

Resource Summary Report

Generated by [NIF](#) on Aug 19, 2026

STOCK Prkaa2^{tm1.1Sjm}/J

RRID:IMSR_JAX:014142

Type: Organism

Proper Citation

RRID:IMSR_JAX:014142

Organism Information

URL: <https://www.jax.org/strain/014142>

Proper Citation: RRID:IMSR_JAX:014142

Description: Mus musculus with name STOCK Prkaa2^{tm1.1Sjm}/J from IMSR.

Species: Mus musculus

Synonyms: B6.Cg-Prkaa2/J. B6(Cg)-Prkaa2/J

Notes: gene symbol note: protein kinase; AMP-activated; alpha 2 catalytic subunit; mutant stock: Prkaa2

Affected Gene: protein kinase; AMP-activated; alpha 2 catalytic subunit

Genomic Alteration: targeted mutation 1.1; Sean J Morrison

Catalog Number: JAX:014142

Database: JAX Mice and Services

Database Abbreviation: JAX

Availability: sperm

Organism Name: STOCK Prkaa2^{tm1.1Sjm}/J

Record Creation Time: 20250513T053727+0000

Record Last Update: 20260815T050638+0000

Ratings and Alerts

No rating or validation information has been found for STOCK Prkaa2^{tm1.1Sjm}/J.

No alerts have been found for STOCK Prkaa2^{tm1.1Sjm/J}.

Data and Source Information

Source: [Integrated Animals](#)

Source Database: JAX Mice and Services

Usage and Citation Metrics

We found 7 mentions in open access literature.

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

Mao Y, et al. (2026) AMPK^{??2} signals amino acid insufficiency to inhibit protein synthesis. Cell metabolism, 38(1), 192.

Qu Q, et al. (2024) Lithocholic acid phenocopies anti-ageing effects of calorie restriction. Nature.

Qu Q, et al. (2024) Lithocholic acid binds TULP3 to activate sirtuins and AMPK to slow down ageing. Nature.

Malawsky DS, et al. (2023) Chronic AMPK inactivation slows SHH medulloblastoma progression by inhibiting mTORC1 signaling and depleting tumor stem cells. iScience, 26(12), 108443.

Miao ZF, et al. (2020) A Metformin-Responsive Metabolic Pathway Controls Distinct Steps in Gastric Progenitor Fate Decisions and Maturation. Cell stem cell, 26(6), 910.

Timilshina M, et al. (2019) Activation of Mevalonate Pathway via LKB1 Is Essential for Stability of Treg Cells. Cell reports, 27(10), 2948.

Cokorinos EC, et al. (2017) Activation of Skeletal Muscle AMPK Promotes Glucose Disposal and Glucose Lowering in Non-human Primates and Mice. Cell metabolism, 25(5), 1147.