Gross Morphology Placenta E12.5 IMPC_GP M_001

Purpose

To assess visible morphological defects in E12.5 placentas from lethal strains

Experimental Design

- Set up timed matings with heterozygous mice
- Day 0 is defined as the midpoint of the prior dark cycle following the identification of a copulation plug.
- Minimum number of animals: 1 mutant of any sex
- **Age at test:** E12.5
- Capture gross images (optional)
- Collect tissue and genotype embryos.

Procedure

- 1. Set up timed mating with heterozygous animals. Dissect at a consistent time and collect >=2 placentas from homozygote embryos. Coordination with viability screen is at the centres discretion.
- 2. Assess placentas according to Gross Morphology parameters.
- 3. Generate gross images of placentas (optional) with scored defects and control placentas.
- 4. Collect tissue for genotyping
- 5. Process placentas for Histopathology, or other imaging (OPTIONAL depending on center pipeline)
- 6. Scores will be shown per placenta and split by zygosity.

Notes

All genotypes should be collected using validated assays.

Y chromosome assay required for X-linked lethal strains.

Placentas may be processed for Histopathology or 3D Imaging

Parameters and Metadata

Placenta Morphology IMPC_GPM_002_001 | v1.0

simpleParameter

Req. Analysis: false Req. Upload: false Is Annotated: true

Options: unobservable, abnormal, normal,

Comment on image IMPC_GPM_006_001 | v1.0

simpleParameter

Req. Analysis: false Req. Upload: false Is Annotated: false

Images IMPC_GPM_007_001 | v1.0

seriesMediaParameter

Req. Analysis: false Req. Upload: false Is Annotated: false

Increments: Minimum 1

Placenta Vasculature IMPC_GPM_003_001 | v1.0

Req. Analysis: false **Req. Upload:** false **Is Annotated:** true Options: abnormal, unobservable, normal, Placenta Size IMPC_GPM_004_001 | v1.0 simpleParameter Req. Analysis: false Req. Upload: false Is Annotated: true Options: unobservable, abnormal, normal, Umbilical cord morphology IMPC_GPM_005_001 | v1.0 simpleParameter Req. Analysis: false Req. Upload: false Is Annotated: true Options: abnormal, unobservable, normal,

Placenta color IMPC GPM 018 001 | v1.0

simpleParameter

Req. Analysis: false Req. Upload: false Is Annotated: true

Options: abnormal, normal, unobservable,

Time of dark cycle end IMPC_GPM_016_001 v1.0 procedureMetadata				
Req. Analysis: false	Req. Upload: true	Is Annotated: false		
Somite Stage IMPC_GPM_014_001 v1.1 procedureMetadata				
Req. Analysis: false	Req. Upload: false	Is Annotated: false		
Time of dark cycle start IMPC_GPM_015_001 v1.0 procedureMetadata				
Req. Analysis: false	Req. Upload: true	Is Annotated: false		
Equipment Manufacturer IMPC_GPM_010_001 v1.0 procedureMetadata				
Req. Analysis: false	Req. Upload: true	Is Annotated: false		

Experimenter ID IMPC_GPM_008_001 | v1.0

procedureMetadata

Req. Analysis: false	Req. Upload: true	Is Annotated: false		
Equipment ID IMPC_GPM_009_001 v1.0 procedureMetadata				
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Fixative IMPC_GPM_012_001 v1.0 procedureMetadata				
Req. Analysis: false	Req. Upload: true	Is Annotated: false		
Date equipment last calibrated IMPC_GPM_017_001 v1.1 procedureMetadata				
Req. Analysis: false	Req. Upload: false	Is Annotated: false		

Req. Analysis: false	Req. Upload: false	Is Annotated: true		
Options: unobservable, abnormal, normal,				
Time of Dissection IMPC_GPM_013_001 v1.0 procedureMetadata				
Req. Analysis: false	Req. Upload: true	Is Annotated: false		
Equipment Model IMPC_GPM_011_001 v1.0				
procedureMetadata				
Req. Analysis: false	Req. Upload: true	Is Annotated: false		