



# Diagnostic Exercise

## From The Davis-Thompson Foundation\*

Case #: **169** Month: **July** Year: **2021**

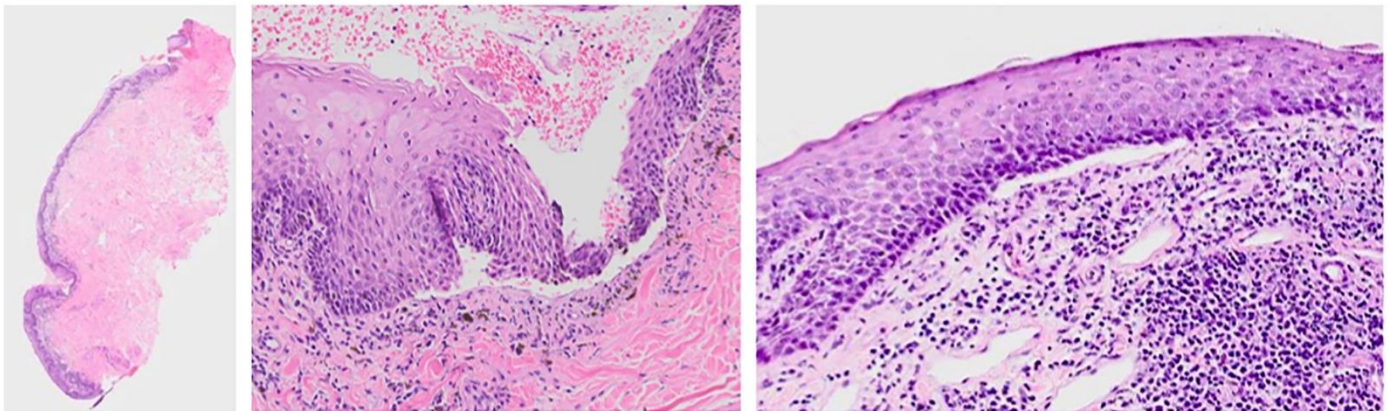
### *Question sheet*

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### **Clinical History:**

This is a biopsy from an 11-year-old, male, intact, Labrador retriever dog. The owners noticed waxing and waning halitosis approximately 6 months prior to presentation. The patient was taken to the referring veterinarian and prescribed antibiotics, then later, steroids. There was no improvement in the halitosis, and the patient developed increased signs of pain in the oral cavity. The patient began to exhibit ptyalism, and decreased interest in food unless soaked in water. At this time, the patient was referred to dental and oral surgery specialist service. The physical exam revealed severe, generalized gingival hyperemia. There was ulceration of the ventral tongue, and multifocal ulcers along oral mucosa bilaterally, most prominent along buccal oral mucosa in contact with the right and left maxillary canines and premolars. Punch biopsies of the affected oral mucosa were acquired, and a complete dental cleaning was performed.

### **Microscopic Images:**



### **Histopathologic Description:**

Three sections of buccal mucosa are examined in which much of the superficial submucosa is infiltrated by a dense lichenoid infiltrate of lymphocytes and plasma cells, as well as smaller numbers of neutrophils, mast cells, and histiocytes. A similar infiltrate surrounds deeper submucosal vessels. Subepithelial clefts are present multifocally throughout the samples, and occasionally, the epithelium is ulcerated.

completely. A moderate number of neutrophils are traversing the mucosal epithelium. Superficial vessels are lined by plump, reactive endothelial cells. Coarsely clumped melanin is present within the superficial submucosa of all sections.

**Follow-up questions:**

- *What is your morphological diagnosis?*
- *Given the physical exam and histologic findings, what are your differential diagnosis*
- *Given the physical exam and histologic findings, what are your differential diagnosis?*
- *What ancillary diagnostic tests would be helpful to diagnose the cause?*

**Associate Editor for this Diagnostic Exercise:** Patricia Pesavento

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\*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)).