Assessment of Fine Motor Skills and Tooth Brushing Skills in 5-6 Year Olds in Tehran

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Abstract

Background and Aim: Oral hygiene instructions appear to be ineffective in children who lack adequate motor skills for efficient tooth brushing. This will result in development of caries and periodontal disease. This study sought to assess the tooth brushing skills and the role of related factors in 5-6 year old children in Tehran, Iran.

Materials and Methods: This cross-sectional study was conducted on 680 five and six year-old children including 240 girls and 440 boys. The psychomotor skills of the hands and feet were tested in children and their tooth brushing skill was evaluated using 7 criteria. Other related factors were also assessed. Chi square test was applied to assess the correlation of tooth brushing skill with age of children and related factors.

Result: Of all children, 21.1% possessed the required tooth brushing skills while 78.9% did not; 41% of those who did not and 16% of those who did have the tooth brushing skills did not have psychomotor skills in hands and feet in their age group (P<0.001). Significant correlations were found between tooth brushing skills of children (P<0.09) and place of residence in the city (P<0.07).

Conclusion: Lack of tooth brushing skills in children who otherwise have adequately acquired other psychomotor skills related to their age group indicates the complexity of tooth brushing technique for children. It is strongly recommended that tooth brushing be performed by parents in this age group.

Keywords: Toothbrushing; Motor Skills, Child; Oral Hygiene

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