

## Anti- Slc22a14 antibody, rabbit polyclonal, KO Validated

73-067 50 µg

**Storage:** Ship at 4°C and store at -20°C

**Validation:** Knock-out mice

**Reactivity:** Mouse. Does not react with human

### Applications:

1. Western blotting (1-2 µg/ml)
2. Immunofluorescence staining (10 µg/ml)
3. Immunohistochemistry-Paraffin (10 µg/ml)

**Immunogen:** Synthetic peptide corresponding to mouse Slc22a14 protein aa 615-629, PKMDLPVQSLKAQPP, conjugated with KLH.

**Form:** 1 mg/ml in PBS, 50% glycerol and 0.09% sodium azide.

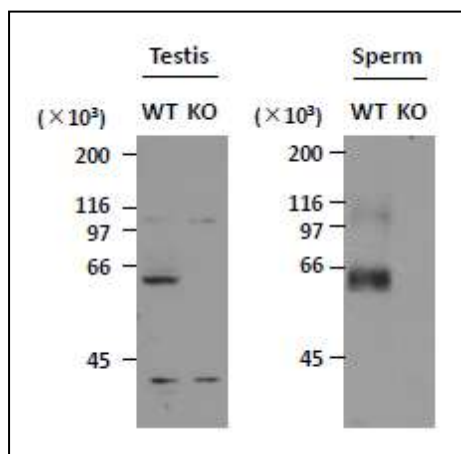
**Purity:** Affinity purified with immunogen peptide.

**Key words:** Sperm, Male fertility, Germline development, Reproductive biology

**Function:** Solute carrier 22a14 (Slc22a14) is a spermatogenesis-associated transmembrane protein and crucial for sperm motility and male fertility. It plays a pivotal role in normal flagellar structure, motility and fertility in mouse spermatozoa.

**Molecular mass:** 71,009 with 629 amino acids.

**Database Links:** UniProtKB [Q497L9](#) (mouse), Entrez Gene [382113](#) (mouse)



**Fig.1. Identification of Slc22a14 protein in lysates of mouse testis and sperm by western blotting with this antibody.**

The primary antibody was used at 1 µg/ml.

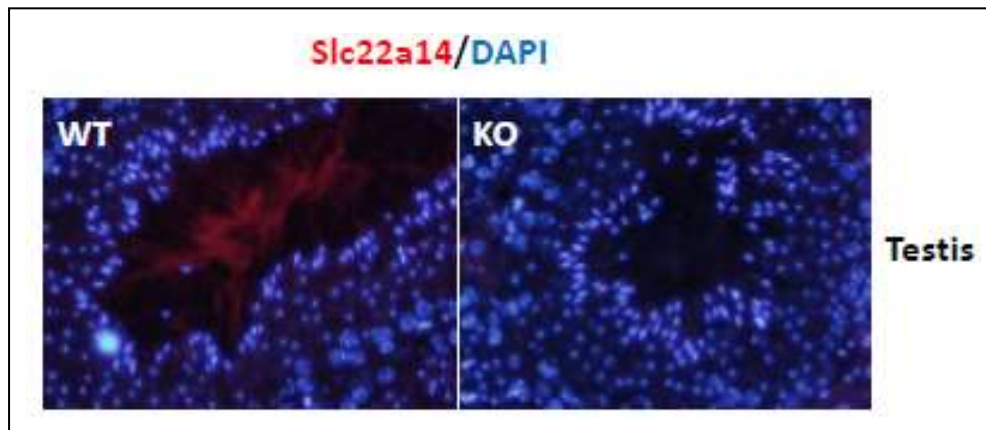
WT: Wild-type mouse

KO: Knock-out mouse



**Fig.2 Immunofluorescence staining of Slc22a14 protein in mouse spermatozoa from cauda epididymis.**

Anti-Slc22a14 antibody was used at 10 ug/ml (red). Nucleus was stained with DAPI (blue). Slc22a14 is predominantly localised to the principal piece



**Fig.3 Immunohistological staining of Slc22a14 protein in mouse testis.**

The anti-Slc22a14 antibody was used at 10 ug/ml (red). Nuclei were stained with DAPI (blue).

WT: Wild-type mouse

KO: Knock-out mouse.

**Reference:** This antibody was described and used in the following publication..

Maruyama S. et al (2016). A critical role of solute carrier 22a14 in sperm motility and male fertility in mice. [Sci Rep.](https://doi.org/10.1038/srep36468) 6:36468. doi: 10.1038/srep36468. PMID:[PMC5095606](https://pubmed.ncbi.nlm.nih.gov/27050956/)