

SWEAT-GLAND-TUMOUR WITH OSSEOUS METAPLASIA “CHONDROID SYRINGOMA” IN THE ONE-HUMPED CAMEL (*Camelus dromedarius*)

R.O. Ramadan¹, A.M. Zakia¹, A.I. Almubarak¹, F.A. Al-Hizab³,
S.E. Barakat³, O.M. Ahmed² and O.I. Alturki⁴

¹Department of Clinical Studies, Department of Pathology³, ⁴Department of Anatomy,
College of Veterinary Medicine & A.R; King Faisal University (CVMAR, KFU)

²Veterinary Research Institute, Department of Pathology, Khartoum, Sudan

ABSTRACT

A pleomorphic adenoma of sweat gland is a rare cutaneous adnexal neoplasm in domestic animals. We diagnosed such a tumour in a 12-year-old-male camel. The mass which occurred on the lateral part of the left masseter region was hard, infiltrative and covered by an intact skin. Grossly, following surgical excision the mass was grayish in colour. Histologically, the neoplasm displayed irregular tubules of varying shape, size and surrounded by thin connective tissue. These lobules were composed of either solid sheet or formed glandular structure with multilayer tubules. The neoplastic cells of both solid cells and glands were polygonal with indistinct boundaries and abundant faint pink cytoplasm that was vacuolated. The nuclei of these cells were small, vesicular with margined chromatin. Areas of malignant transformation were encountered, where the neoplastic cells revealed cellular and nuclear pleomorphism and moderate mitotic activity. Interspersed among the neoplastic tubules were osteoid trabeculae. The neoplastic cells of solid mass and tubule revealed dense and diffuse cytoplasmic immunoreactivity with S-100 protein, whereas only the epidermal epithelium showed immunopositive reactivity to cytokeratin.

Key words: Camel, chondroid syringoma, dromedary, neoplasm, sweat gland