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THE INFLUENCE OF CROWDED TEETH ON THE DEVELOPMENT OF GUM RECESSION

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Abstract: In recent years, in the Republic of Uzbekistan, the main tasks are to study gingival recession, the mechanism of the influence of crowding of teeth on the development of gingival recession. At present, scientific research is being carried out in foreign countries, the study of gum recession after the elimination of anomalies in the position of the teeth by orthodontic treatment. The prevalence of crowded position of the teeth in the anterior dentition, among other dentoalveolar anomalies, according to WR Proffit (2019) is 48% of all examined.

Studies by a number of authors (Khoroshilkina F.Ya., et al. 2014; Arsenina O.I., 2016; Persin L.S., 2019) showed that the prevalence of crowded position of the teeth is at the level of 33.7% of cases. It is also noted that the incidence of occlusion anomalies in combination with the tight position of the teeth in the anterior region reaches 59-73% (Khoroshilkina F.Ya., 2016). . The role of third molars in the formation of the crowded position of the teeth continues to be clarified (Pankratova N.V. et al. 2015, 2016; Gordina E.S., 2017).

The article presents the results of a study of dental crowding in children and the impact on the development of gum recession among 47 patients.

Key words: Crowding of teeth, gum recession.

Relevance: In the modern world, the study of crowded teeth is one of the main tasks for studying the aesthetics of a smile, since it affects the psychological state of a person and leads to a decrease in personal self-esteem. The prevalence of crowded teeth ranges from 27.8% to 33.7% of all anomalies of the dental system (S.S. Murtazaev 2006). Externally, the anomaly considered has several variants of incorrect position due to a lack of space in the dental arch. The dental arch is a line drawn through the vestibular edges of the occlusal surfaces and cutting edges of crowns. When an anomaly occurs in the form of crowded teeth, the longitudinal length of the dental arch decreases (Persin L.S., 2016).

Some researchers note that as we grow older, the distribution of this anomaly between the lower and upper jaw changes. During the period of changing teeth in childhood, the crowded position of teeth on the upper jaw occurs in 21.75±3.05% of cases, and on the lower jaw – in 51.06±3.14% of cases. In people in the age range of 18-25 years, crowded teeth are observed in 57.35±3.82% of cases in the upper jaw and in 38.78±3.88% of cases in the lower jaw (Sheveleva O.P., 2015). The prevalence of recession ranges from 9.7% in children according to P. A. Leus and L. A. Kazeko ; [5, 6]. The authors note that the prevalence and intensity of recession increase with age.

Purpose of the study : To study the effect of crowded teeth on the condition of the gums and to determine the incidence of gum recession in children.

Material and method of research.

The material for the study was dental examinations of 47 children aged 6 to 12 years attending school educational institution No. 71 in Tashkent . Of these, 21 (44.6%) were girls and 26

(55.4%) boys. All those examined were divided into age groups, characterizing the period of occlusion formation:

Table 1. Distribution of patients with crowded teeth into groups by gender and age.

Age	I – group		II- group		Total
6-9	M D		M D		
	5 (10.6%)	8 (17.0%)	4 (8.5 %)	6 (12.7%)	19 (40.4%)
9-12	7 (14.8%)	6 (12.7%)	7 (14.8 %)	5 (10.6%)	28 (59.5%)

Diagram.1. Distribution of patients by bad habits.

