338. CLINICAL EVALUATION OF DENTAL STATUS REGARDING SIX-YEAR MOLARS AT CHILDREN AGED BETWEEN 8 AND 11 YEARS OLD

Authors: Paul-Ovidiu Bologa, Dorina-Petronela Tocariuc

Scientific adviser: Lecturer Dr. Tohati Adrian

University of Medicine and Pharmacy of Targu Mures, Romania

Introduction. The first permanent molar, also named "the six-year molar", is well-known for its importance in the oral cavity because it is key factor in occlusion. It bears the maximum occlusal load, it maintains arch perimeter, has maximum surface area, provides best anchorage and it is most commonly decayed.

Aim of the study. The purpose of this study was to evaluate and analyze the dental status of six-year molars at children aged 8 to 11 years.

Materials and methods. An analytical study was conducted on 54 children aged between 8 to 11 years old from a primary school in Ludus, Mures county, Romania. We performed the clinical examination and completed a dental research chart. The participation in the study was voluntary and based on parenal informed consent. For the clinical examination, we used disposable gloves and sterile, single-use dental instruments. After the examination, questionnaires were applied to each participant.

Results. Of the children participating in our study, 46% were 10 years old and 56% were girls. 48% of the permanent molars were clear and complete, 21% were decayed, 14% were filled, 8% were sealed, 7% were radicular rests, and only 1% were missing. Regarding oral hygiene, the answers from the questionnaire revealed that 61% of the children brushed their teeth every day, 44% once and twice a day, 74% in the morning. 83% visit the dentist only if needed and 43% did not remember when the last dental visit was.

Conclusions. The dental status of six-year molars is closely correlated with oral hygiene and dental check-ups. Having the first permanent molars sealed and treated in time is necessary, especially at young age.

Key words: dental status, six-year molars, children

339. IMMUNOGLOBULIN LEVEL IN ORAL FLUID AND BLOOD SERUM IN CARIORECEPTIVE CHILDREN

Authors: <u>Svetlana Plamadeala</u>, Olga Balteanu, Ecaterina Bocancea, Elena Hristea, Svetlana Grec

Scientific adviser: Spinei Aurelia, MD.PhD, Associate professor, Department of Maxillo-Facial Surgery, Pedodontics and Orthodontics

Nicolae Testemitanu State University of Medicine and Pharmacy of the Republic of Moldova

Introduction. Dental caries are the most common affection of the human population, at the same time, the mechanism by which some people are carioreceptive, and others remain free of caries, is of interest to researchers in the field.

Aim of the study. asseassing the level of immunoglobulins in oral fluid and blood serum and highlighting their influence on the susceptibility of children to dental caries.

Materials and methods. In the case-control study 162 children, aged between 7 and 18 years have been examinated. In the research group (L1) were included 81 children with severe carious activity, and the control group (L0) was made up of 81 caries-free children. Also, were evaluated dental caries prevalence indexes (IP) and indices of caries experience (dft, dfs, DMFT and DMFS). Was identified acidogenic bacterial plaque, concentration of the Streptococcus mutans in saliva, dental biofilm and in salivary pH with the use of standart kits GC. Complex assessment of caries risk was done using Software Cariogram. Immunoglobulin level in oral fluid (OF) and

blood serum was determined by the immunoenzymatic method of analysis (Vectior-Best, Russia). The study was conducted in accordance with ethical requirements, with the written consent of the children's parents or legal representatives. Analysis of statistical data, using parametric and nonparametric tests, was done using Microsoft® Excel® 2013 programs with the help of the function and of these programs.

Results. In children in group L1 there was a significant decrease in the level serum IgA, IgG, IgM and OF sIgA, IgA, IgG, being in reverse with the number of strains Streptococcus mutans in saliva, dental biofilm and indices of caries experience.

Conclusions. significant decrease in immunoglobulin levels in oral fluid and blood serum found in carioreceptive children is one of the important factors of carious risk and an unfavorable indicator of aggressive evolution of dental caries, which must be considered when planning individualized preventive measures.

Key words: immunoglobulins, dental caries, carious risk

340. MALOCLUSSION PATTERNS IN PHYSICALLY, AUDITORY AND VISUALLY HANDICAPPED PATIENTS IN REPUBLIC OF MOLDOVA

Authors: Cristina Postaru, Svetlana Melnic, Olga Cheptanaru

Scientific adviser: Diana Uncuța, MD, PhD, Associate professor, Department of Dental propedeutics *Pavel Godoroja*

Nicolae Testemitanu State University of Medicine and Pharmacy of the Republic of Moldova

Introduction. The main problems of orthodontics from Republic of Moldova is to determine either the genetics or environmental factors influence the development of malocclusions

Aim of the study. The purpose of the study is to determine the prevalence of maloclusion in children with special needs and relation with neurological disorders in the process of social behavoir of children.

Materials and methods. It was examined 2057 children with special needs (physically, visually, auditory, others) aged between 7-15 from different orphaned school from Republic of Moldova. Clinical examination of children included: disponsable dental mirror, chemical pencil, wooden spatula, calipser, portable light. Control group were selected 1345 children from normal school who did not have any neurological disorders and treatment of maloclusions.

Results. In sagital plan maloclusion was associated with 69 (9,75%) cases with auditory handicapped, 74(14,8%) children with visually handicapped, but in 33(18,33%) - with physically handicapped children. Mostly, malocclusion have been detected in physically handicapped children in vertical and transversal plan. Malocclusion varied in boys between 58,8% and 63,89% and in girls between 36,11% and 41,21%. The most affected age is 12-15 in visually handicapped children, 9-12 – auditory handicapped children and 7-9 age- in physically handicapped children.

Conclusions. Auditory, visually and physically disorders can be considered as key predictors and risk factors in appearance of malocclusion in children. Children with special needs may be treated according to the age and the nature of maloclusions.

Key words: malocclusion, children, special needs, orthodontic treatment

341. NEW METHODS OF RESTORING INTERDENTAL CONTACTS

Author: Radu Petco

Scientific adviser: Eni Lidia, MD, PhD, Associate professor, Department of odontology, periodontology and pathology

Nicolae Testemitanu State University of Medicine and Pharmacy of the Republic of Moldova