

ORIGINAL RESEARCH

Knowledge and Attitude of Parents regarding Oral Health of their Children in Kerala, India: A Cross-sectional Study

¹PT Santhosh Babu, ²Bhavin Purohit, ³Pavan K Singh, ⁴Kavita Verma, ⁵Sonam Rungta
⁶Dimple K Tirale, ⁷Kamini Dadsena

ABSTRACT

Background: Oral health is an integral part of general health among infants and children and impacts the quality of life and health outcomes. It is an integral component of preschool health and well-being. Parents are responsible for the oral health of their offspring and can play an important role in preventing oral diseases in children. As the oral health of children depends on the knowledge and awareness of their parents, these aspects are highly important. The aim of the present study was to determine the knowledge and attitude of parents regarding oral health of their children in Kerala.

Materials and methods: The study was conducted in the Department of Pedodontics and Preventive Dentistry, Azeezia College of Dental Sciences and Research, Meeyanoor, Kollam District, Kerala, India. The questionnaires along with the informed consent sheet were sent to the parents by post. The participants were reminded about the return of the filled forms through short message service and e-mails. The questionnaires covered sociodemographic characteristics, oral hygiene, dietary practices, and significance of oral health knowledge and attitude.

Results: This cross-sectional study was conducted with 500 (both mothers and fathers) parents, and their answers were evaluated to analyze their attitude and knowledge toward their child's oral health. Only about 11% of the parents knew the right age at which their child should be taken to the dentist. About 490 of the 500 (98%) parents agreed that the diet they give their child plays a role in their oral hygiene.

Conclusion: Parents' knowledge about their kids' oral health is important, and oral health education and promotion are the need of the hour for an oral-healthy future for the children.

Keywords: Attitude, Children, Knowledge, Oral health, Oral hygiene, Parents.

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¹Professor and Head, ^{2,3,6,7}Postgraduate Student, ^{4,5}Senior Lecturer

¹Department of Pedodontics and Preventive Dentistry, Azeezia College of Dental Sciences and Research, Kollam, Kerala, India

²Department of Prosthodontics and Crown and Bridge, Rungta College of Dental Sciences and Research, Bhilai, Chhattisgarh India

³Department of Public Health Dentistry, Vyas Dental College & Hospital, Jodhpur, Rajasthan, India

⁴Department of Oral Medicine and Radiology, Manubhai Patel Dental College, Hospital and Oral Research Institute, Vadodra Gujarat, India

⁵Department of Conservative Dentistry and Endodontics, Rungta College of Dental Sciences and Research, Bhilai, Chhattisgarh India

⁶Department of Pedodontics and Preventive Dentistry Chhattisgarh Dental College & Research Institute, Rajnandgaon Chhattisgarh, India

⁷Department of Oral and Maxillofacial Surgery, New Horizon Dental College & Research Institute, Bilaspur, Chhattisgarh India

Corresponding Author: PT Santhosh Babu, Professor and Head, Department of Pedodontics and Preventive Dentistry Azeezia College of Dental Sciences and Research, Kollam Kerala, India, Phone: +919447255751, e-mail: santosbabu@yahoo.com

INTRODUCTION

Oral health is an important aspect of general health in infants and children and impacts the quality of life and health outcomes. It is an important component of a child's well-being since preschool times.¹ Parents are responsible for the oral health of their children and can play an important role in preventing oral diseases in them. They clean their children's teeth, teach them proper oral hygiene and dietary habits, and organize professional dental care when they are young. A number of risk factors have been cited in the literature for early childhood caries that include prolonged or at-will breastfeeding, prolonged/frequent/nocturnal bottlefeeding, family size or the child's birth order, oral hygiene practices, dietary habits, and timing/reason for child's first dental visit.^{2,3} Oral health education begins from the footsteps of knowledge and awareness. Today, various dental health education programs have been conducted in schools and other settings; however, these efforts will not succeed until people are aware of the importance of oral health and inculcate a positive attitude toward treatment modalities. As the oral health of children depends on knowledge and awareness of their parents, these aspects are highly important. The aim of the present study was to determine the knowledge

and attitude of parents regarding oral health of their children in Kerala.

MATERIALS AND METHODS

The study was conducted in the Department of Pedodontics and Preventive Dentistry, Azeezia College of Dental Sciences and Research, Meeyanoor, Kollam District, Kerala, India. Parents of children aged 3 months to 10 years comprised the sampling frame for this study. The institutional ethical approval was obtained prior to the start of the study. Informed consent was taken from the participating parents. Questionnaires and informed consent were sent to the parents by post and obtained through return post. The participants were given a reminder through e-mails and short message service. The questionnaire covered sociodemographic characteristics, oral hygiene, dietary practices, and significance of oral health knowledge and attitude. Research has shown that parents play a vital role in the decision-making processes regarding oral health of their children.

