situations.^[3]

Many patients are afraid of the stimuli involved with dental treatment, which could affect the dentist-patient interaction and the dental treatment.^[4] Dental anxiety may be due to age, gender, educational qualification, and socioeconomic status of the patient.^[5] It is also related to many factors such as previous history of unpleasant dental experience, painful dental experience in childhood, or even from indirect learning from dentally anxious people of their own society or family members.^[6]

Dental anxiety is a significant complication for both patient and dentist.^[3] This leads patients to postpone or cancel dental visits or avoid dental treatment completely.^[6] It is proved that anxious patients have more dental caries, missing and less restored teeth in comparison to patients who are not anxious. Their poor oral health maintenance has got a negative effect on their social life.^[7] Treating anxious patients usually takes more time in comparison to their counterpart; it is difficult to manage them during the procedure and they are often not satisfied with their treatment. Anxiety can affect patient/dentist interaction and result in a wrong diagnosis.^[7]

Hence this study was conducted to know the cause of patient's anxiety towards dental treatment and to improve patient management and development of better treatment strategies for anxious dental patients.

MATERIALS AND METHODS

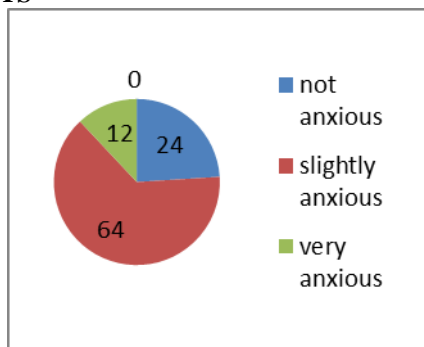
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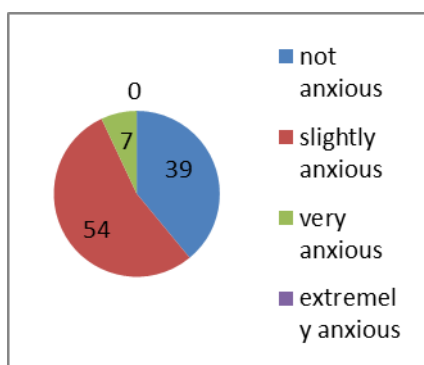
Statistical analysis

The collected data were subjected to statistical analysis. Data were analyzed using SPSS software; version 19 by means of statistical analyzes independent *t*-test.

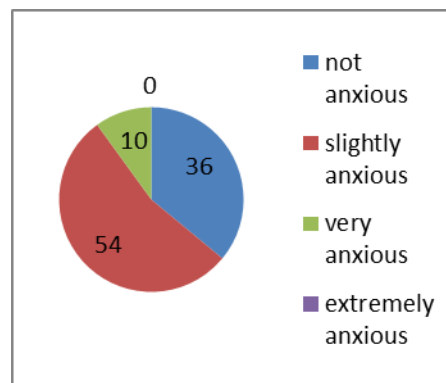
RESULTS



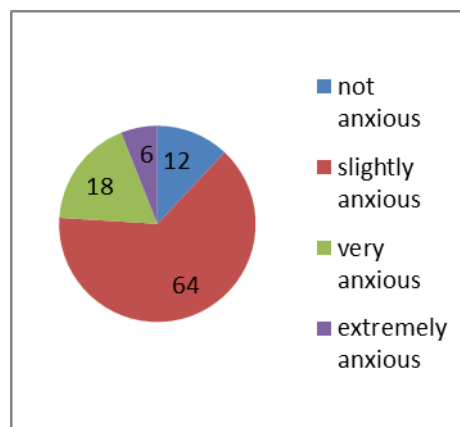
1. When the patients were asked, "If you are going to your periodontist for a treatment tomorrow, how would you feel?" 24% of the patients were not anxious, 64% of the patients were slightly anxious, 12% of the patients were very anxious, none of the patients were extremely anxious.



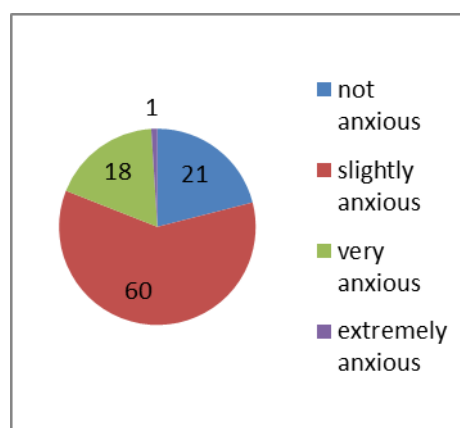
2. When they were asked, "If you were sitting in the waiting room how you would feel?" 39% of the patients were not anxious, 54% of the patients were slightly anxious, 7% of the patients were very anxious, none of the Patients were extremely anxious.



