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Evaluation Of Knowledge, Attitude And Practice In Parents Regarding Paediatric Oral Health Care

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Article History	ABSTRACT:					
Received:	Objective: To assess the knowledge, attitude, and practise in parents					
Revised:	regarding paediatric oral health care.					
Accepted:	Design: A cross sectional questionnaire survey of 500 parents visiting dental clinics for the first time at the Department of Paediatric and Preventive Dentistry for dental treatment of their child. Outcome measures: Responses were obtained for dental knowledge,					
	attitudes and practise. Relating to the eruption and shedding of deciduous and permanent teeth, preventive aids in pedodontics, diseased conditions such as dental decay, gums swelling and crowding, frequency of consumption of refined food by their children and oral health practise.					
	Results: Parents have approximately similar percentage of positive knowledge i.e.38.4% and 38.8% towards preventive oral health and oral disease respectively. In addition the positive attitude was also found to be 77.5% and 77.8% towards preventive oral health and oral disease respectively. Whereas only 11.41% showed a positive attitude towards					
	practising the preventive oral health, in contrast with oral disease showing 35.6% parents positive practise.					
	Conclusions: Parents had positive attitude on the need to conserve natural teeth for their children, but they lacked adequate knowledge regarding preventive oral health and oral disease. And also very low					
CC License	utilization of dental services in spite of positive attitude towards dental					
CC-BY-NC-SA 4.0	treatments.					

INTRODUCTION:

Oral Health is an integral component of general health. It has also become clear that causative and risk factors in oral diseases are often the same as those implicated in the major general diseases (WHO, 2003). The overall health, wellbeing, education and development of children, families and communities can be affected by oral health. Though there has been considerable improvement in the oral health of children in the last few decades, tooth decay still remains one of the most commonly occurring oral health problems in the children all over the globe. A considerable population of children in the developing nations is being affected by tooth decay and most of the time their proper treatment is given the last priority owing to limited access to oral health services. The lack of availability and affordability of oral health services not only results in aggravation of the disease but also enhances the cost of treatment and care. Adverse experience during childhood may lead to dental phobia, impacting on attitudes to oral health and self care as well as availing oral health care services for life. The high prevalence of dental caries has been brought under control in many developed countries during the last three decades. This was possible only through community or school based organized primary preventive programs, essentially, composed of generation of oral health awareness, through education of the public and school children at large.

It is important to initiate basic good oral health habits in childhood so that the appropriate dental norms are established and then maintained into adult life. The family is the first institution that influences child behavior and development, especially mothers, who are the primary model for developing behavior (Blinkhorn 1981). Parents are decision makers in matters of children health and healthcare; thus they play an important role in achieving the best oral health outcomes for their young children. Considering parents important role in the well being of young children, it is essential to explore their knowledge, attitude, and practise as it affects the dental care children receive at home and their access to professional dental services. Also, their assumptions and beliefs may be an important consideration in attempts made to improve oral health. The attitude and the knowledge of parents may enhance or impede the implementation and eventual success of a preventive program. Therefore, the purpose of this study is to characterize what is known about knowledge, attitude, and current practice's regarding the oral health care of children. The results of this study might help to evaluate the efficacy of public education programs in the future.³

AIMS AND OBJECTIVES:

Aim: The aim of this study is to assess the knowledge, attitude, and practise in parents regarding paediatric oral health care.

Objectives: Considering parents important role in the wellbeing of young children, it is essential to explore their,

- Knowledge
- Attitude
- Practise

regarding oral health care of the children, as it affects the dental care children, receive at home and their access to professional dental services.

MATERIALS AND METHODS:

A cross sectional questionnaire study was carried out in the Department of Paediatric & Preventive Dentistry at Pimpri Chinchwad in Pune district . A total number of 500 parents accompanying their child were provided with the questionnaire. Oral consent was taken from the parents, before including them as a sample in the study. This questionnaire was used for further evaluation in the study as a data source.

