

Hnf4a-Flox

Nomenclature	C57BL/6Smoc- <i>Hnf4a</i> ^{tm1(flox)Smoc}
Cat. NO.	NM-CKO-190062
Strain State	Sperm cryopreservation

Gene Summary

Gene Symbol Hnf4a	Synonyms	Hnf4; HNF-4; MODY1; Nr2a1; Tcf14; TCF-14; Hnf4alpha
	NCBI ID	15378
	MGI ID	109128
	Ensembl ID	ENSMUSG00000017950
	Human Ortholog	HNF4A

Model Description

These Hnf4a flox mice possess loxP sites flanking exon 2. When crossed with a Cre recombinase-expressing strain, this strain is useful in eliminating tissue-specific conditional expression of the gene.

Research Application: Transcriptional regulator, insulin secretion related

*Literature published using this strain should indicate: Hnf4a-Flox mice (Cat. NO. NM-CKO-190062) were purchased from Shanghai Model Organisms Center, Inc..

Disease Connection

Fanconi Syndrome	Phenotype(s)	MGI:6392256 Note: The expected phenotype(s) may be observed in the above-mentioned mice that bred with Six2-cre mice.
	Reference(s)	Marable SS, Chung E, Adam M, Potter SS, Park JS, Hnf4a deletion in the mouse kidney phenocopies Fanconi renotubular syndrome. JCI Insight. 2018 Jul 25;3(14)

Maturity-Onset Diabetes Of The Young Type 1	Phenotype(s)	MGI:3653173 Note: The expected phenotype(s) may be observed in the above-mentioned mice that bred with Ins2-cre mice.
	Reference(s)	Miura A, Yamagata K, Kakei M, Hatakeyama H, Takahashi N, Fukui K, Nammo T, Yoneda K, Inoue Y, Sladek FM, Magnuson MA, Kasai H, Miyagawa J, Gonzalez FJ, Shimomura I, Hepatocyte nuclear factor-4alpha is essential for glucose-stimulated insulin secretion by pancreatic beta-cells. J Biol Chem. 2006 Feb 24;281(8):5246-57

Validation Data

No data