

Resource Summary Report

Generated by [dkNET](#) on Sep 17, 2026

B6J.129-Atoh7^{tm1Gla}/Mmucd

RRID:MMRRC_042298-UCD

Type: Organism

Proper Citation

RRID:MMRRC_042298-UCD

Organism Information

URL: https://www.mmrrc.org/catalog/sds.php?mmrrc_id=42298

Proper Citation: RRID:MMRRC_042298-UCD

Description: Mus musculus with name B6J.129-Atoh7^{tm1Gla}/Mmucd from MMRRC.

Species: Mus musculus

Notes: Research areas: Cell Biology, Developmental Biology, Models for Human Disease, Neurobiology, Research Tools, Sensorineural; Mutation Type: Targeted Mutation ; Collection:

Phenotype: abnormal retinal cone cell morphology [MP:0001006]| abnormal eye development [MP:0001286]| abnormal retina morphology [MP:0001325]| abnormal optic nerve morphology [MP:0001330]| abnormal optic nerve innervation [MP:0001332]| absent optic nerve [MP:0001333]| absent optic tract [MP:0001334]| abnormal blood vessel morphology [MP:0001614]| abnormal retinal vasculature morphology [MP:0002792]| abnormal cell cycle [MP:0003077]| abnormal optic vesicle formation [MP:0003425]| abnormal amacrine cell morphology [MP:0005240]| abnormal retinal ganglion layer morphology [MP:0005241]| abnormal eye electrophysiology [MP:0005551]| abnormal retinal bipolar cell morphology [MP:0006073]| abnormal retinal rod bipolar cell morphology [MP:0006074]| abnormal retinal cone bipolar cell morphology [MP:0006075]| abnormal retinal nerve fiber layer morphology [MP:0006303]| absent retinal ganglion cell [MP:0008068]| increased retinal cone cell number [MP:0008445]| decreased retinal rod cell number [MP:0008453]| absent retinal ganglion layer [MP:0008510]| thin retinal inner nuclear layer [MP:0008511]| thin retinal inner plexiform layer [MP:0008513]| thin retinal outer nuclear layer [MP:0008515]| thin retinal outer plexiform layer [MP:0008519]| decreased total retina thickness [MP:0011965]| abnormal circadian behavior entrainment [MP:0020476]

Affected Gene: Atoh7

Catalog Number: 042298-UCD

Background: Targeted Mutation

Database: Mutant Mouse Resource and Research Center (MMRRC)

Database Abbreviation: MMRRC

Alternate IDs: MMRRC_42298-UCD, MMRRC_042298, MMRRC_42298

Organism Name: B6J.129-*Atoh7^{tm1Gla}*/Mmucd

Record Creation Time: 20230308T055224+0000

Record Last Update: 20260912T135010+0000

Ratings and Alerts

No rating or validation information has been found for B6J.129-*Atoh7^{tm1Gla}*/Mmucd.

No alerts have been found for B6J.129-*Atoh7^{tm1Gla}*/Mmucd.

Data and Source Information

Source: [Integrated Animals](#)

Source Database: Mutant Mouse Resource and Research Center (MMRRC)

Usage and Citation Metrics

We found 6 mentions in open access literature.

Listed below are recent publications. The full list is available at [dkNET](#) .

Kozlowski C, et al. (2024) Retinal neurons establish mosaic patterning by excluding homotypic somata from their dendritic territories. *Cell reports*, 43(8), 114615.

Kozlowski C, et al. (2023) Retinal neurons establish mosaic patterning by excluding homotypic somata from their dendritic territory. *bioRxiv : the preprint server for biology*.

Somaiya RD, et al. (2022) Sonic hedgehog-dependent recruitment of GABAergic interneurons into the developing visual thalamus. *eLife*, 11.

Whyland KL, et al. (2022) The parabigeminal nucleus is a source of "retinogeniculate replacement terminals" in mice that lack retinofugal input. *The Journal of comparative neurology*, 530(18), 3179.

Sabbagh U, et al. (2018) Distribution and development of molecularly distinct perineuronal nets in visual thalamus. *Journal of neurochemistry*, 147(5), 626.

Monavarfeshani A, et al. (2018) LRRTM1 underlies synaptic convergence in visual thalamus. *eLife*, 7.