

Urinary Tract Lesions in Cats And Dogs: Epidemio-Pathological Study

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SUMMARY

The present study aimed to provide an epidemiological and pathological study on urinary tract diseases in dogs and cats, spontaneous cases, encountered in the Department of Pathology, Forensic Medicine, and Necropsy Diagnosis of FMV Cluj from 1st January 2008 to 1st March 2010.

The biological material was represented by 49 cadavers, respectively 15 cats and 34 dogs which presented lesions of the urinary tract. The animals were brought to the Veterinary Pathology Department for the necropsy and histopathological exam.

Necropsy was performed according to conventional necropsy technique. This was followed by collection of biological samples, inserted into the fixative agent (10% formalin, pH 7) for 24 hours then processed through the paraffin inclusion technique and examined microscopically for histopathological diagnosis.

Histological analysis of samples was performed with an Olympus BX 41 optical microscope and image processing was performed using the software CellB. From the total of 768 animals (635 dogs and 133 cats) which were examined during the mentioned period, only 49 animals (6.38%) presented urinary tract lesions. A total of 11.27% of the investigated cats and 5.35% of the investigated dogs presented urinary tract disorders (table 1).

Tab. 1.

Distribution of renal lesions

CATS			DOGS		
<i>Disorder</i>	<i>Cases</i>	<i>Percentage</i>	<i>Disorder</i>	<i>Cases</i>	<i>Percentage</i>
1. Congenital anomalies	1	6.66%	1. Congenital anomalies	1	2.94%
2. Degeneration	10	66.66%	2. Degeneration	9	26.47%
3. Circulatory	11	73.33%	3. Circulatory	22	64.70%
4. Inflammations	7	46.66%	4. Inflammations	25	73.52%
5. Tumors	1	6.66%	5. Tumors	0	0

Urinary tract pathology, respectively mainly renal pathology, is more important in cats than in dogs, and most significant lesions were represented by acute tubular necrosis (following ethylene-glycol intoxication), chronic fibrous and proliferative nephritis and lipid dystrophy. In dogs, the lesions that predominated were represented by acute and chronic renal infarcts, chronic nephritis (of fibrous and lympho-hystiocitic type), acute tubular necrosis and dystrophies (such as mineralization and hyalinization).