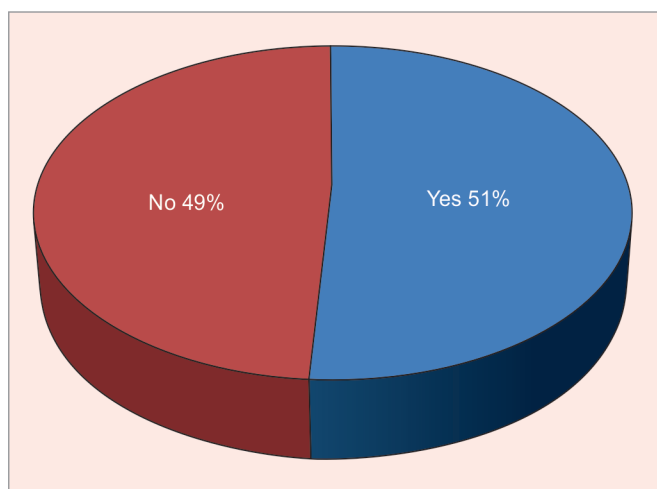
RESULTS

This cross-sectional study was conducted with 500 (both mothers and fathers) parents, and their answers were evaluated to analyze their attitude and knowledge toward their child’s oral health. In order to secure authentic results, unanswered questions were excluded from the questionnaires. A total of 412 mothers and 88 fathers participated in the study. The level of education of the parents ranged from illiterate (5%), up to 10th/12th (11%), undergraduation (69%), and postgraduation (15%). The monthly family income was less than 20,000 among 9% subjects; among 79% subjects, it was between 20,000 and 50,000; and above 50,000 among 12% subjects. On knowledge and attitude toward their children’s oral health, it

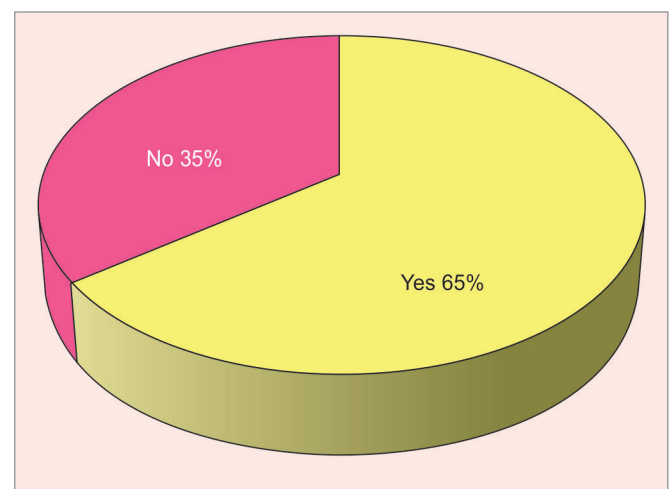
was observed that only 51% of the parents knew the right period of their children’s tooth eruption in the oral cavity (Graph 1), and the majority (65%) of the parents knew the correct age at which a child’s primary tooth falls off (Graph 2). Only 59% of the children brushed twice a day (Graph 3). Only 43% parents acknowledged that they actually monitor their child’s toothbrushing (Graph 4). The survey results show that about 63% of the parents visited the dentist only when there was an episode of pain, and about 72% of the parents took their children to the dentist only when they complained of pain. Among the subjects, when they were asked about what they would do when their child complains of toothache, 59% did the right thing by taking their child to the dentist, about 28% took the choice of consulting a general practitioner, and 13% felt that they would increase their child’s intake of milk. Only about 11% of the parents knew the right age at which their child should be taken to the dentist. About 490 of the 500 (98%) agreed that the diet they give their child plays a role in their oral hygiene and only 20% of the subjects were educated about the fact that oral habits, such as thumb sucking, mouth breathing, tongue thrusting, etc., affect their children’s developing dentition.

