

**Department of
Primary Industries**Elizabeth Macarthur Agricultural Institute
Woodbridge Rd Menangle**Our Ref:** M19-11316**Your Ref:** JESSICA**Prev. Ref:** LOCK**Laboratory Enquiries:****Invoice Enquiries:** 1800 675 623

1300 720 773

LABORATORY REPORT**To:** LLS NORTH COAST (LISMORE)
79 CONWAY STREET
LISMORE
2480 NSW AUSTRALIA
Attn: JESSICA LOCK
Fax: 02 6621 2928**Owner:** NORTHERN RIVERS
Property:**Job Type:** General Mammals
Marsupials
(kangaroos/koalas/wallabies/wombats)
WALLABY**Job Manager:** Erika Bunker**Date Sampled:** 31 Jul 2019**Date Sent:** 31 Jul 2019**Date Received:** 1 Aug 2019**Submitter Subject:** UNKNOWN AETIOLOGY**Samples Received:** VARIOUS**History****Age:** (Juvenile) **Sex:** Female **No. at Risk:** 0 **No. Sick:** 0 **No. Dead:** 1**Invoice payable by NSW Department of Primary Industries - Projects – RVO Contingency****Conclusion**

Pulmonary congestion and haemorrhage. Cause of neurological signs not determined.

Comments

6 Aug 19: The lung is severely congested, with acute haemorrhage. There is some lymphoid depletion. No significant findings in heart, liver and kidney. Erika Bunker

7 Aug 19: The changes in the cerebral cortex are subtle and equivocal; they could be a post mortem change, or represent a degree of cerebral astrocytic oedema. Significance in this wallaby is uncertain. There were no inflammatory or necrotising lesions or protozoal forms in the brain suggestive of toxoplasmosis. Erika Bunker

9 Aug 19: No evidence of organisms suggestive of Babesia seen in red blood cells of kidney smear. Erika Bunker

12 Aug 19: EMC PCR and Eubenberg Virus PCR negative. Erika Bunker

Erika Bunker
Veterinary Pathologist

EMAI Virology

Lab No.	Sample ID	Sample Desc	Viral PCR
0006	NO ID	Swab in PBGS 5 HEART	Negative for Eubenangee virus

Encephalomyocarditis Virus Real Time PCR

Lab No.	Sample ID	Sample Desc	Analysis	Encephalomyocarditis Virus qRT-PCR
0002	NO ID	Swab in PBGS 1 LIVER		Negative
0003	NO ID	Swab in PBGS 2 LUNG		Negative
0006	NO ID	Swab in PBGS 5 HEART		Negative

EMAI Histopathology

Lab No.	Sample ID	Sample Desc	Diff Quick Slide Examination
0021	NO ID	Smear 4 KIDNEY	see Histopathology report

EMAI Histopathology**WALLABY; SLIDE 1; HEART**

No significant findings.

WALLABY; SLIDE 1; LUNG

There is severe congestion with haemorrhage and blood in airways.

WALLABY; SLIDE 1; LYMPH NODE

Germinal centres are prominent and appear somewhat depleted and sometimes hyalinised.

WALLABY; SLIDE 2; LIVER

There is congestion of periacinar sinusoids.

WALLABY; SLIDE 2; KIDNEY

No significant findings.

Histopathology Report; Erika Bunker

6 August, 2019

EMAI Histopathology

WALLABY; SLIDE 3; CRANIAL BRAINSTEM (LEVEL THALAMUS) AND CEREBRUM

In the cerebrocortical grey matter, most prominent in the middle layer, are areas of mild vacuolation with increased perivascular and pericellular spaces and neuropil vacuoles; astrocytes often are noted adjacent to neurones or capillaries and appear swollen with vesicular nuclei.

WALLABY; SLIDE 4; MEDULLA (OBEX)

No significant findings.

WALLABY; SLIDE 4; CAUDAL CEREBELLAR PEDUNCLES

No significant findings.

WALLABY; SLIDE 4; MIDBRAIN

No significant findings.

WALLABY; SLIDE 5; CEREBRUM x2

In the cerebrocortical grey matter, most prominent in the middle layer, are areas of mild vacuolation with increased perivascular and pericellular spaces and neuropil vacuoles; astrocytes often are noted adjacent to neurones or capillaries and appear swollen with vesicular nuclei.

WALLABY; SLIDE 5; CEREBELLUM

Astrocytes in the Purkinje cell layer appear numerous and prominent.

Histopathology Report; Erika Bunker

7 August, 2019

EMAI Histopathology

WALLABY; KIDNEY IMPRESSION SMEAR (DIFF QUICK STAIN)

Good quality smear. No organisms consistent with Babesia detected in red blood cells.

Histopathology Report; Erika Bunker

9 August, 2019

Copies

LLS TEAM LEADER Ian Poe (email: ian.poe@lls.nsw.gov.au)

Paul Freeman (email: paul.freeman@dpi.nsw.gov.au)

WILDLIFE (email: wildlife.labresults@dpi.nsw.gov.au)