

CASE REPORT

Nasopharyngeal Mucoepidermoid Carcinoma: A Rare Case Report

Nazofarengel Mukoepidermoid Karsinom: Nadir Görülen Bir Vaka Sunumu

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ABSTRACT

Introduction: Mucoepidermoid carcinoma is one of the common malignancies of the salivary glands. Nasopharyngeal mucoepidermoid carcinoma cases are rare. The treatment of these rare cases depends on the stage of the tumor and its invasion of the surrounding tissues.

Case: The patient, who was diagnosed with thyroid papillary carcinoma in 2006 and was being followed up in medical oncology, applied to our clinic because of asymmetric thickening in the left nasopharynx, which was detected incidentally in the brain MRI. The patient had pain in the left neck area for about a month. Excisional biopsy of the lymph node with increased FDG uptake in the left jugulodigastric region on PET/CT and multiple punch biopsies from the nasopharynx were performed. The patient, whose pathology result was mucoepidermoid carcinoma, was referred to medical oncology to receive radiochemotherapy.

Discussion: It should be kept in mind that, although rare, mucoepidermoid carcinoma may be present in patients presenting with a mass in the nasopharynx. Although studies conducted to date provide information on treatment options, prospective studies are needed for prognosis and treatment selection.

Keywords: Mucoepidermoid carcinoma, nasopharynx, nasopharyngeal carcinoma

ÖZ

Giriş: Mukoepidermoid karsinom tükürük bezlerinin sık görülen malignitelerinden biridir. Nazofarengel yerleşim gösteren mukoepidermoid karsinom vakaları nadir görülür. Nadir görülen bu olguların tedavisi tümörün evresi ve çevre dokulara invazyonuna göre şekillenir.

Olgu: 63 yaşında erkek hasta 2006 yılında tiroid papiller karsinom tanısı aldı. Bu nedenle tıbbi onkoloji takipleri yapılan hastanın beyin MR'ında insidental olarak nazofarenkste solda asimetrik kalınlaşma saptanması üzerine kliniğimize sevk edildi. Hastanın sol boyun bölgesinde yaklaşık bir aydır ağrı şikayeti mevcuttu. PET/CT de sol jugulodigastrik bölgede artmış FDG tutulumuna sahip lenf nodundan eksizyonel biyopsi ve nazofarenksten multiple punch biyopsiler yapıldı. Patoloji sonucu mukoepidermoid karsinom gelen hasta radyokemoterapi almak üzere onkolojiye sevk edildi.

Tartışma: Nazofarenkste kitle ile gelen hastalarda nadir de olsa mukoepidermoid karsinom görülebileceği aklıda tutulmalıdır. Günümüze kadar yapılan çalışmalarda tedavi seçenekleri hakkında bilgiler olsa da prognoz ve tedavi seçimi için prospektif çalışmalara ihtiyaç vardır.

Anahtar Kelimeler: Mucoepidermoid karsinom, nazofarenks, nazofarengel karsinom

Introduction

Mucoepidermoid carcinoma is the most common malignancies of the salivary glands. These cancers can also rarely be seen in the lung, nasal cavity, paranasal sinuses and nasopharynx (1). Along the sinonasal tract, it is most commonly seen in the antrum of the maxillary sinus, followed by the nasal cavity, nasopharynx and ethmoidal sinuses (2). CT and MRI, which can examine the sinonasal region in detail in suspected patients, are imaging methods used to make a diagnosis (3). In addition, endoscopic examination should be performed in suspected patients as it provides a wide field of view in the nasal region (4). According to the literature, 0.6% of salivary gland tumors and 4.8% of mucoepidermoid carcinomas are nasopharyngeal mucoepidermoid carcinomas (2).

The treatment of these rare cases depends on the stage of the tumor and its invasion into the surrounding tissues. Positron emission tomography (PET) is used for tumor staging and investigating invasion to surrounding tissues (5). While only surgery is sufficient for low-grade

tumors, total resection and postoperative radiotherapy are recommended for medium and high-grade tumors (2).

In this case report, a patient diagnosed with low-grade nasopharyngeal mucoepidermoid carcinoma, who applied to our clinic due to a nasopharyngeal mass, is presented and it is emphasized that nasopharyngeal masses, although rare, can present as mucoepidermoid carcinoma.

Case

A 63-year-old male patient was diagnosed with thyroid papillary carcinoma in 2006 and underwent surgery. It was determined as a result of the pathology that the patient, who underwent neck dissection due to neck swelling in 2014, had lymph nodes with thyroid papillary carcinoma metastases. For this reason, he received doxorubicin chemotherapy. In the medical oncology follow-up, he was referred to our clinic because of the incidentally detected asymmetrical thickening of the left

nasopharynx in the brain MRI (Figure 1-2). The patient had pain in the left neck area for a month. Physical examination revealed a 2x2 cm smooth-surfaced and limited, firm, mobile mass in the right submandibular region, and a 1x1 cm smooth-surfaced and limited, firm, mobile mass in the left upper jugulodigastric region. In the nasopharyngoscopy of the patient, a smooth surface mass of 2x2 cm was detected filling the rosenmüller fossa on the left. Multiple punch biopsy samples were taken from the patient under general anesthesia, as the results of the punch biopsy performed under local anesthesia were chronic inflammation. Excisional biopsy was performed from the lymph node with increased FDG uptake in the left jugulodigastric region in PET/CT. The pathology result of the patient was thyroglobulin (-), pancytokeratin (+), mucin (+) low grade mucoepidermoid carcinoma. Genetic analysis was not performed in our case. The patient was referred to medical oncology to receive radiochemotherapy.

