



FORMAL PRESENTATION ABSTRACTS

TUESDAY, 3 NOVEMBER 2009

**THE ADVANTAGE OF ULTRASOUND TRAINING IN THE IDENTIFICATION AND SUBSEQUENT
LAPAROSCOPIC APPROACH OF AN ABDOMINAL MASS IN A PATAGONIAN SEA LION
(*OTARIA FLAVESCENS*)**

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In February 2008, during a routine ultrasonic exam, a mass was identified adjacent to the left kidney and ovary in a 7.5-year-old Patagonian sea lion (*Otaria flavescens*) held at the Parc Zoologique d'Amnéville in France. The mass, appearing to be an ovarian tumor, grew rapidly and its structure changed in the subsequent months, reaching a size of 9.6x5cm (3.744x1.95 in) in May. Because of this drastic change in a short time it was decided to perform an exploratory laparoscopy and possibly to excise it the next month so as not to have to face a difficult case during the busy summer period. The animal was voluntarily anesthetized with a combination of Medetomidine (20 microgr/kg) + Zoletil (Zolazepam+Tiletamine) (0.7 mg/kg), intubated and kept under Isoflurane gas anesthesia (0.6 – 1.5 % maintenance). The laparoscopy allowed a good visualization of the abdominal cavity and identification of the mass. However it was very difficult to confirm if it was attached to the left kidney or ovary due to all the connective tissues that had developed between the different organs. Excision of the tumor was started but because of the complexity of those connections and some bradycardia (50 BPM), it was decided to stop, wake the animal, and then further discuss the surgery details and contingency plans. Unfortunately the animal underwent cardiac arrest while still under anesthesia. Although saddened by the circumstance it was chosen to continue the laparoscopic exploration to gain knowledge and attempt the excision of the mass. The mass was excised from the left ovary, the right kidney was confirmed with an enlarged hiatus (as previously seen on ultrasound) and the lungs were observed through a trans-diaphragmatic approach and had a cottage cheese/omelette like aspect. The necropsy was performed the next morning and though the primary macroscopic impression was one of generalized tumoral colonization, compatible with lymphoma, the definite result came out as *Mycobacterium pinnipedii*, or sea lion tuberculosis. As the disease is being identified more and more in European parks, the team in Amnéville was very happy that the identification of some abnormality during routine husbandry exam, prompted them to make a pro-active decision and be aware of the presence of it in their facility in time to act preventively with the other animals.