An unusual presentation of thyroglossal cyst -A case report

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Abstract

Introduction: Although thyroglossal cysts are very common in children and young adults, their presentation in the elderly is very rare and often goes undiagnosed. This may lead to incomplete excision and recurrence of the cyst, thereby increasing the risk for a malignancy. Here we present a case in an elderly patient, who presented to us with a midline neck swelling, whereas the histopathology report confirmed a thyroglossal cyst.

Keywords: Thyroglossal cyst, Elderly, Midline neck swelling, Malignancy, Incomplete.

Introduction

Thyroglossal cyst is a fibrous cyst that forms from a persistent thyroglossal duct. Thyroglossal cysts can be defined as an irregular neck mass or a lump which develops from cells and tissues that are left over after the formation of the thyroid gland during developmental stages.

Case Report

A 66 years old male patient presented to our hospital, with complaints of midline neck swelling since 1 year. The swelling was insidious in onset and gradually progressive in nature. There was no history of difficulty in breathing, change in voice, thyroid disorder or associated medical pathology. On examination, the swelling had a smooth surface, 4x4 cm in size, extending from lower border of thyroid cartilage to 1.5 cm above the jugular notch, with no skin changes, no scars or sinuses, moves with deglutition. does not move with protrusion of tongue. FNAC and ultrasonography of the swelling suggested an infective etiology. A complete pre-anesthetic check up was carried out for the patient. After which he was posted for complete surgical excision of the mass. The histopathological report confirmed a thyroglossal cyst.



Fig. 1: Intraoperative- midline neck mass excision



Fig. 2: Surface anatomy of the excised mass



Fig. 3: Cross sectional anatomy of the excised mass

Discussion

Thyroglossal duct is an embryonic attachment of the thyroid gland and mostly its involution occurs by 5th embryonic period of gestation. Failure of the involution will lead to development of thyroglossal duct cyst. The cysts are generally located at the level of hyoid bone although they can be present anywhere along the TG tract.¹

FNAC and a Neck ultrasonography should always be performed to detect the presence of normal positioned thyroid gland. Treatment consists of sistrunk procedure in which the whole cyst along

with hyoid bone and base of tongue along with the tract is removed up to the foramen caecum. ^{2,3}

Thyroglossal cyst mostly presents in the children and young adults and rarely in elderly therefore often goes unnoticed and undiagnosed. This can be detrimental as inadequate surgical resection may be done which can lead to higher rates of recurrence.⁴ An infected neck mass is the common presentation of thyroglossal duct cysts in adults.⁵

Malignant transformation is known to occur, most commonly, papillary carcinoma. ^{6,7} Misdiagnosis of the midline neck masses is the most common cause of inadequate and inappropriate surgery on thyroglossal tract disease, leading to recurrence of lesion. ⁸

Early surgical excision is always advised. There are chances of enlargement of the cyst size due to infection or mucin production. The rate of malignant transformation is higher in the elderly. In our case an early detection and excision was performed thereby eliminating the chances of any further complication. Also there were no signs of recurrence noted in the patient on follow up.

Conclusion

Thyroglossal cysts although common in children should still be considered in the differential diagnosis of the midline cystic swelling in the elderly. Early diagnosis and complete excision of thyroglossal cyst is mandatory in the elderly as the risk of malignant transformation is high.

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