

# THE MISBEHAVING PLEOMORPHIC ADENOMA

Ahmad Zamir Asyraf Rosli<sup>1</sup>, Mohd Razif Mohamad Yunus<sup>2</sup>, Lum Sai Guan<sup>2</sup>, Najihah Hanim Asmi<sup>1</sup>, Mohamad Norkahfi Razali<sup>1</sup>, Khairina Adliah Kamal Ariffin<sup>3</sup>, Mohd Shaiful Nizam Mamat Nasir<sup>1</sup>, Luqman Rosla<sup>\*1</sup>

<sup>1</sup>Department of Otorhinolaryngology-Head & Neck Surgery, Hospital Sultan Haji Ahmad Shah Temerloh, Pahang,

<sup>2</sup>Department of Otorhinolaryngology-Head & Neck Surgery, Hospital University Kebangsaan Malaysia Selangor,

<sup>3</sup>Department of Radiology Hospital Sultan Haji Ahmad Shah, Temerloh, Pahang



## ABSTRACT

Pleomorphic adenoma (PA) is the commonest benign salivary gland tumor. It is a painless slow growing tumor in nature. Carcinoma expleomorphic adenoma should be considered in the presence of rapid size progression, painful, skin involvement and facial nerve involvement. The challenge in diagnosing and managing large PA with potential malignant transformation remains a dilemma for surgeons often when the FNAC reported as non malignant.

## CASE DISCRPTION

A 64-year-old lady presented with large swelling over left parotid region for 6 years and progressively increasing in size within 1 year duration. Physical examination showed there was a large, multilobulated mass measuring 40x30 cm, from the left parotid region extending inferiorly to submandibular region. Cytological examination reported as PA.

Contrast enhanced computed tomography (CT) scan reported there was a large lobulated, heterogeneously vascularised polypoid mass seen at the left side of neck with hypodense areas seen within in keeping with cystic or necrotic component. Loss of normal appearance of the left submandibular and left parotid gland was seen in the imaging and at the periphery, there was no clear fat plane of demarcation with right masseter anteromedially.

Total parotidectomy and submandibulectomy was performed. Hemostasis was secured by ligating a direct branch from the Internal Jugular Vein (IJV) supplying the tumor and intraoperatively facial nerve was sacrificed in view of difficulty in locating the main branch due to the massive tumor bulk. The skin closure attained by cervical fasciocutaneous flap reconstruction. The final HPE reported as PA with prominent myoepithelial proliferation and no malignant transformation. After one-year follow up, the wound was well healed and no evidence of recurrence.



**Anterior view of single multilobulated left submandibular mass.**



**Post operative skin reconstruction by using cervical fasciocutaneous flap**

## Discussion

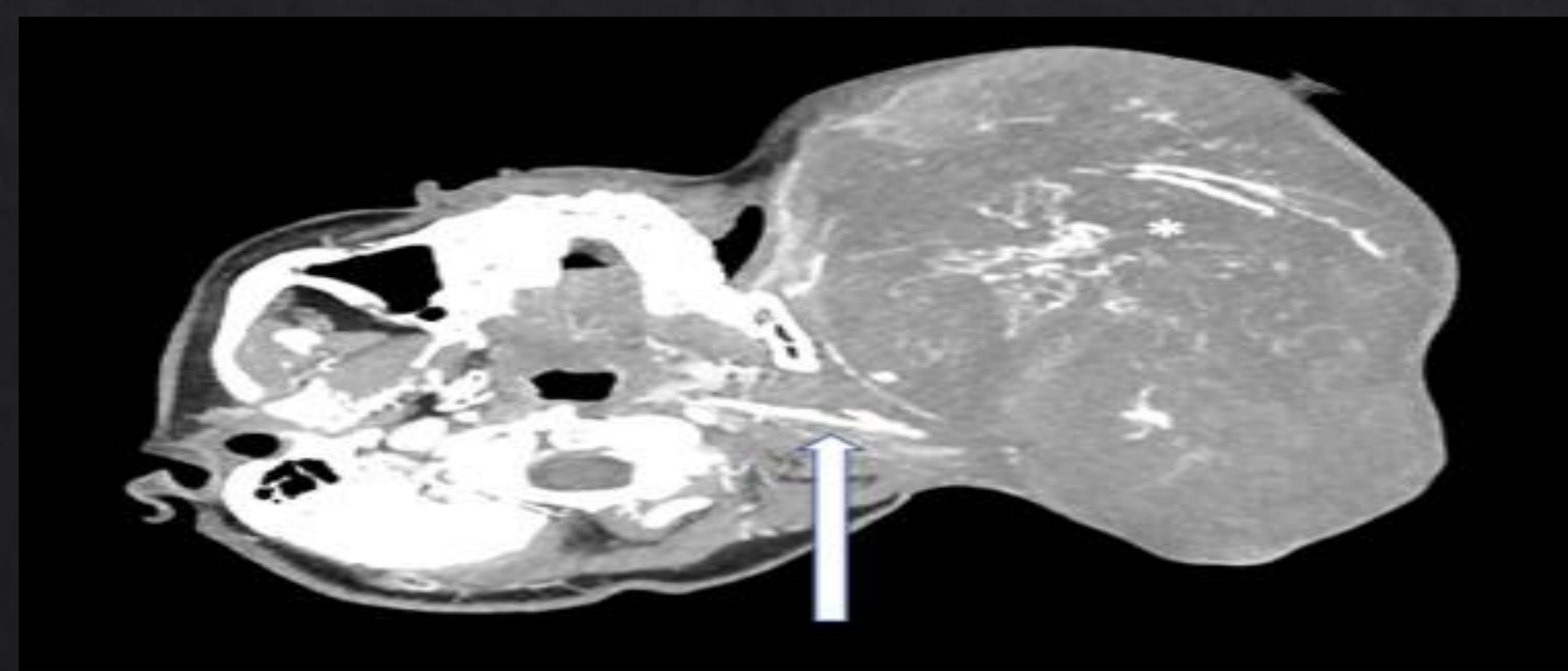
Taking into consideration in a massive tumor with potential malignant transformation, there is a risk of malignant degeneration at the center of tumor and this may outstrip the blood supply, causing hemorrhage during the surgery<sup>1</sup>. This is similar to our patient, where the tumor was huge and it involved both submandibular and parotid gland. As demonstrated in the CT scan, the tumor was highly vascularized. Hence, we decided not to dissect the tumor further in search for the facial nerve avoiding the risk of hemorrhage, instead, we opt to ligate the main vessel supplying the tumor and dissect peripherally, removing the tumor in one bulk and sacrifice the facial nerve. Patient was well informed preoperatively regarding the outcome of nerve palsy.

