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Normal Development of Voice in children, Advances in Evidence-Based Standards

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State: DENMARK

Area: PEDIATRIC OTOLARYNGOLOGY

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The child voice in trained (voice conscious) boys and girls was investigated with phonetograms (voice profiles) and fundamental frequency (F0) in running speech while reading a standard text. The voice analysis was compared with measurements of pubertal stages and hormonal analysis of all androgens and in girls also oestrogens. The phonetograms (voice range profiles) measured total pitch and loudness range and an area calculation was made in semitones x db(A). An evaluation was made of the electroglottographic curve combining it with a marking of the stroboscopic phases of the vocal folds on the curve with a photocell. The electroglottographic single cycles were stable, and 2000 consecutive cycles were measured in 48 boys and 47 girls aged 8-19 years. Individual and average phonetograms (voice range profiles) for sopranos, altos, tenors and basses were examined. Careful statistical analysis was made with BMDP on the partly stratified cohort, partly prospective studies. The changes will be presented with age and pubertal development based on results from the book on the subject published by Springer: Mette Pedersen. Normal Development of Voice in Children