Original article

## **Orthodontic Treatment Needs in Children 12 Years Old**

## Ahmad Jafari<sup>1</sup>, Yahya Baradaran Nakhjavani<sup>2</sup>, Meysam Noori<sup>3</sup>, Abbas Rahimi Foroushani<sup>4</sup>, <u>Javad</u> Chalipa<sup>5</sup>\*

- 1- Associate Professor, Research Center for Caries Prevention, Dentistry Research Institute, Tehran University of Medical Sciences, Tehran, Iran; Department of Community Oral Health, Schoolof Dentistry, Tehran University of Medical Sciences, Tehran, Iran
- 2- Associate Professor, Department of Pediatric Dentistry, School of Dentistry, Tehran University of Medical Sciences, Tehran, Iran
- 3- Dental Student, Department of Community Oral Health, School of Dentistry, Tehran University of Medical Sciences, Tehran, Iran
- 4- Professor, Department of Biostatistics, School of Health, Tehran University of Medical Sciences, Tehran, Iran
- 5- Assistant Professor, Department of Orthodontics, School of Dentistry, Tehran University of Medical Sciences, Tehran, Iran
- \*- Corresponding Author: jchalipa@tums.ac.ir

## **Abstract**

**Background and aims:** Index of Orthodontic Treatment Need (IOTN) is a known index for measuring the need for treatment in the community. It uses in planning, sharing of resources and improve standards of treatment. The aim of this study was to evaluate indicators of need for orthodontic treatment is in primary school children.

**Materials and Methods:** In this cross-sectional study by convenience sampling, 400 students between the ages of 12 years old with no history of orthodontic treatment were selected. IOTN index was determined by the method recommended by the World Health Organization and also completed a questionnaire that included demographic questionnaires. Simple and Multiple Regression logistic tests of test data to be used Complex Sample Analyze menu. By using of Frequency, Menu Descriptive Statistics were calculated frequency of each Grade of IOTN.

**Results**: In this study, a total of 373 samples in 7 boys and 9 girls' school were studied. Among them 154 were boys (41.3%) and 219 females (58.7%). The results showed that 307 patients (82.43%) needed the orthodontic treatment. Statistical analysis showed that gender is not a factor influencing the IOTN.

**Conclusions**: Girls had more need of orthodontic treatment, unlike other studies that have been done in this case, although it was not significant.

Key words: Orthodontic treatment needs, oral health, students, Saveh