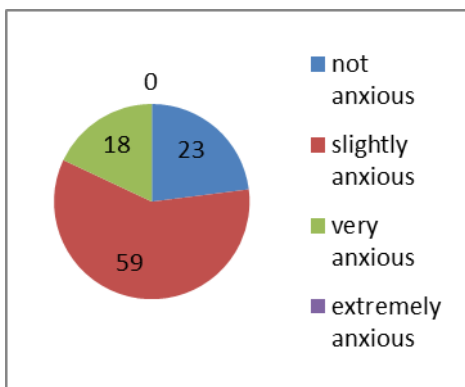
3. When the patients were asked, "If you were about to have your teeth scaled and polished, how would you feel?" 36% of the patients were not anxious, 54% of the patients were slightly anxious, 10% of the patients were very anxious, none of the Patients were extremely anxious.



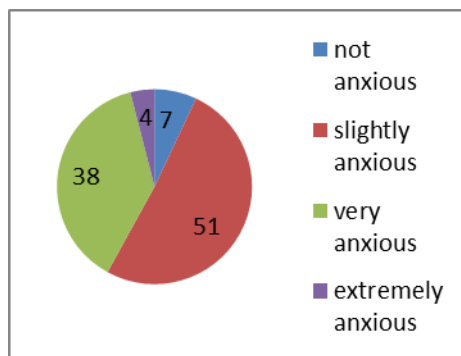
4. When they were asked, "If you were about to have a local anesthesia in your oral cavity, how would you feel?" 12% of the patients were not anxious, 64% of the patients were slightly anxious, 18% of the patients were very anxious, 6% of the Patients were extremely anxious.



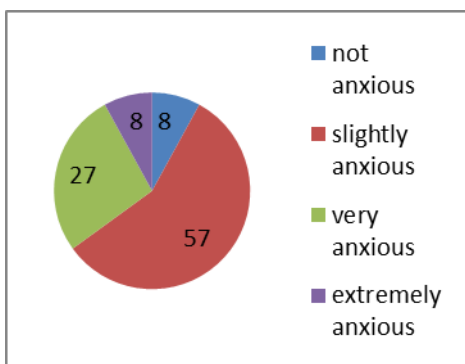
5. When they were asked, "If a dental object is placed in your mouth, how you would feel?" 21% of the patients were not anxious, 60% of the patients were slightly anxious, 18% of the patients were very anxious, 1% of the Patients were extremely anxious.



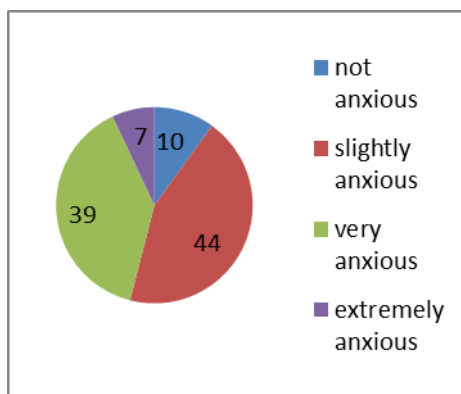
6. When they were asked, “How would you feel about the sound of instrument scrapping your teeth? 23% of the patients were not anxious, 59% of the patients were slightly anxious, 18% of the patients were very anxious, 0% of the Patients were extremely anxious.



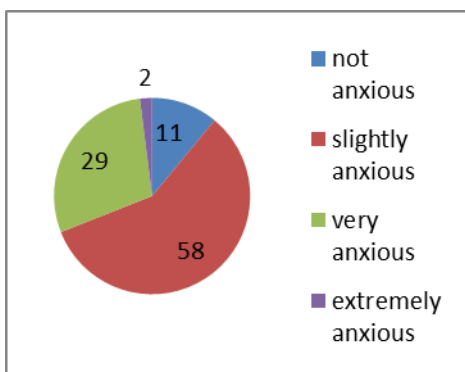
9. When they were asked, “how would you feel for the bleeding in the oral cavity during periodontal procedure? 7% of the patients were not anxious, 51% of the patients were slightly anxious, 38 % of the patients were very anxious, 4% of the Patients were extremely anxious.