## Conclusion

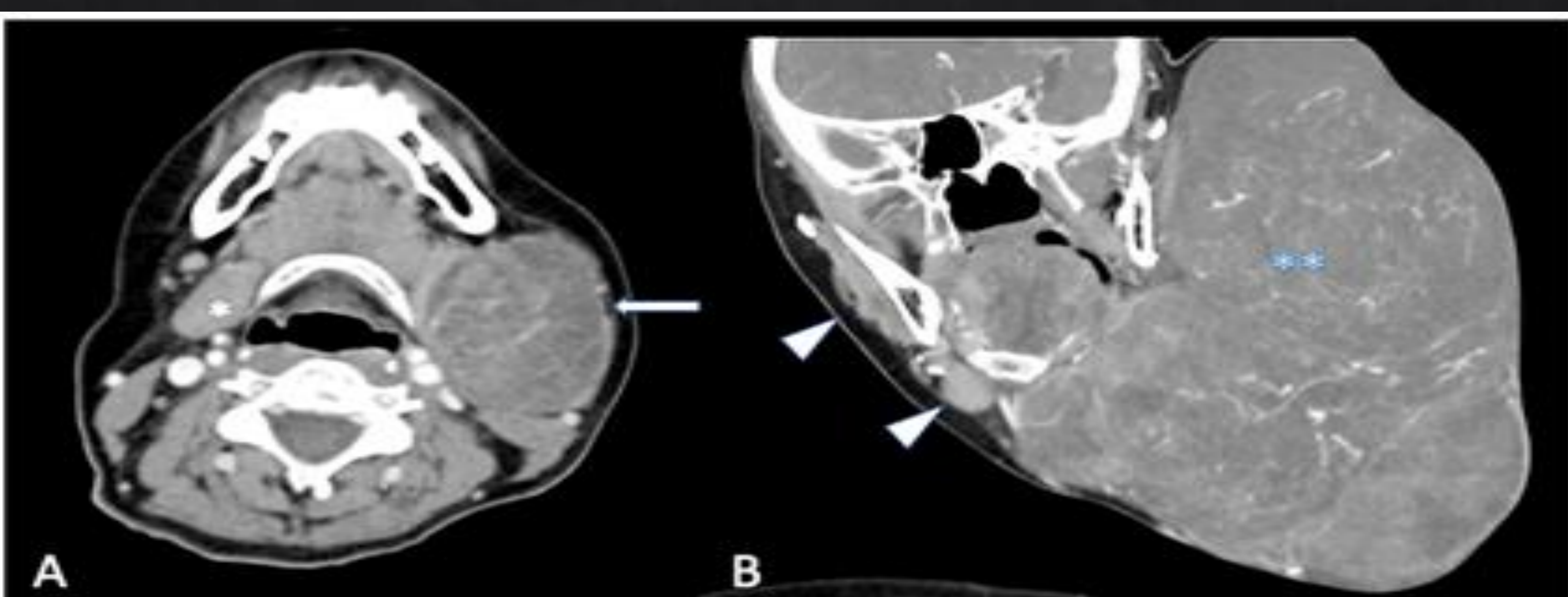
In conclusion, in dealing with giant PA, one should recognize the potential complications, and in our case, the risk of hemorrhage and sacrificing the facial nerve should be considered. Hence preoperative discussions with the patient and preoperative surgical plan are paramount.

## REFERENCES

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**CT Scan Neck: Arrow shows arterial blood supply obtained directly from the left external carotid artery\* - multiple enlarged vessels within the mass to suggest a highly vascularised tumor.**



**CT Scan neck: A normal right submandibular gland on initial presentation  
Arrow: mass arising from the left submandibular gland  
B Arrowheads: normal right submandibular and parotid gland on the right side\*\* - huge mass involving both the left submandibular and parotid gland on latest presentation**