

Product datasheet

VGLUT1 MOUSE MONOCLONAL ANTIBODY (MCKA1)

SKU: MM-0016-P

100 µg

OVERVIEW

Clonality:

Monoclonal

Host:

Mouse

Reactivity:

Human, Rat

Application:

IHC, ICC, ELISA, WB

Target:

Vglut1

Target background:

Glutamate is the major excitatory neurotransmitter in the central nervous system of mammals. Vesicular glutamate transporters (VGluts) are responsible for glutamate transport from the brain into native synaptic vesicles. The level of expression of the three known transporters in the adult brain determines the amount of glutamate that is loaded into vesicles and released.

Target alias:

Vesicular glutamate transporter 1, VGLUT1, Brain-specific Na(+)-dependent inorganic phosphate cotransporter, Solute carrier family 17 member 7

Immunogen:

Full Length VGlut1

Specificity:

A highly specific and sensitive antibody for VGlut1. The antibody reveals the presence of the 58 kDa VGlut 1 protein on western blot of homogenized cerebral cortex cells lysates. It shows very precise reaction with VGlut1 epitope of human mid-frontal gyrus brain tissue in immunohistochemistry.

Clone ID:

McKA1

Isotype:

IgG2a

Preservative:

None

Format:

Lyophilized protein G purified in PBS pH7.4

Recommend starting dilution:

If reconstituted with deionized water in 100 μ L: ICC / IHC 1:5,000. Optimal dilution has to be determined by the user

Limitations:

Research Use Only

References:

- 1.-Geissler M - Primary hippocampal neurons, which lack four crucial extracellular matrix molecules, display abnormalities of synaptic structure and function and s...
- 2.-Allard S - Correlation of cognitive performance and morphological changes in neocortical pyramidal neurons in aging.
- 3.-Seo S - Spatial learning-induced accumulation of agmatine and glutamate at hippocampal CA1 synaptic terminals.
- 4.-Leon WC - A novel transgenic rat model with a full Alzheimer's-like amyloid pathology displays pre-plaque intracellular amyloid-beta-associated cognitive imp...
- 5.-Ellegood J - Anatomical phenotyping in a mouse model of fragile X syndrome with magnetic resonance imaging.
- 6.-Bell KF - ADAM-10 over-expression increases cortical synaptogenesis.
- 7.-Bell KF - The amyloid pathology progresses in a neurotransmitter-specific manner.

Storage:

Lyophilized antibodies can be kept at 4°C for up to 3 months and should be kept at -20°C for long-term storage (2 years). To avoid freeze-thaw cycles, reconstituted antibodies should be aliquoted before freezing for long-term (1 year) storage (-80°C) or kept at 4°C for short-term usage (2 months). For maximum recovery of product, centrifuge the original vial prior to removing the cap. Further dilutions can be made with the assay buffer. After the maximum long-term storage period (2 years lyophilized or 1 year reconstituted) antibodies should be tested in your assay with a standard sample to verify if you have noticed any decrease in their efficacy.

Image: