

Phenomenology of Students' Perception and Behavior on Oral and Tooth Health

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Abstract

Background & objective: Tooth decay is the most widespread and prevalent man disease and there are only limited individuals who never suffer from it in their life time. Oral - tooth health refers to all oral health & performance aspects, particularly gum & teeth. The present study aimed to analyze student's perception and behavior regarding oral health in Jooy-bar town, in Iran.

Methodology: This study is a qualitative method based analyzing the conventional content of 6 schools, at 3 levels of primary, secondary and high school in Jooy-bar town in 2010. In this qualitative study, given the importance of deeply examining people's experiences, data was collected through semi-structured interviews. Data was analyzed using conventional content analysis method.

Findings: The extracted themes were classified into two major clusters, and eight sub-clusters related to perception and behavior. The Perception parts included: the ways that led to getting decayed tooth, the styles to prevent it & the role of diet in oral & tooth health, some definition of tooth decay, milk & permanent tooth; whereas the behavior part covers necessary measures in taking care of healthy teeth & those in facing with decayed tooth.

Conclusions: The students do not possess sufficient knowledge about the importance of tooth & month health and it seems that just knowing the ways to prevent the factors behind tooth decay cannot influence people's behavior. Thus, to plan regular training programs related to oral and tooth health in schools is inevitable and is strongly required.

Key words: phenomenology, perception, behavior, students.

Introduction

Health is the society development pivot and society health is affected by its being developed.¹ Oral & tooth health is known as one of the 11 twenty- first century mottos and it used to be considered of PHC elements. DMFT is a simple, fast & reliable index to determine oral and tooth health.² Decayed tooth is the most prevalent and chronic man disease and over 99% human beings suffer from this malady, there are few ones who never get afflicted by in their life.² Decayed tooth has remained a major nuisance in dentistry and it needs to be taken into account in daily treatments.⁴ International statistics and available evidence from ancient times (5000 years ago) indicate that tooth decay and wear level was low & rare at that time and over time, tooth decay prevalence has got an upward movement so that the mentioned figure has reached to 2 out of 10 worn teeth from 100, 4000 years ago. This growing trend has kept on and reached to the fixed level of 24 out of 100 teeth. In Iran based on the existing statistics, just among 7 million children under 12 years old around 1.5 million ones have filled tooth. Most experts believe that teenagers' problems and issues are more behavioral.⁴ Decayed tooth has expanded because of change & variations in man life & change in diet and civilization progress and for this, a group of researchers call it "civilization disease".⁵ Oral and tooth health refers to all mouth health and performance aspects, particularly gum & teeth. Not observing behaviors related to oral and tooth and gum in eating, voice quality and speaking depends on the importance of correct teeth caring- preventing from oral infection, gum inflammation and breathing difficulties.

In addition to healthy teeth role in nutrition and preventing malnutrition, some chronic maladies like diabetes, a positive mental image of self and subsequently mental health have been proved.⁴ Oral and tooth health care is taken as one of the significant branches of general health. Paying attention to this issue is of WHO programs to prevent chronic diseases & promote health. The implementation of this program is done as a priority of schools health promotion; besides the general oral health goals until 2020 to spread quality, mouth health systems are specialized.⁶ Consumption pattern of food stuff and people's culture and knowledge level associated with oral and tooth health observance has a direct relationship with high statistics of tooth decay & some other oral & tooth complications in the country. Thus with respect to prevention issue aligned with incorporating health and therapeutic activities in primary health care network system, oral & tooth health. Incorporation plan on primary health care's targeting qualitative and quantitative improvement of mouth & tooth primary health services providing condition has been put and in order to improve or increase oral health, an agreement was signed between health & treatment & medical training department & educational department.⁷ Scientific experience in study field has proved that there are yet many cultural obstacles for cultural studies, especially people's private life dimensions. Stating the cause by people who use this method can be effective in recognizing the issue & understanding it, in such a condition, using qualitative studies methods will be very useful.⁸ Phenomenology is a qualitative method, that study people's experiences, perceptions and feelings.⁹ This research aims to study students' perception & behavior phenomenologically and about oral health in Jooy-bar in 2010. Studying on students can disclose oral & tooth health experiences from the very same this group's view. Regarding understanding these experiences is highly significant for health group. It's hoped that information gained from this research is utilized along with oral & tooth health projects efficiency.

