Case Report: Exophthalmos and Third Eyelid Protrusion Caused by Zygomatic Mucocele in a Shih Tzu

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ABSTRACT Exophthalmos is a common ocular symptom seen in small animal practices. However, the identification of the etiology of exophthalmos is usually a challenge task. A 4 years old, intact, male Shih Tzu was presented with a history of recurred third eyelid protrusion of right eye (OD) following third eyelid surgery at a local veterinary clinic. Ophthalmological examination revealed an exophthalmos, protruded third eyelid, and a gradually enlarged swelling in the right temporal area of the head. Third eyelid biopsy revealed mucus-like materials from the base of the third eyelid. Pathological diagnosis of the third eyelid was chronic inflammation. Exploratory surgery for retrobulbar region of OD eye and right temporal head was performed. A large amount of sticky mucoid secretion was observed extensively in the OD retrobulbar and peribulbar areas. Cytologic evaluation of the aspirated materials showed salivary secretion with epithelial cells, white blood cells and eosinophilic mucinous materials. Histologic examination revealed chronic inflammation of OD retrobulbar tissues without neoplastic tissue noted, suggesting a mucocele. OD third eyelid protrusion and exophthalmos caused by zygomatic mucocele were diagnosed. There has been no swelling recurrence in the head following the exploratory surgery and drainage in a period of 3-year follow-up. [Hsieh CY, Liu CH, Yeh LS, *Lin CT. Case Report: Exophthalmos and Third Eyelid Protrusion Caused by Zygomatic Mucocele in a Shih Tzu. Taiwan Vet J 33(1): 30-34, 2007. *Corresponding author TEL: 886-2-2735 9931, FAX: 886-2-2735 9931, E-mail: ctlin@ntu.edu.tw]

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INTRODUCTION

Exophthalmos often results from a space-occupying lesion within the orbit and may occur due to retrobulbar abscess, inflammation of the intraorbital tissues, chronic inflammation, cyst formation, parasitism, neoplasia, foreign body or zygomatic mucocele [2,4-10,12-13].

Salivary mucocele is an accumulation of saliva in a non-epithelium-lined swelling that causes an inflammatory response in the surrounding tissues. Most salivary mucoceles affects the sublingual gland [1], and occasionally saliva may accumulate in the retrobulbar space from a zygomatic mucocele [1,14]. Protrusion of the third eyelid may be seen in Horner's syndrome, facial paralysis, and less commonly, retrobulbar space-occupying lesions [2,5,7-8,12]. This report describes a zygomatic mucocele resulting in strabismus, third eyelid protrusion, and exophthalmos in a Shih Tzu dog.