- The questionnaire included 36 questions, 12 each for knowledge, attitude and practise.
- Questionnaire development was done using content and construct validity by expert panel assessment.
- A pilot study was been conducted and changes in questionnaire were done accordingly before conducting the main study.

500 parents of 500 children were assisted to complete questionnaires enquiring about their oral health knowledge, attitudes and practise. This questionnaire was used for further evaluation in the study. The study was conducted between April 2011 and October 2011.

INCLUSION CRITERIA

- Parents visiting the Department of Paediatric and Preventive Dentistry for dental treatment of their child.
- The child visiting the dental clinic should be the parents first child.
- Child should not have had any previous dental experience.

EXCLUSION CRITERIA

- Children accompanied by caretaker/guardian.
- Children with special health care needs.
- Children with previous dental experience.

RESULTS:

Responses of each question were trichotomized to either positive, negative or don't know depending on the nature of the oral health domain assessed. These responses were parents oral health knowledge, related to eruption and shedding of deciduous and permanent teeth, preventive aids in pedodontics, diseased conditions such as dental decay, gums swelling and crowding, frequency of consumption of refined food by their children and oral health practise. The study was carried out to evaluate the knowledge, attitude and practise of parents towards oral health care of their children. In order to study this main domain i.e. oral health care it was divide in two sub domains i.e. preventive oral health (TABLE NO.1) and oral diseases (TABLE NO.2).

DISCUSSION:

"While the eyes may be the window to the soul, our mouth is a window to our body's health" ⁴ The state of your oral health can offer lots of clues about your overall health. Oral health may be defined as a standard of health of the oral and related tissues which enables an individual to eat, speak and socialize without active disease, discomfort or embarrassment and which contributes to general wellbeing. ⁵ It is the primary concern of oral health educators to impart a positive oral health knowledge and behavior in the society. This knowledge is usually derived from information and the information, when believed translates into an action. Behavior is the outcome when that action is sustained. However, only a weak relation exists between knowledge and behavior. ^{6,7} Nonetheless, there are reports that there is an association between increased knowledge and better oral health. ^{8,9} Evidence has showed that strong knowledge of oral health demonstrates better oral care practise (Smyth et al., 2007). ¹⁰ Similarly for those with more positive attitude towards oral health are influenced by better knowledge in taking care of their teeth. Studies have showed that appropriate oral health education can help to cultivate healthy oral health practise (Ab-Murat and Watt, 2006). ¹¹ The change to healthy attitude and practise can be occurred by giving adequate information, motivation and practise of the measures to the subjects (Smyth et al., 2007). In order to create such health education, the assessment of knowledge, attitude and practise is essential (Al-Omiri et al., 2006). ¹²

Since parents are responsible for health issues related with their children, their role in modeling their children towards practicing preventive oral health throughout life is crucial. ¹³ It is therefore expected that preventive oral health behaviors of parents of preschool children would influence their child behaviors in regards to adapting preventive oral health practise as they grow along. Thus, parents should be educated about oral health care for their children from inception through the existing setup. ¹⁴

The present study has shown that dental visits by children are mostly prompted by symptoms or problems with teeth and are often served by radical treatment, i.e. tooth extraction. Dental check-ups and preventive services were infrequent for children of all ages, despite the fact that significant proportions of the parents emphasized the importance of regular preventive visits to the dentist for control of dental caries. In this study we observed 91% parents had no knowledge about biannual dental visits, whereas after informing 98% parents showed a positive attitude towards regular dental visits. But none of the parents had ever taken their child for dental check up. This finding was in correlation with L.D.Rajab et al showing 11 % of parents visiting the dentist on regular basis, 17% visited a dentist irregularly and 72% only when necessary(i.e. in case of problems). This pattern was observed for children of all ages, however, the data indicate somewhat higher oral disease burden in young children. By and large, these findings were also in agreement with other studies carried out in the Middle East ie. Kuwait ^{16,17} or Saudi Arabia. ¹⁸

The primary teeth hold a place in the jaw for the permanent teeth, which move into place as the primary teeth shed. They are of major importance to child's appearance, chewing ability for digestion, sound nutrition, speech and eventual health of the permanent teeth. In this study parents response regarding knowledge on eruption of the milk teeth was found to be only 31%, whereas 85% did not know or had not noticed the milk teeth erupting *Available online at: https://jazindia.com* 633

at a particular time. 100% had never been to the dentist for examination of eruption pattern. These finding were in correlation with IIM Wu et al showing 53% of the caregivers knew that primary teeth play a important role in development of the permanent dentition. In this study 21% parents knew when permanent teeth erupted and milk teeth fell off, 72% claimed to observe the eruption pattern and 19% did not know or had not noticed the permanent teeth erupting at particular time. 100% had never consulted a dentist for examination of eruption pattern.

Studies have shown that there is definite connection between the mouth and body. What goes on in your mouth can affect the rest of your body and what goes on in the rest of your body can have an effect on your mouth as well. In this study we found that knowledge regarding the relation between oral health and general health was less, 71% did not know that there is any relation between oral health and general health. 94% had the attitude that maintaining good oral health can improve the general health of their child. Only 39% helped the child to keep their mouth clean.

In the present study parents attitudes towards the dental care of children was rather positive. 94% and 98% parents showed a positive knowledge and attitude towards oral health care measures. Whereas only 18% parents supervised their children during tooth brushing, this findings correlates with L.D.Rajab et al study in Jordon which stated that only 19% parents supervised their child's brushing, 15 however D.S.Rwakatema stated a higher percentage of 43.1% parents supervised their children tooth during brushing, 20 almost nine out of ten parents believed that maintaining good oral health can improve the general health of their child.

Only 4% of parents had knowledge about fluorides, 96% parents did not know the effect of fluorides on strengthening the teeth While 98% did not know or think that fluorides can help strengthen the teeth. None of the parents ever visited a dentist for fluoride application. These results were found in correlation with L.D.Rajab et al stating, only 4% parents showed positive knowledge towards use of fluorides as a specific mean for prevention of caries. In this study the majority of parents i.e. 88% showed a positive response towards knowledge on habit of rinsing after meal, 94% had the attitude whereas only 21% showed a positive response in practicing the habit of rinsing mouth after meal.

The level of dental knowledge was high as the majority of parents stated that poor oral hygiene and excessive consumption of sweets/sugar were the principle causative factors in dental caries. In general, the survey documents a discrepancy between knowledge and practices in dental care. This study showed that 95% and 97% parents had positive knowledge and attitude towards relation between dental decay and frequency of consumption of sticky and refined food, whereas 64% parents were not aware of their child's frequency of consuming sticky and refined food. In contrast we found inspite of low level of dental knowledge and attitude parents showed negative practise regarding consumption of fizzy drinks only 18% parents would allow their child to consume fizzy drinks whereas 69% parents showed negative knowledge regarding the ill effects of fizzy drinks, where as 83% were not aware.

It has been suggested that early childhood caries should be assumed as an infectious disease associated with behavioral and social factors, with public oriented prevention actions being recommended⁵² whereas only 12% parents showed positive knowledge regarding presence of dental decay in their childs mouth, although the parents attitude towards presence of dental decay in child's mouth was rather positive 89%, whereas none of the parents showed practise of consulting a dentist regarding dental decay.

Guidance of eruption and development of the primary, mixed, and permanent dentitions is an integral component of comprehensive oral health care for all pediatric dental patients. Such guidance should contribute to the development of a permanent dentition that is in a stable, functional, and esthetically acceptable occlusion. Early diagnosis and successful treatment of developing malocclusions can have both short term and long-term benefits while achieving the goals of occlusal harmony and function and dentofacial esthetics. ²¹⁻²⁴ In this study we found that 76% parents were not aware about presence of crowding whereas 89% showed positive attitude of consulting a dentist. 74% of parents had a positive practise towards correction of crowding. Children are subject to several periodontal diseases. Although there is a much lower prevalence of destructive periodontal diseases in children than in adults, children can develop severe forms of periodontitis. ²⁵ Knowledge and practise towards gingival conditions and treatment was 62% and 63% respectively, where as 97% parents knew gingival swelling and bleeding gums required attention.

