DEPARTMENT OF REVIEWS AND ABSTRACTS

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EDITOR'S NOTE: The orthodontic literature is replete with articles that relate upper airway compromise to aberrant dentofacial development. Inasmuch as physicians are not generally exposed to the various concepts during medical school or even during residency training programs, it is refreshing to find no less than two current issues of the *Ear, Nose, and Throat Journal* devoted entirely to the effect of airway obstruction on dentofacial development. A list of the contributors and a brief synopsis of their articles is presented herein.

Alex Jacobson

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The Airway and Dentofacial Development

George M. Meredith
Ear Nose Throat J. 1987;66:190-5

The interrelationship between airway obstruction and excess anterior vertical facial height with the associated characteristics, such as a gummy smile, posterior crossbite, high vaulted palate, and steep mandibular plane, is discussed. Children with genetic proclivity for dolichocephalic dentofacial development and children with neuromuscular dysfunctions are more likely to develop a long-face syndrome. Allergic hypertrophy of the tonsils, adenoidal pad, and inferior turbinates, when combined with neuromuscular dysfunction and a genetic predisposition for the dolichocephalic face, places the child in the highest risk category.

Managing nasal obstruction by means of antibiotics, adenotonsillectomy, partial resection of the inferior turbinates, and rapid maxillary expansion (RME), along with the indications for each procedure in the growing and grown subject are briefly surveyed.

Evaluation of the Upper Airway in Children

Thomas A. Welmert
Ear Nose Throat J. 1987;66:196-200

The article is an evaluation of 1360 patients referred by different orthodontists because of airway compromise. Among the clinical specialists, the otolaryngologists are best positioned to evaluate the upper airway. Various obstructive mechanisms such as tonsils, adenoidal pad, allergic rhinitis, septal deviation, and vasomotor rhinitis are among the obstructive mechanisms.

Experiments on the Interaction Between Orofacial Function and Morphology

Karin Vargervik and Egil P. Harvold
Ear Nose Throat J. 1987;66:201-8

The investigators demonstrate on rhesus monkeys the vulnerability of the morphology of the jaws to airway obstruction. The recorded changes were shown to have similarities with the long faces and dental malocclusions sometimes seen in persons who are obligatory mouth breathers.

Obstruction of the Pediatric Upper Airway

Harry J. Richter
Ear Nose Throat J. 1987;66:209-11

Deviated septum, hypertrophy of the inferior turbinates, small nasal airways caused by constricted maxillary dental arches, or enlarged adenoidal pads will lead to open mouth posture and will almost certainly aggravate, if not cause, malocclusion. The recommendation of the author is that otolaryngologists examine even more closely the indications for corrective procedures now available.

Upper Airway Problems and Pre-Orthodontic Orthopedics

Henri Petit
Ear Nose Throat J. 1987;66:228-36

The author claims that his studies corroborate observations that certain upper airway dysfunctions appear to influence development of some dentofacial anomalies. In addition, a relatively large-sized tongue and its close relationship to both the mandibular arch and palatal vault seem to play a major role in the mor-