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## “ Wits” appraisal in Southern Chinese children

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### ABSTRACT

The sagittal difference between the maxillary and mandibular apical bases in orthodontic diagnosis and treatment planning can be evaluated by means of the angle ANB or alternatively, by means of the “Wits” appraisal. The lateral cephalometric radiographs of a randomly selected sample of 101 Southern Chinese children aged 10-15 years, with 55 males and 46 females were traced and analyzed by the standardized method taught to dental undergraduates. The “Wits” appraisal and angulation of the A-B line to the functional occlusal plane were added in order to generate data relevant to the local population, on whom the flatness of the nose-nasion-forehead region imposes a genuine difficulty in the identification of the cephalometric landmark nasion. Data analyses were performed under different categories with respect to age groups, 10-12 years and 13-15 years; the types of malocclusion and sex. It was found that both the angular and linear measurements were comparable to the existing norms established for the Chinese population. The “Wits” appraisal values have to be modified in order to be applicable to this population with -4.9 millimeters and -4.5 millimeters being the normal values for male and female children respectively.

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