

Case Report

Large vocal polyp causing dyspnea to young patient

Saurabh Saini*, Saquib Reyaz Khan, Vanshika Singhal

Department of ENT Head and Neck Surgery, Varun Arjun Medical College, Shahjahanpur, Uttar Pradesh, India

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*Correspondence:

Dr. Saurabh Saini,

E-mail: Saurabh3064@gmail.com

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ABSTRACT

The vocal cords are primarily responsible for voice production and the risk factor for non-neoplastic vocal fold lesions is usually multifactorial, laryngeal trauma (endotracheal intubation), hypothyroidism, cigarette smoking, alcohol abuse, gastroesophageal reflux (GERD) and also including phonotrauma etc. we report a 30-year-old female presented with the complaint of dyspnea and hoarseness of voice. endoscopic examination showing, the very large vocal cord polyp was seen to be arising from the left vocal cord, partially blocking the glottic chink, with minimal residual airway. ML Scopy excision of the polyp was done and size was approximately 1.5 cm.

Keywords: Vocal cord polyp, Airway obstruction, Laryngeal polyp, Upper airway diseases, Micro laryngeal surgery

INTRODUCTION

The vocal cords, also known as vocal folds are primarily responsible for voice production. The thyroarytenoid muscle, deep lamina propria, intermediate lamina propria, superficial lamina propria, and squamous epithelium comprise the vocal folds.¹ The risk factor for non-neoplastic vocal fold lesions is usually multifactorial, laryngeal trauma (endotracheal intubation), hypothyroidism, cigarette smoking, alcohol abuse, gastroesophageal reflux (GERD) and also including phono trauma (excessive loudness and cough, excess tension while speaking or singing, etc.), Vocal polyps most commonly occur at the anterior portion of the vocal fold, and in more than 90% of the patients, they are unilateral.^{1,2} In case of any malignant mass on vocal cord proper investigation will be done like flexible laryngoscopy, rigid laryngoscopy, computed tomography (CT) and magnetic resonance imaging (MRI) to check the extension of diseases and to rule out metastases.^{4,6} Benign inflammatory polyps are common in vocal cord, but respiratory sequelae caused by their presence are rare and death by airway obstruction due to the large laryngeal polyp is very unusual.^{3,5}

CASE REPORT

A 30-year-old female presented in department of Varun Arjun medical college and Rohilkhand hospital with the complaint of dyspnea for 6 months and hoarseness of voice since, 1-2 year. Change in voice which was insidious in onset and progressive in nature, not relieved on medication. Dyspnea was for 6 months which was slowly progressive and dyspnea was aggravated in the supine position. Patient was taking medicine from the local practitioner and getting some relief. But dyspnea was not fully recovered. Patient was referred to medical college in the department of ENT and head and neck surgery by some local practitioner. complete history of the patient was taken and laryngeal examination was done in view of the dyspnea and HOV. Indirect laryngoscopy examination revealed a very large, soft, pedunculated polyp which was covering the glottic chink. Further, on laryngeal endoscopic examination was revealed, the very large vocal cord polyp was seen to be arising from the left vocal cord, partially blocking the glottic chink, with minimal residual airway. Polyp was falling inside the subglottic at the time of inspiration. The patient was posted for microlaryngoscopic excision of the

polyp, under general anesthesia. In view of large polyp discussion was done with an anesthetist's team and in View of large peduncle of polyp anesthetists team decide to intubate the patient taking help of surgeon for hold polyp and using the lower size micro laryngeal endotracheal tube. Considering dislodges the polyp into the airway bronchoscopy instrument put into the backup. ML scope excision of the polyp was done and polyp was removed and size was approximately 1.5 cm.

HPE revealed size was measuring 1.5×1×0.5 cm, stratified squamous epithelium with loose fibrous tissue (vocal cord polyp).

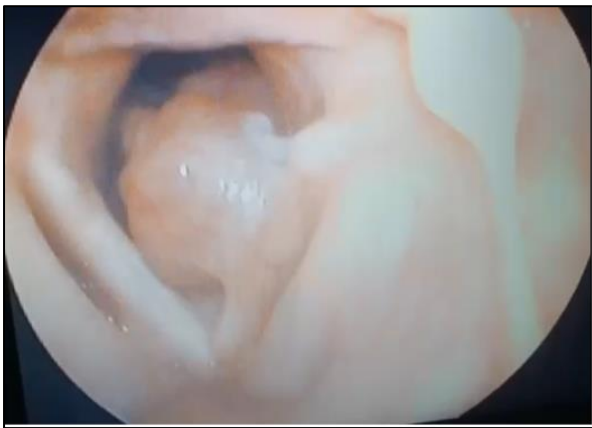


Figure 1: Endoscopic image of large vocal cord polyp.



Figure 2: Specimen of vocal cord polyp.

DISCUSSION

Vocal fold polyps generally present with hoarseness of voice but some previously published article show that huge ones can cause dyspnea, choking spells, wheezing

and stridor etc.^{8,9} For treating the large vocal cord polyp's surgical excision using micro-laryngoscopy. Surgical excision provides dramatic improvement in voice and helps to reduce respiratory complaint.⁹

CONCLUSION

Planning of such a large polyp is very crucial prior to taking for microlaryngoscopic excision. Consider tracheostomy over endotracheal intubation for securing the airway for general anesthesia, as the latter could promptly dislodge the polyp, in our case we lucky enough polyp having large peduncle.

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