



ECVP/ESVP Summer School in Veterinary Pathology

Summer School 2014 - Gastrointestinal Tract

N14-300-5. An eighteen year-old mare with colic

This section of colon diffusely has villi separated by a lymphoplasmacytic, histiocytic infiltrate. Superficially, colonic enterocytes are lost but remaining epithelium are normal and no exudate or necrosis is at the mucosal surface (post mortem loss/artifact). Multifocally in the mucosa are clusters (coiled presumed) of nematode profiles. Cross sections show a nematode with a thick cuticle, platymyarian musculature, internal lateral ridges, cystic lateral cords and a digestive system with large, vacuolated cells (4th larval-stage cyathostomes). These parasites are within an acellular, 3-4u, multilocular structure or within a wall having polygonal, vacuolated cells (macrophages). Coiled, presumed younger, larvae with a smaller diameter and a simple cuboidal subcuticular layer are seen in chambers with foamy macrophages. Focally, the mucosa is disrupted and replaced by a depression with lining neutrophils, macrophages, vessels and a protein coagulum in its center (presumed excysted larva with focal ulcerated colitis). A wider zone of organized connective tissue with neutrophils, macrophages and a few lymphocytes make up the remaining cyst wall. Multiple areas of similar vascularized, histiocytic, neutrophilic lymphocytic expansions in the colonic submucosa are sites of larva presumably in or out of the plane of the present section.

MDx: Colon: Lymphohistiocytic, microfocally ulcerative or granulomatous colitis; developing and excysting nematode larva, Cyathostomes presumed.