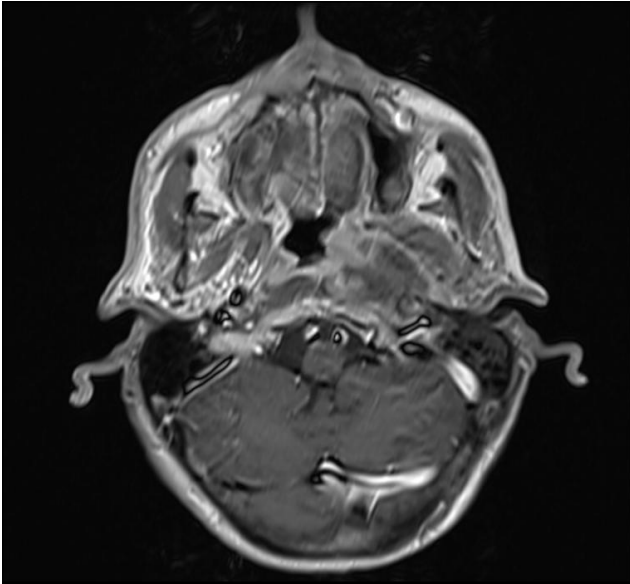


Figure 1: Asymmetry of the nasopharynx in the MRI image.

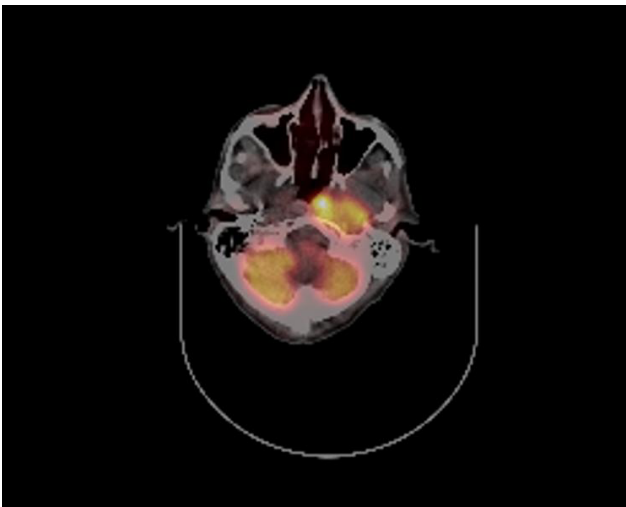


Figure 2: PET/CT images of the mass in the nasopharynx.

Discussion

Mucoepidermoid carcinoma was first defined as a rare malignancy of the major and minor salivary glands in 1945 by Stewart et al. (6). In recent studies, it is defined as the most common cancer of the parotid gland (7).

Nasopharyngeal mucoepidermoid carcinomas account for 3% of all nasopharyngeal cancers and 15% of nasopharyngeal salivary gland tumors (8).

Mucoepidermoid carcinomas occur at an average age of 50 years, and the female/male ratio is 3/1 (1). Nasal obstruction, epistaxis, and hearing loss are common symptoms, while neck mass, headache, and cranial nerve palsy are rare symptoms (9). The symptoms in our case were a neck mass and neck pain.

According to the modified mucoepidermoid carcinoma grading scheme, the degree of disease is aggressive invasion pattern if there is bone invasion and lymphovascular invasion. (7). The patient's disease grade was evaluated as high-grade because the excisional biopsy result of the lymph node with high FDG uptake on PET/CT was mucoepidermoid carcinoma.

While low-grade mucoepidermoid carcinomas respond only to surgical excision, postoperative radiotherapy should be given after total resection in intermediate and high-grade tumors (2). In our case, which was evaluated by the medical oncology council, it was deemed appropriate to apply radiochemotherapy because the disease was high-grade.

Conclusion

In conclusion, cases of mucoepidermoid carcinoma located in the nasopharynx are rare. Although there is information about treatment options in studies, prospective studies are needed on disease prognosis and treatment according to staging.

Authorship Contributions

Conception:R.Ö.E., M.A., Design: H.A., M.A.E., Supervision:M.A.D., Resource: R.Ö.E., M.A., Materials: H.A., Data Collection and/or Processing: R.Ö.E., M.A., Analysis and/or Interpretation: H.A., M.A.E., Literature Review: M.A.D., Writer: R.Ö.E., M.A., Critical Review: M.A.E., M.A.D. .

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