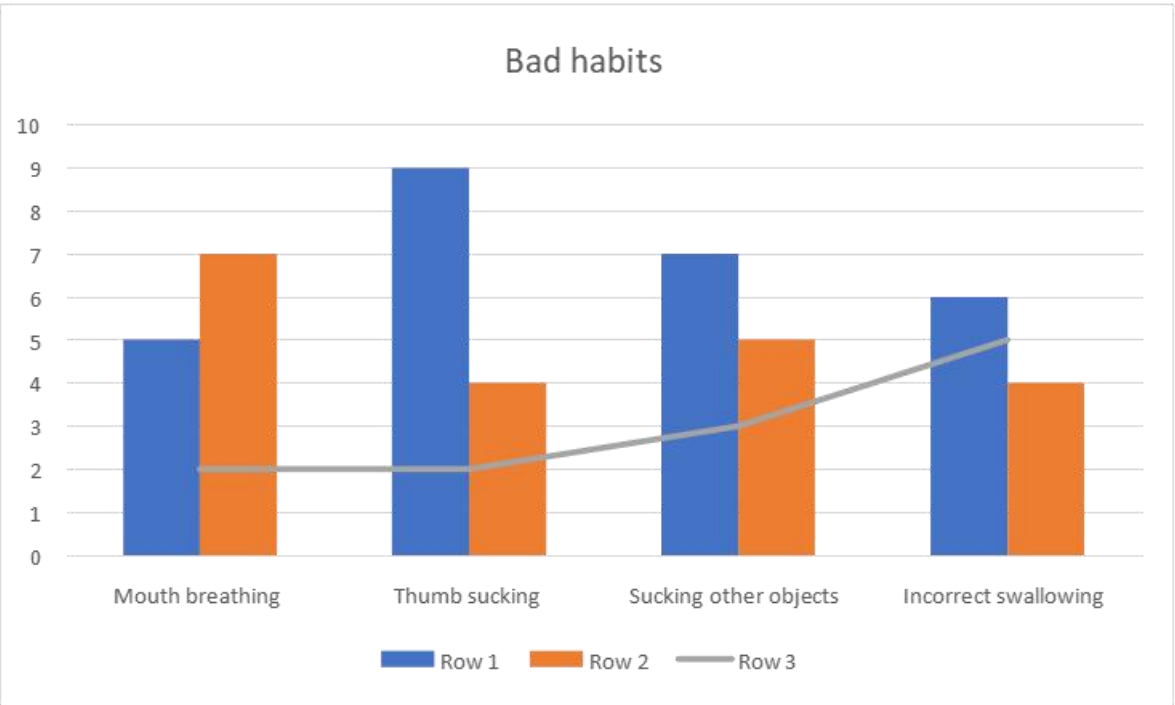

Fig.1. OPTG of a patient with crowded teeth

Fig.2. photo protocol of the patient's oral cavity

Result and discussions

Based on the results of a study of 47 patients using clinical and radiological studies, dental dullness was found to be the main factor in the development of gum recession. During clinical examinations and interviews with patients , the presence of dental anomalies in their close relatives was revealed: 21 patients (53%). Bad habits include sucking objects, lips, tongue,

fingers. The patient's breathing pattern was determined. With the oral type of breathing, we can say that the balance of pressure from the soft tissues of the oral cavity exerted on the teeth leads to a violation of the position of the teeth . This will help determine the cause of crowded teeth.

Of the 47 patients, 18 had bad habits in childhood (38.2%). Among them: 11 cases of mouth breathing (23.4%); 7 – finger sucking (14.8 % of cases); 7 cases of sucking other objects (1 4.8 %); 5 cases of improper swallowing (1 0.6 %) . During the study of dental crowding, we divided patients into two groups by age and gender to determine at what age dental crowding often occurs and how it affects the development of gum recession.The sequence and time of eruption of primary teeth and permanent teeth were within normal limits.

Conclusions

Crowding of incisors due to lack of space in the dentition is one of the most common orthodontic anomalies, forcing patients to seek treatment . The main complaints are crowding of teeth and gum recession, which occur in different forms, which affects burning, bad breath, patient discomfort and the aesthetics of the smile .

With the help of clinical and radiological studies, a statistical analysis was conducted of the effect of crowding of teeth on gum recession and it was revealed that this anomaly is based on: mismatch between the sizes of teeth and jaws, disturbances in myodynamic balance due to impaired nasal breathing and the presence of bad habits. The main requirements for The treatment of this group of children is the joint work of an orthodontist with related specialists in particular (dentist, periodontist and ENT specialist).

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