Vocal fold granuloma after prolonged neurosurgical procedure with wire reinforced endotracheal tube

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Letter to the Editor

Vocal Fold Granuloma after Prolonged Neurosurgical procedure with Wire Reinforced Endotracheal Tube

Madam, Wire-reinforced endotracheal tubes are preferred over the standard and much cheaper PVC endotracheal tubes in situations where there is a potential risk of intra-operative kinking of tube or when the anaesthetist has limited intra-operative access to the tube. This would include majority of head and neck; and neurosurgical procedures. Hazards associated with the use of such reinforced tubes have been reported previously and are mainly related to occlusion. We report an unusual complication which led to significant morbidity in our case.

A 32 year old lady presented to us with a left sided petrous meningioma and underwent elective left sub occipital craniotomy. Patient was intubated with a size 7.5 wire-reinforced endotracheal tube which went uneventfully and no vocal fold pathology was identified while pre-intubation laryngoscopy. She was then placed in park bench position with left side up and via a retrosigmoid craniectomy the entire tumour was excised. The duration of anaesthesia was eight hours and at the end of surgery, the endotracheal tube was replaced by a plain PVC tube of same size for elective overnight ventilation. She was extubated twelve hours later and over the next two hours although she remained alert and cooperative, continued to complain of difficulty in breathing, exhibiting biphasic stridor along with hoarseness of voice. Her arterial blood gases were suggestive of type II respiratory failure having a PCO$_2$ of 58 and she was thus re-intubated for elective ventilation. Her arterial blood gases improved over the next six hours and she was again extubated. She continued to have stridor and hoarseness and a fibreoptic laryngeal examination was carried out which showed a large vocal cord granuloma at the junction of anterior one third and posterior two thirds of her left vocal fold. Foreseeing prolonged requirements for airway control, patient underwent a tracheostomy, following which her airway problems resolved. Her hospital course was uneventful then onwards and she was discharged after repeat fibreoptic laryngeal examination and removal of tracheostomy on the 26th postoperative day. Follow up till six months have been unremarkable. A thorough search of literature revealed only a single previously reported case of vocal cord granuloma after short term intubation, reported by Naoko et al in which the patient was operated for a renal tumour. The granuloma was detected four months after the surgery by an orthonologist.

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References

Comments

Perinatal Arterial Ischemic Stroke

Madam, I would like to congratulate Dr. I. S. Hamid and Dr. Z. A. Mueed for a comprehensive review on the Perinatal Arterial Ischemic Stroke (PAS) in the Journal of Pakistan Medical Association, July 2008 Stroke issue. However, it should be noted that the definition and terminologies for stroke in the perinatal period has been recently modified. The terminologies like PAS (which authors have used in their article), PPERI (presumed pre or perinatal arterial ischaemic stroke) and many others that have been used in the past to describe stroke in the perinatal period, have been largely replaced by new suggested terminologies.

For the purpose of standardization, a consensus group of experts in the area of paediatric stroke proposed new definitions and terminologies in a workshop convened by the National Institute of Child Health and Human Development (NICHD) and National Institute of Neurological Disorders and Stroke (NINDS) in August 2006. The summary report of the workshop was published in Pediatrics, the official journal of American Academy of Pediatrics in September 2007 issue. In this consensus workshop, experts in the area of paediatric stroke proposed that previously used different terminologies for stroke in the perinatal period such as perinatal stroke, perinatal arterial