**PO32   HEREDITARY ANGIOEDEMA AND NEUROENDOCRINE NEOPLASM: A SAFETY ANESTHETIC PROCEDURE**

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Introduction: Hereditary angioedema (HAE) is caused by the deficiency or dysfunction of the C1 inhibitor, and is characterized by recurrent episodes of edema, often affecting skin or mucosal tissues of the upper respiratory and gastrointestinal tracts (JA Clinical Reports 2018 4:38). One of the main concerns related to the disease is upper airway edema after mechanical irritation in airway management during general anesthesia. This can lead to severe laryngeal edema, that request prompt treatment (Anesth Pain Med 2022;17:235-238). The authors present a clinical case of a patient with HAE who underwent a laparoscopic enterectomy due to a non-productive neuroendocrine neoplasm under general anesthesia.

Case report: A 40-year-old 60kg female under a prophylactic regimen with Plasma-derived C1-inhibitor agent Berinert® due to HAE was admitted to our institution for a laparoscopic enterectomy to treat a neuroendocrine tumor. Past abdominal angioedema episodes, recurrent limb angioedema, and upper airway edema were reported during the pre-anesthetic evaluation. The patient referred no symptoms during the week before. The patient received 1200U of Berinert® intravenously (IV) 1h before anesthetic induction (Berinert® was available in the operative room). ASA standard monitoring plus invasive arterial blood pressure monitoring and processed electroencephalogram were used. IV fentanyl (150mcg), lidocaine (100mg), propofol (150mg) plus rocuronium (100mg) were administered during the anesthesia induction and successfully endotracheal intubation under video laryngoscopy was performed. Epiglottis or vocal cords edema was not observed. Conversion to open surgery was needed. Video laryngoscopy was performed to confirm no airway edema before extubation (neuromuscular blockade reversal with sugamadex to TOF>95%). Postoperative abdominal pain was reported, and an abdominal angioedema crisis was suspected, after analgesic optimization. Symptoms disappeared with IV Berinert® 1200U. Multiple abdominal crises were treated with Berinert® during the hospital stay.

Discussion: HAE increases patient morbidity and mortality (life-threatening mucosal edema). When invasive ventilation is needed, the airway trauma should be minimized. The anesthetic team chose video laryngoscopy and minimal endotracheal tube caliber (6.5mm). Upper airway was verified before extubation. The disease prophylaxis/treatment plays an important role in the management of these patients preventing serious complications before the stressful event. Early hospital discharge and positive outcomes (including pain control) are seen if angioedema treatment is immediately available. The length of hospital stay was 6 days and postoperative consultation didn’t notice any adverse event. The authors highlight the importance of well-controlled HAE and prophylaxis before a major trigger event such as the perioperative period. HAE treatment should be readily available. Airway management must be handled carefully.

