

Resource Summary Report

Generated by [RRID](#) on Aug 29, 2026

pMXs-Oct3/4

RRID:Addgene_13366

Type: Plasmid

Proper Citation

RRID:Addgene_13366

Plasmid Information

URL: <http://www.addgene.org/13366>

Proper Citation: RRID:Addgene_13366

Insert Name: POU domain, class 5, transcription factor 1

Organism: Mus musculus

Bacterial Resistance: Ampicillin

Defining Citation: [PMID:16904174](#)

Vector Backbone Description: Backbone Size:4600; Vector Backbone:pMXs; Vector Types:Mammalian Expression, Retroviral; Bacterial Resistance:Ampicillin

Comments: The sequence of primer pMX-S1811 is GAC GGC ATC GCA GCT TGG ATA CAC. Mouse Oct3/4 includes C91T mutation. We found that EST clones including substitution C91 to T in NCBI database. So we believe that these substitutions are ascribed to SNPs. CJ069184 RIKEN full-length enriched mouse cDNA library, CRL-2070 CJ069414 RIKEN full-length enriched mouse cDNA library, CRL-2070 As we have shown in the previous our papers, these changes do not affect biological functions of the transcription factors during reprogramming.

Plasmid Name: pMXs-Oct3/4

Relevant Mutation: None

Record Creation Time: 20220422T221740+0000

Record Last Update: 20260829T075532+0000

Ratings and Alerts

No rating or validation information has been found for pMXs-Oct3/4.

No alerts have been found for pMXs-Oct3/4.

Data and Source Information

Source: [Addgene](#)

Usage and Citation Metrics

We found 81 mentions in open access literature.

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

Araki R, et al. (2024) iPS cell generation-associated point mutations include many C > T substitutions via different cytosine modification mechanisms. Nature communications, 15(1), 4946.

Campos-Iglesias D, et al. (2024) Loss of ADAM29 does not affect viability and fertility in mice but improves wound healing. iScience, 27(6), 110135.

Kanegi R, et al. (2023) Generation, characterization, and differentiation of induced pluripotent stem-like cells in the domestic cat. The Journal of reproduction and development, 69(6), 317.

Sato S, et al. (2023) The circadian clock CRY1 regulates pluripotent stem cell identity and somatic cell reprogramming. Cell reports, 42(6), 112590.

Zhao Q, et al. (2022) BNIP3-dependent mitophagy safeguards ESC genomic integrity via preventing oxidative stress-induced DNA damage and protecting homologous recombination. Cell death & disease, 13(11), 976.

Liu K, et al. (2022) BNIP3 (BCL2 interacting protein 3) regulates pluripotency by modulating mitochondrial homeostasis via mitophagy. Cell death & disease, 13(4), 334.

Khodeer S, et al. (2022) ALKBH5 regulates somatic cell reprogramming in a phase-specific manner. Journal of cell science, 135(11).

Fuentes-Iglesias A, et al. (2022) Detecting and Modulating ER Stress to Improve Generation of Induced Pluripotent Stem Cells. Methods in molecular biology (Clifton, N.J.), 2454, 743.

Sun R, et al. (2022) Identification of microRNAs related with neural germ layer lineage-specific progenitors during reprogramming. Journal of molecular histology, 53(4), 623.

Ying Z, et al. (2021) Protocols for analysis of mitochondrial permeability transition pore opening in mouse somatic cell reprogramming. STAR protocols, 2(2), 100568.

Salti A, et al. (2021) High Glycolytic Activity Enhances Stem Cell Reprogramming of Fahd1-KO Mouse Embryonic Fibroblasts. Cells, 10(8).

- Cota P, et al. (2020) Cytokine Directed Chondroblast Trans-Differentiation: JAK Inhibition Facilitates Direct Reprogramming of Fibroblasts to Chondroblasts. *Cells*, 9(1).
- Li Y, et al. (2020) The function of a heterozygous p53 mutation in a Li-Fraumeni syndrome patient. *PloS one*, 15(6), e0234262.
- Kim SHL, et al. (2020) Ectopic transient overexpression of OCT-4 facilitates BMP4-induced osteogenic transdifferentiation of human umbilical vein endothelial cells. *Journal of tissue engineering*, 11, 2041731420909208.
- Liu H, et al. (2020) The Effects of Daxx Knockout on Pluripotency and Differentiation of Mouse Induced Pluripotent Stem Cells. *Cellular reprogramming*, 22(2), 90.
- Barbuti PA, et al. (2020) Generation of two iPS cell lines (HIHDNDi001-A and HIHDNDi001-B) from a Parkinson's disease patient carrying the heterozygous p.A30P mutation in SNCA. *Stem cell research*, 48, 101951.
- Lu CS, et al. (2020) Oct4 promotes M2 macrophage polarization through upregulation of macrophage colony-stimulating factor in lung cancer. *Journal of hematology & oncology*, 13(1), 62.
- Liu J, et al. (2020) YTHDF2/3 Are Required for Somatic Reprogramming through Different RNA Deadenylation Pathways. *Cell reports*, 32(10), 108120.
- Wong AP, et al. (2019) Conversion of human and mouse fibroblasts into lung-like epithelial cells. *Scientific reports*, 9(1), 9027.
- Lawrence M, et al. (2019) ZMYM2 inhibits NANOG-mediated reprogramming. *Wellcome open research*, 4, 88.