

# Diagnostic Exercise

From The Davis-Thompson Foundation\*

Case #: 107 Month: October Year: 2018

**Contributors:** Mariana Martins Flores\*, DVM, MS, Doctor in Veterinary Pathology; Rafael Almeida Figuera\*, DVM, MS, Doctor in Veterinary Pathology. \*Laboratory of Veterinary Pathology, Universidade Federal de Santa Maria (UFSM), Santa Maria, Rio Grande do Sul, Brazil.

**Clinical History:** An adult, female spayed, mixed-breed domestic shorthair cat had a history of intense salivation and incoordination. The owner, who suspected poisoning, reported that the cat died a few days after the onset of the clinical signs. The cat came from a farm located in Rio Grande do Sul, Brazil, and had free access to the outdoors. It was submitted to necropsy.

**Necropsy Findings:** At necropsy, several discrete 0.5 to 0.7 cm skin perforations that oozed mild serous transudate were observed in the head and neck (Fig. 1). When the skin of the head was removed, more than 20 adult nematodes were observed inserted within the muscles of the head (Figs. 2 and 3). These parasites were located underneath the skin wounds, at the left side of the head, cranially to the left ear canal. Some parasites were also in the subcutaneous tissue caudal to the ear canal. All parasites were white, small (0.8 to 1.2 cm in length), filiform and round. There was no hemorrhage or exudate within the affected muscle, and the skull underneath the affected area was unremarkable as well. No other gross lesions were observed.



Figure 1



Figure 2



**Figure 3**

**Follow-Up Questions:** Morphologic diagnosis? Main cause(s)? Clinical significance?

\*The Diagnostic Exercises are an initiative of the **Latin Comparative Pathology Group (LCPG)**, the Latin American subdivision of The Davis-Thompson Foundation. These exercises are contributed by members and non-members from any country of residence. Consider submitting an exercise! A final document containing this material with answers and a brief discussion will be posted on the CL Davis website ([http://www.cldavis.org/diagnostic\\_exercises.html](http://www.cldavis.org/diagnostic_exercises.html)).

**Associate Editor for this Diagnostic Exercise:** Ingeborg Langohr

**Editor-in-Chief:** Vinicius Carreira