Methodology

This is a qualitative study of conventional content analysis type. Qualitative study provides a systematic and objective approach to describe individuals' experiences and in fact, it gives meaning to experiences in qualitative studies, generality of human phenomena is focused. Therefore, it's considered as the most appropriate method to study human experiences such as compatibility, caring & etc. Content analysis is a specialized method to process scientific data. The research aims to provide knowledge, modern insight, and an image of the truth and a guide for action and a subjective interpretation of textual information content through systematic classification. In this qualitative study regarding individuals' experiences deep examination importance, goal-based sampling at 3 levels of primary, secondary and high school is as the following. The first samples were out of every level students & sampling continued until data got to saturation so that the new information wasn't derived from the existing interviews and a new class or subclass was not added to the data.¹² The criteria to enter the study included residing Jooy-bar town having at least one decayed tooth, being willing to participate in the study and presenting experiences. Data collected through semi-structured interviews. First general questions were posed to start & interview trend was directed based on the samples answers and the participants were asked to give examples or explain the reasons behind their answers for describing the proposed phenomenon. The time period for interviews ranged from 20 to 50 minutes. Data was analyzed by using conventional content analysis. Interviews were recorded digitally and then they were typed, reviewed, coded word by word and analyzed immediately. In fact, data analysis was done simultaneously and continuously along collecting information. To do initial coding, the participants own words and indicative codes (researchers' perceptions out of the statements) were used. Then subsequent interviews were conducted. Meaning units were extracted from the participants' statements in form of primary codes or open codes from the interviews. Codes were read out several times. The codes based on similarity or proportion implying the same issues were placed in one class or category, classification was done by applying separate codes and incorporating similar codes. This way, second level (axial) coding or data classification was made. In the next stage, classes were compared with each other and the ones with similar properties were combined and formed a more extensive class and the themes were disclosed.

Findings

3 age groups of students participating in this study are 11, 13 & 16 years old. 60 students were interviewed individually. Data analysis showed that participant' experiences about oral (oral & tooth) health can be divided into two major parts: **a)** perception **b)** behavior.

Part one is on questions measuring people's beliefs and perceptions and part two refers to questions asking their behaviors.

A: perceptions

1. ways to get decayed tooth in answering to "what factors cause tooth decay?" based on their importance lack of brushing, irregularity about it, not caring teeth, eating sugar & sweet substances or in some cases

mouth acidity and mouth microbes actions & not referring to dentist in order to do periodical examination and not using tooth floss were mentioned.

Extracted themes include: "because since childhood, I haven't brushed and taken too much nuts, my teeth become worm-eaten (17 year old high school girl) "since I haven't cared my teeth very well and sometimes I've broken pistachio & hazel nut with my teeth, my teeth got decayed & I drink very cold drink sometimes. (15- year- first high- school girl).

"Not brushing at night makes food acidity in oral & teeth decayed". (11- year- old- first- secondary- school boy).

"In addition to the above mentioned factors, a slight percent of tooth decay is viewed as related to tooth kind and quality and they said tooth kind is the thing inherited from parents" (17- year- old- third- high school boy).

2. Tooth decay prevention methods

In this case, the highest factor was mentioned as brushing, eating food useful for teeth like (yogurt, milk and some apple), periodic reference to dentist for examination, and in 4 cases using mouth wash and in several cases using tooth floss).

"If we brush and use tooth floss and have milk, fish & vitamin- contained food which is healthy for teeth, we less suffer from tooth decay". (16- year- old- second- level- high school girl).

"If we brush on time at night at sleeping time and take less confections at that time" (10- year- old- 5th level-primary school student).

3. Some definition of tooth decay

Overall, they thought that decayed tooth has lost its efficiency. The participants' perceptions about what is called decayed tooth? Were stated as the following: "Decayed tooth gets brown- colored, worm- eaten & worn & it's no more useful, tooth gets thin & breaks " (13- year- old boy, 3rd secondary- level student).

4. Diet role on mouth & tooth health participants have mentioned some beneficial & harmful foods for mouth health in this case. Harmful foods in all cases have been stated sugar substances, confections, and sometimes junk foods like chewing gum, chips, corn puffs, beverage and beneficial ones as milk, yogurt, and calcareous substances. In 5 cases, apple was mentioned.

5. When people were asked about "milk & permanent tooth caring", they expressed their ideas this way: milk tooth is a short- lived one existing in man mouth for a while but a permanent tooth stays there forever. Parts of themes:

"Milk tooth means a tooth which exists until 7 years & falls one by one. A permanent one grows at age 7 and if we take it out it doesn't grow any more. Milk tooth needs care because if it decays, it will wear the permanent one (11- year- old boy, first grade secondary student).

"Permanent tooth should be cared more because we have it from age 7 throughout life but the milk one remains until 7, then it gets loose and falls". (10- year- old, grade- 5- primary level student).

"In my mind, permanent tooth is more important since my own milk tooth got worn & decayed, after growing my permanent tooth, there is no sign of that decay so milk tooth is not that important and because no other permanent tooth grows, it needs a lot of care" (17- year old boy, third- grade high school student).

B. behavior

1. Measures to care healthy teeth

Participants in this field have mentioned different preventive actions (brushing), brushing style, brushing time's number, using tooth floss and its using style and in some cases mouth wash and appropriate diet). In this case, only a few have pointed to consumed tooth paste kind. The majorities haven't used tooth floss and didn't know its proper usage.

