

## Ntrk2-CreERT2

Nomenclature C57BL/6Smoc-*Ntrk2*<sup>em1(CreERT2-WPRE-polyA)Smoc</sup>

**Cat. NO.** NM-KI-200146

**Strain State** Sperm cryopreservation

## **Gene Summary**

Gene Symbol Ntrk2	Synonyms	Tkrb; trkB; trk-B; GP145- TrkB/GP95-TrkB
	NCBI ID	<u>18212</u>
	MGI ID	<u>97384</u>
	Ensembl ID	ENSMUSG00000055254
	Human Ortholog	NTRK2

## **Model Description**

A CreERT2-WPRE-polyA expression cassette was knocked into the Ntrk2 gene start codon site. Ntrk2 encodes the tropomyosin receptor kinase B (TrkB), transmission through which neurotrophic factors modify differentiation, plasticity, and synaptic transmission. When these Ntrk2-CreERT2 mice are bred with mice containing a loxP-flanked sequence of interest, tamoxifen-inducible, Cre-mediated recombination will result in deletion of the flanked sequences in Ntrk2 expressing cells.

**Research Application**: Cre recombinase tool; Neuroscience

\*Literature published using this strain should indicate: Ntrk2-CreERT2 mice (Cat. NO. NM-KI-200146) were purchased from Shanghai Model Organisms Center, Inc..

## **Validation Data**



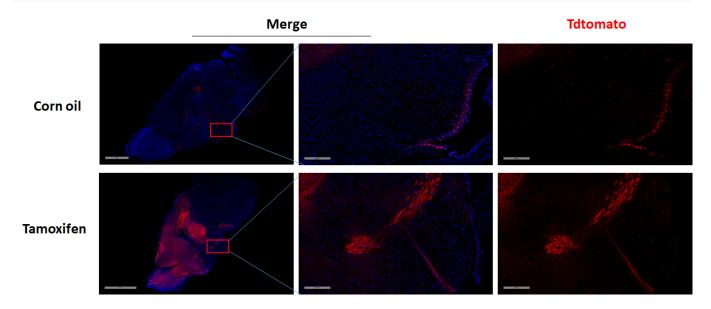


Fig. 1 CreERT2-mediated recombination in the multiple brain regions of Ntrk2-CreERT2; Rosa26-tdTomato mice after tamoxifen treatment.

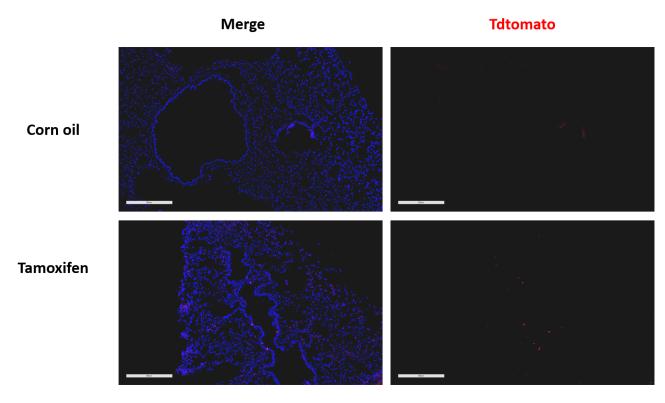


Fig. 2 CreERT2-mediated recombination in individual cells in the lungs of Ntrk2-CreERT2; Rosa26-tdTomato mice after tamoxifen treatment.



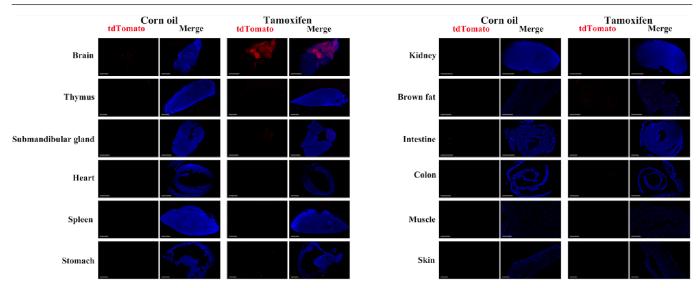


Fig. 3 Tdtomato was also abundantly expressed in brown fat, and expressed in thymus, salivary gland, spleen, large intestine, stomach and skin. There was a small amount of expression in kidney, and no expression in the heart, small intestine and muscle. (For more information please contact: 400-728-0660.)