Title: Pediatric Tinnitus: A Clinical Perspective

Presenter: Kenny H. Chan, MD

ABSTRACT

Objectives: To understand pediatric tinnitus from a practicing otolaryngologist’s perspective and attempt to explore its natural history.

Methodology: A retrospective chart review of the electronic medical record was undertaken to identify a cohort. Only relevant records with prior otolaryngology clinic visit and audiologic testing were included. Patients seen during the last two years of the study period were contacted and completed a questionnaire to assess change in tinnitus and quantify potential alterations in quality of life, associated symptoms, and natural history.

Results: 187 subjects with mean/median age of 11.7/11.6 years were identified. Hearing loss was identified in 42 subjects (22.5%). Etiology of tinnitus was identified in 99 subjects (52.9%). Tinnitus-specific and/or non-specific therapies were given to 84 subjects (44.9%). Of the 58 available subjects, 30 (61.7%) participated in the telephone questionnaire. The distribution of tinnitus complaints between the initial clinic visit and telephone interview for subjects in the last 2 years of the study period shifted favorably to improvement or resolution (p=.001). Shorter duration of tinnitus was associated with a higher probability of having improved tinnitus (p=.046).

Discussion: This study distinguishes pediatric tinnitus from adult tinnitus in terms of lower association with underlying hearing loss, lower likelihood of reported anxiety, and higher likelihood of improvement and resolution. Several recommendations from the 2014 American Academy of Otolaryngology Head and Neck Surgery Foundation adult tinnitus guideline may be relevant for children. There are opportunities for tinnitus prevention in the areas of head injury and noise-induced hearing loss.