CMHD Pathology Report

CMHD Pathology Core
Toronto Centre for Phenogenomics
25 Orde St. 3rd fl.
Toronto, Ont. M5T 3H7
Tel.(416) 586-8375
Fax (416) 586-5993

contact: Dr. Susan Newbigging
email: newbigging@lunenfeld.ca

Principle Investigator: Dr. Colin McKerlie
ICSIG
Institute: Sick Kids
Address:

Mouse Genetics Project
Wellcome Trust Sanger Institute
Wellcome Trust Genome Campus
Hinxton, Cambridge
CB10 1SA
UK

email: MGPenquiries@sanger.ac.uk
Mouse Portal
Europhenome

ReportID: Report Date: November 23, 2011
Pathologist: H. Adissu

CMHD LabID: N11-369

Relevant History:
(Plasma Chemistry; Micronuclei) Decreased circulating LDL cholesterol level, decreased ALT and ALP, increased chromosomal stability

---

AnimalID: M00200847 Tbc1d10a hom

Histopathology Findings:

eye (MA:0000261)

Histopath Description:
One of the eye balls is small (nearly 2/3 of the other). Excess retinal fold are present at the posterior end and extending through the orbit nerve outlet. There is a unilateral mild retinal fold at the anterior aspect as well. The retinal layers are well maintained and there are no rosset formations.

Morphological Diagnosis:
Distribution: Unilateral; **Severity:** severe; **MPATH Diagnosis:** developmental and structural abnormality MPATH:55

Definitive Diagnosis:
Ocular hypoplasia and secondary retinal folds/dysplasia

Histopathology Comments:
Retinal folds within an otherwise normal retina together with small globe probably reflect inequity in growth rate between the retina and the outer layer of the optic cup (choroid and sclera).

brain (MA:0000168)

Histopath Description:
There is a mild enlargement of the lateral ventricle.

Morphological Diagnosis:
Severity: mild; **MPATH Diagnosis:** hydrocephalus MPATH:639

Definitive Diagnosis:
hydrocephalus, lateral ventricle

Histopathology Comments:
Variable degree of hydrocephalus is observed in a proportion of wild type C57 Black 6 mice.

AnimalID: M00200848 Tbc1d10a hom

Tissue Preservation and Staining:
Thyroid gland is not present in section

Histopathology Findings:

eye (MA:0000261)

Histopath Description:
One of the eye balls is small (nearly 2/3 of the other). Excess retinal fold are present at the

posterior end and extending through the orbit nerve outlet. There is a unilateral mild retinal fold at the anterior aspect as well. The retinal layers are well maintained and there are no rosset formations.

Morphological Diagnosis:
Distribution: Unilateral; **Severity:** severe; **MPATH Diagnosis:** developmental and structural abnormality MPATH:55

Definitive Diagnosis:
Ocular hypoplasia and secondary retinal folds/dysplasia

Histopathology Comments:
Retinal folds within an otherwise normal retina together with small globe probably reflect inequity in growth rate between the retina and the outer layer of the optic cup (choroid and sclera).

Summary:
Hepatic lipidosis not seen in this line

AnimalID: M00200850 Tbc1d10a hom

Histopathology Findings:

eye (MA:0000261)

Histopath Description:
One of the eye balls is small (nearly 2/3 of the other). Excess retinal fold are present at the posterior end and extending through the orbit nerve outlet. There is a unilateral mild retinal fold at the anterior aspect as well. The retinal layers are well maintained and there are no rosset formations.

Morphological Diagnosis:
Distribution: Unilateral; **Severity:** severe; **MPATH Diagnosis:** developmental and structural abnormality MPATH:55

Definitive Diagnosis:
Ocular hypoplasia and secondary retinal folds/dysplasia

Histopathology Comments:
Retinal folds within an otherwise normal retina together with small globe probably reflect inequity in growth rate between the retina and the outer layer of the optic cup (choroid and sclera).

AnimalID: M00200851 Tbc1d10a hom

Histopathology Findings:

eye (MA:0000261)

Histopath Description:
One of the eye balls is small (nearly 2/3 of the other). Excess retinal fold are present at the posterior end and extending through the orbit nerve outlet. There is a unilateral mild retinal fold at the anterior aspect as well. The retinal layers are well maintained and there are no rosset formations.

Morphological Diagnosis:
Distribution: Unilateral; **Severity:** severe; **MPATH Diagnosis:** developmental and structural abnormality MPATH:55

Definitive Diagnosis:
Ocular hypoplasia and secondary retinal folds/dysplasia

Histopathology Comments:
Retinal folds within an otherwise normal retina together with small globe probably reflect inequity in growth rate between the retina and the outer layer of the optic cup (choroid and sclera).

brain (MA:0000168)

Histopath Description:
There is a mild enlargement of the lateral ventricle.

Morphological Diagnosis:
Severity: mild; **MPATH Diagnosis:** hydrocephalus MPATH:639

Definitive Diagnosis:
hydrocephalus, lateral ventricle

Histopathology Comments:

Variable degree of hydrocephalus is observed in a proportion of wild type C57 Black 6 mice.

liver (MA:0000358)

Histopath Description:
There is diffuse hepatic lipidosis.

Morphological Diagnosis:
Distribution: Diffuse; **Severity:** severe; **MPATH Diagnosis:** lipid deposition MPATH:42

Definitive Diagnosis:
Hepatic lipisosis

Report Summary and Recommendation:
Hepatic lipidosis is minimal or absent in three of the mice in this line

Liver - lipid depletion: MPATH:52