DISCUSSION

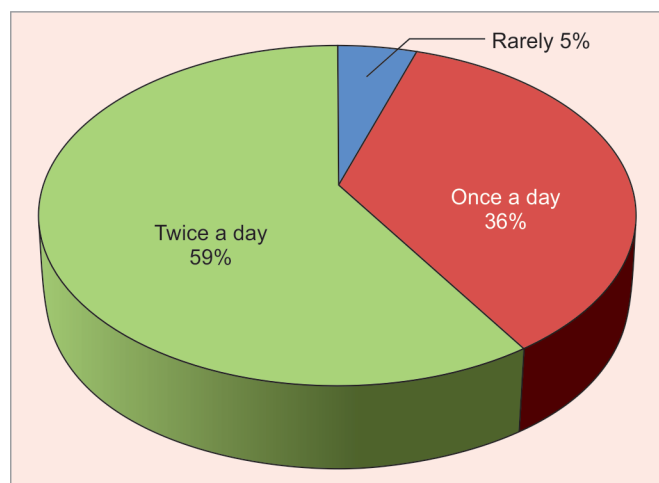
The rationale of this study is to improve and motivate the parents and children regarding the child’s oral health and treatment needs. The oral health knowledge of the parents establishes the oral health and related habits of the children during infancy and this is maintained throughout the preschool years. Parents play an important role for their children in this aspect. This study provides important data on knowledge of parents toward oral hygiene of children aged 3 months to 10 years. The survey shows that the parents were relatively knowledgeable regard-



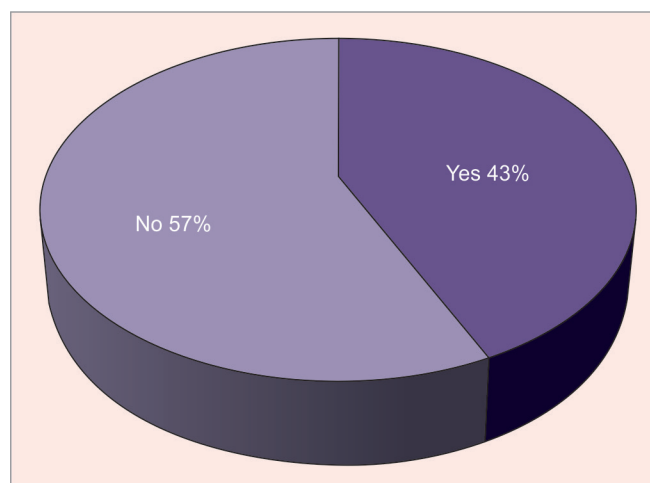
Graph 1: Parents’ knowledge regarding the correct period of their children’s tooth eruption in the oral cavity



Graph 2: Parents’ knowledge regarding the correct age at which a child’s primary tooth falls off



Graph 3: Parents' knowledge regarding number of times a child brushes teeth in a day



Graph 4: Parents' attitude regarding monitoring their child's brushing

ing their children's oral health. The literacy level of the parents is considered important for assessing oral health status, as it relates to the level of information known by a parent about the importance of the oral health of children in the society. It is generally assumed that a well-educated person is generally more aware of overall health.^{4,5} It was encouraging to observe that the majority of the parents knew the right time when the child's first tooth falls off. This shows that parents became aware of their children's oral health as the age of the child increases. In present study, only 11% of the parent population knew the correct age as to when to take the child to the dentist. In a similar study carried out by Reddy et al,⁶ 74.7% subjects did not know that a child should be consulted/taken to a dentist before 1 year of age. The American Academy of Pediatric Dentistry in its guidelines recommends implementation of oral hygiene measures no later than the time of eruption of the first primary tooth.⁷ Cleaning the teeth as soon as it erupts helps in reducing bacterial colonization. Tooth-brushing should be performed for preschool children by a parent twice daily, using an age-appropriate soft toothbrush. Flossing should be initiated when proximal contacts develop as proximal tooth surfaces cannot be cleaned with a toothbrush.⁸⁻¹⁰ The parents with correct and adequate oral health knowledge and attitude are likely to positively influence their children's oral health. The parents who brushed twice a day mostly had children who brushed twice a day. The present study also emphasizes the need to initiate more oral health education programs for parents and their children at the preschool and school setups so as to spread the oral health awareness in Kerala. Medical professionals, who are the first to come into contact with expectant and new mothers, need to disseminate appropriate and accurate information about oral health care for infants and children and guide parents to dentists for regular oral health examination.

CONCLUSION

Parents can play a very vital role in promoting oral health, thereby preventing oral diseases. Thus, they positively influence their children's oral health at a younger age. Parents often tend to ignore their child's oral health when compared with their overall health. Parents' knowledge about their kids' oral health is important, and oral health education and promotion are the need of the hour for an oral healthy future for the children.

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