"I change my tooth brush every two month because its wires get damaged. I brush upward & down word & with transverse movement, it shouldn't be done with too much force. Tooth floss is placed within teeth to remove food left there. I sometimes use it". (17- year- old boy, third- grade high school student).

"I brush one a week. First I brush the back part of my teeth, then within them & the front part from left to right, I don't apply tooth floss since once my gum started bleeding after using it. I don't know how to use it, either" (17- year- old, third- high school student). "I change my brush every 6 month. First I brush the left side then the right one, from up to down, inside the mouth then over my teeth and tongue of course, we need to use tooth paste I don't apply tooth floss, I take tooth pick instead" (11- year first- secondary- school girl).

"As we eat 3 meals daily, we have to brush 3 times a day; however, I myself don't brush even once a week because I believe that brushing makes the teeth accustomed to and not brushing regularly wears them and sometimes I use saline. Once a year, I change my brush, but I think we should change it every two month". (17- year- old boy in third- grade high- School).

"At the end of night before sleep, I brush for 3 or 4 minutes so that all my teeth & their surface are brushed. Every 4 or 5 month, my mom changes my tooth brush, of course, depending on the brush quality" (10- year boy from grade- 5- primary level).

Discussion & Conclusion

The study results indicated that individuals show various behaviors when taking care of their healthy teeth & facing worn teeth. Of such behaviors include brushing & the importance of brushing times, using floss, and periodic reference to a dentist & in some cases proper diet & using mouth wash have been pointed

out. Participants' perceptions about mouth & tooth health include: decay preventive methods, ways to suffer from decayed tooth, diet role in mouth & tooth health & decayed teeth. Some individuals had wrong perception about decayed tooth. These perceptions are: its worm- eaten tooth that most students from primary & secondary levels have perceptions, it seems this perception is as a result of wrong beliefs & in correct information & it can be a suitable guide for planning educational program on tooth decay.

Based on the research results, the majority of individuals know decay preventive methods and its causes correctly & regarding that lack of consuming sweet foods has a remarkable role in mouth & tooth health & they too have mentioned this case but they do ignore it & they mention the reason their own ignorance because the individuals haven't perceived the necessary sensitivity of the issue. The study findings have suggested that tooth preventive and caring styles in students participating in the interview based on user's frequency are as the following: brushing, not consuming sweet stuff, regular reference to dentist, & using tooth floss & in a few cases applying mouth wash. In a study in Ahvaz evaluating secondary level students' oral & tooth health care, it has been revealed that the study age group mouth health condition is very low.³

According to the project findings, it's inference that the overall oral & tooth caring methods applied by participants are not optimal. Out of mouth & tooth caring methods, the majority of the individuals use one or two ones. Also in a research done in Zanjan in 2005 by Amini et al., titled analyzing mouth & tooth caring styles among high- school students revealed that the common way of mouth & tooth caring among individuals is brushing.⁴ When individuals were asked about the number of times, it has been shown that girls use brush more than boys & using mouth wash is only pointed out by a few students. About applying tooth floss too, a few numbers were mentioned, while the effect of using tooth floss (at least once a day) has been proved in preventing tooth decay & creating gingivitis.⁴ Perhaps the reason behind not applying tooth floss can be attributed to lack of necessary & sufficient trainings about the importance of utilizing this method by mass media. In fact, the significant impact of knowledge & attitude on mouth & tooth caring behaviors has been documented in previous studies.⁴ In addition, the results of the research by Mohebbi et al., called mouth and tooth health condition of Gonabad- based third grade elementary school students indicated that despite relatively favorable percent of using brush, the level of applying tooth floss was very low.² It seems in this regard, the culture of using tooth floss hasn't yet penetrated Iranian families & this requires extensive trainings and their accessibility in society about oral & tooth health. In the interview, it was asked about the presence or absence of decayed tooth that most of the participants have experienced decayed tooth & referring to dentist.

From a general view, elementary level students have more comprehensive information than secondary and high school ones. And maybe it's due to insufficient educational programs about mouth & tooth health in higher levels. In a study by Sharafizade et al., under the title of "evaluating mouth & tooth health of secondary level students in Ahvaz", it has been demonstrated that observing health care was lower in girls & prevalence characterizing decayed tooth was higher.³ In the present study, observing health care in girls is higher than in boys. According to studies conducted in countries like China & Kuwait, girls perform better & higher than boys in all fields related to oral & tooth health care.⁴ Individuals don't have sufficient knowledge about the importance of oral & tooth health and it seems that only knowing the preventive ways of tooth decay creating causes can't influence people's behavior because having knowledge about and clarifying the significance of the issue is highly important for people in society. Therefore, accurate and timely planning in order to educate this age group continually by educational and health & therapeutic organizations is inevitable.

Acknowledgements: This is to appreciate student research committee & schools staff & students who cooperated to make this study a success.

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