Preventive oral health behaviour was gauged by sevens questions and oral disease was gauged by five questions and the response given by parents were noted. In this study we found that majority of the parents showed better knowledge and very good attitude but they did not practise preventive oral health for their children whereas parents showed less knowledge for oral disease and better attitude while very less practise. The observations (DIAGRAM NO.1&2) from this study showed that parents have approximately similar percentage of positive knowledge i.e., 38.4% and 38.8% towards preventive oral health and oral disease respectively. In addition, the positive attitude was also found to be 77.5% and 77.8% towards preventive oral health and oral disease *Available online at: https://jazindia.com*

respectively. Whereas only 11.41% showed a positive attitude towards practicing the preventive oral health, in contrast with oral disease showing 35.6% parents positive practise.

This result shows that there is a very low utilization of dental services in spite of positive attitude towards dental treatments.

CONCLUSION:

It can be concluded that although most of the parents in this sample had positive attitude on the need to conserve natural teeth for their children, they lacked adequate knowledge regarding preventive oral health and oral disease. It is therefore important that programs involving preventive oral health activities in this population be strengthened. In Pimpri Chinchwad the establishment of systematic oral health care programs for children is needed and local health bodies may serve as a platform for promotion of oral health habits in children and parents. This study may serve as a baseline for the evaluation of demonstration projects on comprehensive oral health care in Pimpri Chinchwad.

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Table No. 1: Table showing distribution of parents response regarding preventive oral health

Questions		Positive (%)	Negative (%)	Don't Know (%)
Primary tooth eruption pattern	Knowledge	31	49	20
	Attitude	3	12	85
	Practise	0	100	0
Permanent tooth eruption pattern	Knowledge	21	62	17
	Attitude	72	19	9
	Practise	0	100	0
Relation between oral health and	Knowledge	22	7	71
general health	Attitude	94	0	6
	Practise	39	61	0
Teeth cleaning aids	Knowledge	94	0	6
	Attitude	98	2	0
	Practise	18	82	0
Fluorides in strengthening the teeth	Knowledge	4	96	0
	Attitude	2	0	98
	Practise	0	100	0
Habit of rinsing after meal	Knowledge	88	9	3
	Attitude	94	0	6
	Practise	21	72	7
Regular dental visit	Knowledge	4	91	5
	Attitude	98	0	2
	Practise	0	100	0

Table No. 2: Table showing distribution of parents response regarding oral disease

Questions	•	Positive (%)	Negative (%)	Don't Know (%)
Dental decay in oral cavity	Knowledge	12	20	68
	Attitude	89	0	11
	Practise	0	100	0
Gingival condition	Knowledge	62	10	28
	Attitude	97	0	3
	Practise	63	13	24
Crowding in dentition	Knowledge	15	76	9
	Attitude	89	2	9
	Practise	74	5	21
Consumption, frequency of sticky	Knowledge	95	0	5
food and dental decay	Attitude	97	3	0
	Practise	23	13	64
Fizzy drink	Knowledge	11	69	20
	Attitude	17	0	83
	Practise	18	74	8

Diagram no.1: Bar diagram showing the distribution of parents combine responses for KAP on preventive oral health.

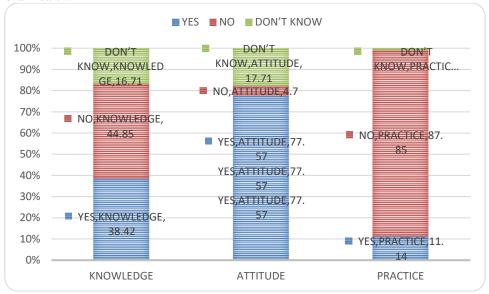


Diagram no.2: Bar diagram showing the distribution of parents combine responses for KAP on oral disease.

