**Título:** TRACHEOMALACIA AFTER THYROIDECTOMY: A MIND-BENDING DIAGNOSIS

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**Resumo:**

Background

Tracheomalacia is a very rare post-thyroidectomy complication. Long-standing tracheal compression by a large goiter can, however, lead to tracheal ring softening or destruction, with a reduction of the tracheal cross-sectional area to 50% and consequent tracheal collapse after thyroidectomy, requiring tracheostomy. We present a case of tracheomalacia following total thyroidectomy for a long-standing multinodular goitre.

Case Report

A 73-year-old female patient was brought to the Emergency Room (ER) due to dyspnea and hypoxia, 5 hours after an ambulatory total thyroidectomy performed in another hospital. Because of difficulty in tracheal intubation, the patient was transferred to our hospital sedated and with a laryngeal mask. Past history revealed a 5-year history of symptomatic multinodular goitre with orthopnea and dysphagia for solids, without other compressive symptoms. Thy­roid function testing was normal. She also had hypertension and dyslipidemia.

In our ER, the surgical stitches were removed with no evidence of compressive hematoma or active bleeding and intubation was successfully performed with a 7.0 orotracheal tube, using a videolaryngoscope. In the OR, the wound was surgically explored, nerve integrity observed and no surgical cause for symptoms was found. She was taken to the Intensive Care Unit sedated and ventilated. Flexible fiberoptic bronchoscopy showed approximately 50% lumen occlusion due to bulging of a large extension of the medial third of the trachea’s posterior wall. After corticotherapy, 3 failed extubation attempts and excluded the possibility for a tracheal prosthesis, a tracheostomy was performed.

Discussion

Respiratory symptoms progressing to respiratory arrest are one of the most feared complications after total thyroidectomy, mainly due to a compressive hematoma that compresses and collapses the tracheal lumen or iatrogenic bilateral lesion of the recurrent laryngeal nerve. In this case, after excluding these diagnoses, it became apparent that the underlying cause was a tracheomalacia due to the long standing compressive goiter. The need for a definite treatment as a tracheal prosthesis or a tracheostomy are of major importance to resume an independent life.

Learning Points

Respiratory distress after thyroidectomy is an emergency.

Three important differential diagnoses are compressive hematoma, vocal cords paralysis and tracheomalacia.

Multidisciplinary approach will contribute to survival and resuming of a somewhat normal life.

References

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