The Laryngoscope

LETTER TO THE EDITOR

In Reference to *The Prevalence of Local Symptoms in Benign Thyroid Disease: A Systematic Review With Meta-Analysis*

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Dear Editor,

We carefully read "The Prevalence of Local Symptoms in Benign Thyroid Disease: A Systematic Review with Meta-analysis" [1]. In this meta-analysis, Yogaraj et al. reported that dyspnea (29%), dysphagia (23%), dysphonia (18%), and globus sensation (nodule groups) were the most prevalent symptoms attributed to benign thyroid disorders. They rated most studies as high-quality according to the MINORS (bias tool). We thank the authors for this interesting review. In this letter, we wish to draw attention to several undiscussed points that can impact the paper's final conclusion.

Although the association between thyroid goiter and dyspnea remains well-documented and demonstrated through volumetric studies [2, 3], the causality relationship between non-goiter thyroid benign disorders, dysphonia, and globus sensation may be controversial. In many studies of the meta-analysis, the evaluation of these nonspecific and prevalent symptoms was conducted without excluding common laryngopharyngeal conditions associated with dysphagia, dysphonia, and globus sensation such as allergy, sleep apnea syndrome, or laryngopharyngeal reflux disease (LPRD). Thyroid disorders affect 3% of the general population [4], with nodule prevalence reaching 25% of individuals [5]. In 2022, the prevalence of dysphonia and dysphagia was 29.92 million adults (11.71%) and 15.10 million adults (5.91%) in the United States [6], making these symptoms very common [7]. In daily practice, thyroid nodules or cysts are often diagnosed incidentally in patients with nonspecific laryngopharyngeal symptoms, which may be misattributed to thyroid disorders rather than the causal underlying conditions. This is especially true for LPRD, which is highly prevalent in the United States and commonly presents with dysphonia, dysphagia, and globus sensation [8]. The potential confounding with LPRD was strengthened by authors who assessed thyroid disorder-related symptoms with reflux symptom index [9] or nonspecific swallowing scales [10]. Investigating symptom evolution from pre- to post-surgical treatment should have reduced this potential symptom misattribution. Despite the high MINORS scores reported for most included studies [1] (suggesting methodological rigor), this assessment tool fails to evaluate confounding factors or appropriateness of inclusion/exclusion criteria, thus explaining the potential biases we have identified.

Conflicts of Interest

The authors declare no conflicts of interest.

Data Availability Statement

Data sharing not applicable to this article as no datasets were generated or analyzed during the current study.

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