Dental Caries in Relation to Nutritional Status among a Group of Children

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ABSTRACT

Dental caries and malnutrition appear to be serious public health concerns among school-aged children. This study was conducted to examine the influence status of nutritional on oral variables such as gingival health, oral hygiene, and caries in relation to age and gender on randomly selected 512 children (316 male and 196 female) aged 3-16 years old, who presented to the preventive and pedodontics department of a dental hospital in Baghdad. The plaque and gingival indices were employed to evaluate dental plaque and gingival health condition with a diagnose of dental caries. The anthropometric measurement (height and weight) was employed to measure the nutritional status and the body mass index (BMI) of the children. The results showed that entire children were caries-active. Highest dmfs values obtained for age group of 6-11 (9.71±056.), while highest DMFS was found in children aged 12 and above (12.36±0.89) with highly significant differences in dmfs/ DMFS among all age groups. Differences in DMFS in relation to BMI was highly significant with a highest value (8.45±0.64) obtained in underweight group. The findings indicated that children aged 12 and older having the highest PII. Children with normal BMI had a greater PII mean than overweight and underweight children, with no significant variations between the two groups. It was concluded that higher DMFS-based caries severity in underweight children was measured, indicating the need of preventive and public programs among this group to prevent the development of dental caries.

Key Words: Body mass index, Dental caries, Oral health status

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