1065443 - THE ANKYLOSING SPONDYLITIS AIRWAY - BETWEEN A ROCK AND A HARD PLACE

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Purpose: To describe innovative airway management techniques in a patient with severe ankylosing spondylitis complicated by large anterior cervical osteophytes scheduled to undergo anterior cervical decompression.

Clinical Features: The patient has provided written consent to the reporting and publication of this case report. We report the perioperative course of a 69-year-old man with long standing ankylosing spondylitis (AS) with severe dysphagia. Imaging confirmed large syndesmophytes from C3 to C5 extending from the posterior pharyngeal wall; most prominent at the level of the epiglottis. He was scheduled to undergo excision of the anterior cervical osteophytes. The surgical approach possibly precluded the use of an elective preoperative tracheostomy for the anesthetic. We opted to perform a modified awake fiberoptic nasal intubation. Adequate oxygenation was ensured through a modified nasal trumpet (MNT) connected to the anesthetic circuit using a standard 15 mm connector. A split nasopharyngeal airway (SNPA) was inserted in the other nares. Fiberoptic bronchoscopy revealed the bony prominence of the posterior pharyngeal wall obscuring the view of the larynx. Advancement and rotation of the SNPA was required to visualize the vocal cords. The fiberoptic bronchoscope then advanced through the SNPA and into the trachea. The SNPA was peeled off the bronchoscope and the tracheal tube was then successfully threaded into the trachea.

Anterior cervical osteophytes causing dysphagia are more commonly seen in diffuse idiopathic skeletal hyperostosis (DISH) and are an atypical finding in AS¹. Nonetheless, both DISH and AS have been previously reported in result in considerable difficulty with laryngoscopy and tracheal intubation². We briefly review the airway management implications in cervical spine surgery³. Nasal fiberoptic intubation may be the preferred technique in these patients. The modified nasal trumpet (MNT) and the split nasopharyngeal airway (SNPA) are useful adjuncts to facilitate airway management⁴, ⁵. We discuss the role of nasal intubations and the use of modified nasopharyngeal airways in patients presenting for cervical spine surgery.

Conclusion: The innovative airway management technique described was useful in our patient with the unusual combination of a rigidly fused spine secondary to AS and focal exuberant anterior osteophytosis and should be considered in other similar situations.

References: