

## Mixed dentition sport related dental injuries

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Aim. Sporting activities present a high risk of dental injury in children and adolescents, the mixed dentition period presenting the highest prevalence of dental injuries. The epidemiological data and the knowledge of coaches and parents on sport related trauma management are almost uninvestigated in Romania. In this respect, the aim of the study was to gather epidemiological data about dental trauma in mixed dentition children who practice sport activities.

Methods. 348 children participating in organized sports activities were examined in the period January-July 2011 during the annual clinical evaluation at the Sportsmen Ambulatory in Bucharest. Consent for the examination was obtained from the coaches or parents. The traumatic dental injuries were assessed according to IADT's criteria. Data was statistically analized using SPSS 10 for Windows (SPSS Inc., Chicago, USA).



Sport	Gymnastics	Tennis	Tae kwon do	Rugby	Football	Judo	Karate	Dance sport	Table tennis	Basket	Fencing
										ball	
% of sample	12.06	0.86	2.58	8.90	43.96	12.35	4.59	0.57	0.86	7.75	5.45

**Results**. The children were distributed in 11 sports, football being the most practiced (44%). The traumatized children were found in 6 types of sports. The prevalence of dental trauma was 14.36%. The male/female ratio was 6.14/1. A ratio of 1.3 affected teeth per children was found. The most common type of dental injury was the enamel fracture (66.15%). The maxillary central incisors were found to be the most affected. 74% of traumas were produced during organized sports activities.



**Conclusions.** The loss or damage of teeth structures involves, beside aesthetic problems, high financial expenses immediately or in time. Although crown fractures without pulpal involvement are most frequent, it is important to remember that, in mixed dentition period, young permanent incisors have open apices. Even in minor traumas, the absence of treatment can lead to further complications. The high prevalence of sports related dental trauma advocates the use of oral protectors as efficient means in preventing



these events.