

Commentary: Class I and Class III sub-groupings

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The purpose of this study was to analyze and compare the craniofacial construction of white dolichocephalic, brachycephalic and dinaric Class III subgroups and compare them with Class I and II subjects. It was also an attempt to analyze the craniofacial construction of black dolichocephalic and mesocephalic Class III individuals and Class I individuals with Class III tendencies (i.e. I B) and to compare these findings to the findings from the white group.

This study is based on the assertion that craniofacial morphology is the sum of its component parts and that these parts can be described cephalometrically. Using such cephalometric descriptions, subjects can then be categorized as having mandibular protrusive or retrusive effects. The main finding of the study is that three distinct subgroups of Class III exist which express differing degrees of mandibular protrusive and retrusive craniofacial components. The observation is of value because it offers further descriptive evidence that the craniofacial complex consists of a broad spectrum of types with many intermediate and transitional expressions.

However, this study does not offer any con-

vincing evidence on how well-defined these morphological subgroups are within the Class III category; or how separate and unique the chosen features are in the putative subgroups. Although the assertion is made that this method of categorizing Class III has potential clinical significance because it points toward separate strategies for treatment of each subgroup, these treatment strategies are unclear and inadequately discussed in the manuscript.

Obtaining adequate records for large samples is increasingly difficult. The samples used in this study were small and may not be representative. Subjects of both sexes and an indeterminate number of ages — from 6 to 41 years — were included. This level of diversity ignores the abundant evidence that age and sex play important roles in the description of the craniofacial morphology. Rationales for choosing the cephalometric measures under study were also unclear and the criteria for categorizing these subjects in the various subgroups were not assessed. The report could also benefit from a more complete literature review and examples of the various sub-groups should be demonstrated.