

PSAP Recombinant monoclonal antibody

Catalog Number: 86043-3-RR

Basic Information

Catalog Number:

86043-3-RR

Source:

Rabbit

Isotype:

IgG

Immunogen Catalog Number:

EG3155

GenBank Accession Number:

NM_011179.3

GeneID (NCBI):

19156

UNIPROT ID:

NP_035309.3

Full Name:

prosaposin

Calculated MW:

61 kDa

Observed MW:

65-70 kDa

Purification Method:

Protein A purification

CloneNo.:

250312B12

Recommended Dilutions:

WB: 1:2000-1:10000

IF/ICC: 1:200-1:800

Applications

Tested Applications:

WB, IF/ICC, ELISA

Species Specificity:

mouse, rat

Positive Controls:

WB: NIH/3T3 cells, RAW 264.7 cells, C6 cells, mouse cerebellum tissue, rat testis tissue, mouse testis tissue

IF/ICC: NIH/3T3 cells,

Background Information

Prosaposin (PSAP) is also named as Sulfated glycoprotein 1 (SGP-1). PSAP is a secreted neurotrophic factor and a lysosomal protein serving as the precursor of saposins (A-D), which are cofactors for hydrolases of sphingolipids (PMID: 25130661, PMID: 31220974). PSAP modulates glycosphingolipid metabolism and variants have been linked to Parkinson's disease (PD) (PMID: 37726325). As a dual-function protein, PSAP is a lysosome-associated protein that participates in a variety of cellular processes. In the lysosome, PSAP is processed to activate enzymes that degrade lipids. PSAP proteins located extracellularly are involved in cancer progression, such as proliferation and tumor death suppression signaling (PMID: 39405903). Prosaposin (PSAP) has two forms: a precursor and a secreted form. The secreted form has neurotrophic, myelinotrophic, and myotrophic properties. The precursor form is a precursor protein of saposins A-D (PMID: 33242172). Both human and mouse prosaposin are 65-70 kDa proteins cleaved in the lysosomes into four 10-15 kDa proteins designated saposins A, B, C and D (PMID: 8573994). Sulfated glycoprotein-1 (prosaposin) exists in 2 forms: a 65 kDa form targeted to lysosomes and a post-translationally modified to the 70 kDa form secreted extracellularly (PMID: 8593668).

Storage

Storage:

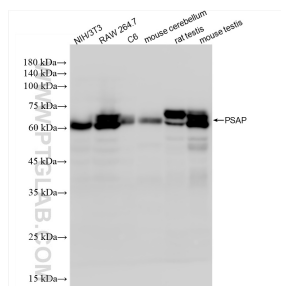
Store at -20°C. Stable for one year after shipment.

Storage Buffer:

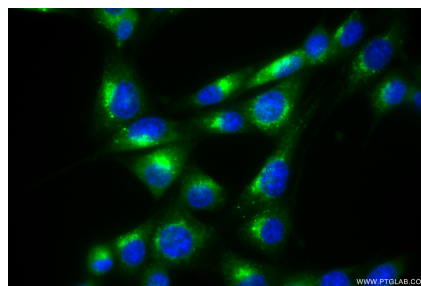
PBS with 0.02% sodium azide and 50% glycerol, pH7.3

Aliquoting is unnecessary for -20°C storage

Selected Validation Data



Various lysates were subjected to SDS PAGE followed by western blot with 86043-3-RR (Psap antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of (-20°C Methanol) fixed NIH/3T3 cells using PSAP antibody (86043-3-RR, Clone: 250312B12) at dilution of 1:400 and CoraLite® 488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2).