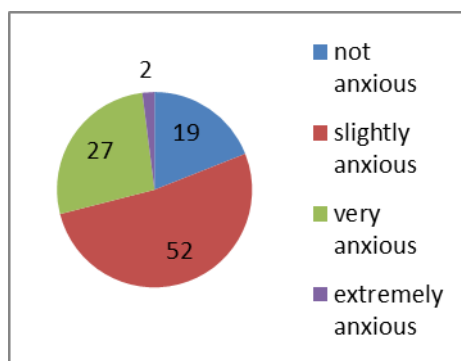
7. When they were asked, “How would you feel about the drilling procedure for implant placement?” 8% of the patients were not anxious, 57% of the patients were slightly anxious, 27% of the patients were very anxious, 8% of the Patients were extremely anxious.



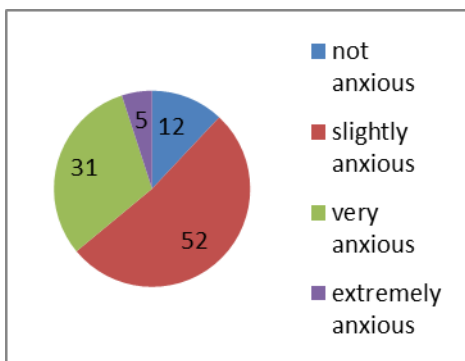
10. When they were asked, “How would you feel when you see a surgical knife during periodontal procedure?” 10% of the patients were not anxious, 44% of the patients were slightly anxious, 39 % of the patients were very anxious, 7% of the Patients extremely anxious.



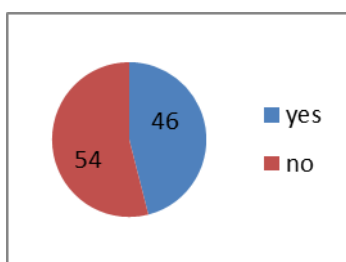
8. When they were asked, “How would you feel about the vibration of the drilling instrument?” 11% of the patients were not anxious, 58% of the patients were slightly anxious, 29% of the patients were very anxious, 2% of the Patients were extremely anxious.



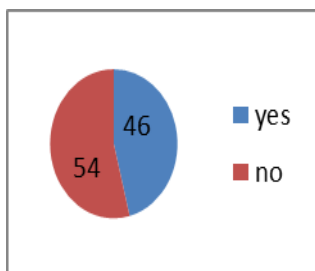
11. When they were asked, “How do you feel when your periodontist says about your bad breath?” 19% of the patients were not anxious, 52% of the patients were slightly anxious, 27% of the patients were very anxious, 2% of the Patients were extremely anxious.



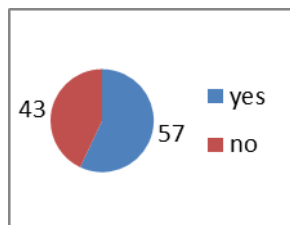
12. When they were asked, “How would you feel if your dentist says that you have gum disease?”12% of the patients were not anxious, 52% of the patients were slightly anxious, 31% of the patients were very anxious, 5% of the Patients extremely anxious.



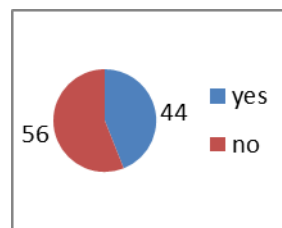
13. When they were asked, “Do you feel anxious on seeing dentist walk in?”54% of the patients were not anxious and 46% of the patients were anxious.



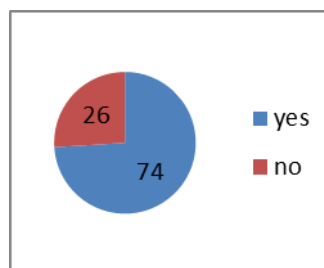
14. When they were asked, “Do you feel nauseating during your dental procedure?”54% of the patients were not nauseating and 46% of the patients were nauseating.



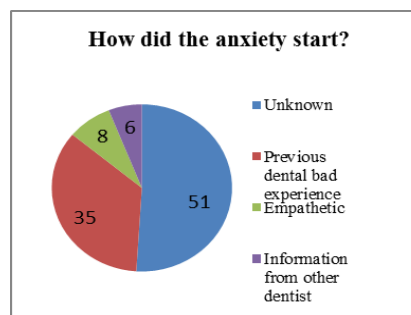
15. When they were asked, “Does your muscles become tensed during dental treatment?”43% of the patients were not anxious and 57% of the patients were anxious.



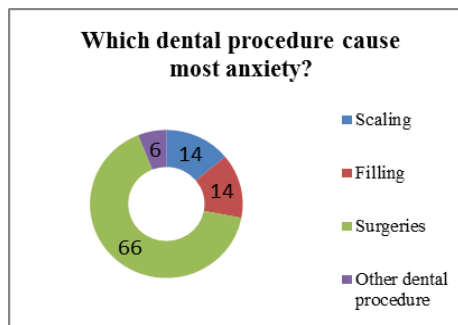
16. When they were asked, “Do you have fear of dying in dental chair from heart attack?”56% of the patients were not anxious and 44% of the patients were anxious.



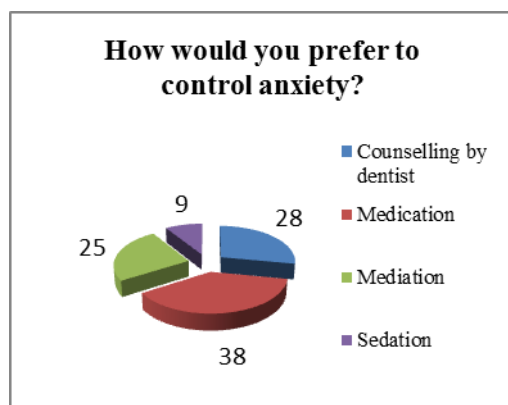
17. When they were asked regarding understanding about their dental procedure 26% of the patients didn't have a good understanding about the procedure and 74% of the patients had a good understanding of the same.



18. When they were asked regarding the source of anxiety, 51% of the patient's anxiety were due to unknown source, 35% were due to previous dental bad experience, 8% were due to Empathy, 6% were due to information from other dentist.



19. When asked regarding the procedure causing more anxiety 14% of the patients were more anxious about scaling, 14% of the patients were anxious about filling, 66% of the patients were anxious about surgeries, 6% of the patients were anxious about other dental procedures.



20. When they were asked, “How would you prefer to control anxiety?” 28% of the patients preferred counseling by dentist, 38% of the patients preferred medication, 25% of the patients preferred meditation, 9% of the patients preferred sedation.

DISCUSSION

The prevalence of dental anxiety in the present study was found to be 73%. This suggests that in spite of many technological advances made in modern dentistry, anxiety associated with the dental treatment was extensive in the study population. Prevalence was higher than that reported in study conducted by Do Nascimento *et al.* (23%)^[8], Malvania and Ajithkrishnan (46%)^[9].

The anxiety shown during sitting in the waiting area and chair before dental treatment demonstrates the urge for well-trained and supporting staff to be aware of the anxious patients.^[9] In a survey conducted by Do Nascimento *et al.*^[8] it was established that people with previous traumatic dental experiences showed higher levels of anxiety. This study reported that major cause for anxiety was unknown. This unknown factor could be psychological which has to be advised for better patient care.

Dental office ambience plays an important role in initiating dental fear and anxiety.^[10] Receptionists, dental nurses, and dental hygienists are crucial personnel in creating a suitable environment in the dental office.^[11] They should be positive and caring, and elicit information from the patients in a polite and concerned tone to make the patients comfortable.^[12] The office atmosphere can be made calm and unthreatening by the playing of pleasant and soothing music and avoidance of bright lights.^[12] A slightly cooler dental office is usually preferred by patients in a study conducted by Bare and Dundes. The walls can be displayed with posters and pictures, the waiting area can be supplied with informative books and magazines.^[13] The sounds produced by the instruments in the treatment room should be muted by closing the door. Most importantly, anxious patients should not be made to wait too long, so that they have no time to absorb negative experiences.^[14] In the present study more than 60% showed anxiety towards visiting a dental office. In general the working

atmosphere should be improved using the above suggestions for better reception of the patients. Only when the patients are in their comfort zone, they would follow the instructions by the dentist and may be they would turn up for the recall. Every clinician should be aware that not only treatment but also recall and maintenance is important.

It is also proved that focusing attention on specific alternative visual or auditory stimuli in the dental office might be useful for patients with mild to moderate dental anxiety.^[15]

CONCLUSION

The present cross-sectional study has been conducted on a limited population who has been referred to Thai Moogambigai Dental College and Hospital during the study period. Studies on larger populations are required to reveal prevalence of dental fear and anxiety in the society. Also further studies with different designs should be conducted to investigate different factors causing dental anxiety and fear.

Conflicts of interest

No conflicts of interest.

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