For Research Use Only

SAT1 Recombinant antibody

Catalog Number:83319-1-RR



Basic Information

Catalog Number: GenBank Accession Number: 83319-1-RR BC008424 GeneID (NCBI): Concentration: 1000 ug/ml 6303 **UNIPROT ID:** Source: Rabbit P21673

Full Name: Isotype: spermidine/spermine N1acetyltransferase 1 Immunogen Catalog Number:

AG1154 Calculated MW: 20 kDa

> Observed MW: 15-25 kDa

Applications

Tested Applications:

WB, IHC, IF/ICC, FC (Intra), ELISA

Species Specificity: human, mouse

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate

buffer pH 6.0

Purification Method: Protein A purification

CloneNo.: 240157G2

Recommended Dilutions: WB 1:1000-1:6000 IHC 1:200-1:800 IF/ICC 1:50-1:500

Positive Controls:

WB: HEK-293 cells, K-562 cells, HeLa cells

IHC: mouse brain tissue, IF/ICC: RAW 264.7 cells,

Background Information

Spermidine/spermine N1-acetyltransferase 1 (SAT1 or SSAT1) is the key regulatory enzyme in the catabolism of polyamines, catalyzing acetylation of spermidine or spermine to generate N1-acetyl spermidine or N1-acetyl spermine, and N1, N12-diacetylspermine. The cellular level of SAT1 is normally extremely low, but it is induced rapidly by a variety of stimuli, including polyamines, polyamine analogs, toxic chemicals, certain drugs, and growth factors. Downregulation of SAT1 has been reported in Epstein-Barr virus positive Burkitt's lymphoma cells.

Storage

Storage:

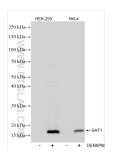
Store at -20°C. Stable for one year after shipment.

Storage Buffer:

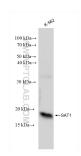
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

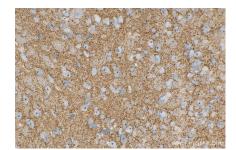
Selected Validation Data



Untreated and DENSPM treated HEK-293 and HeLa cells were subjected to SDS PAGE followed by western blot with 83319-1-RR (SAT1 antibody) at dilution of 1:3000 incubated at room temperature for 1.5 hours.



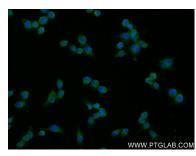
Various lysates were subjected to SDS PAGE followed by western blot with 83319-1-RR (SAT1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



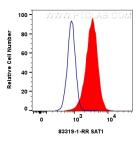
Immunohistochemical analysis of paraffinembedded mouse brain tissue slide using 83319-1-RR (SAT1 antibody) at dilution of 1:400 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



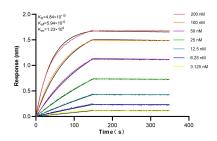
Immunohistochemical analysis of paraffinembedded mouse brain tissue slide using 83319-1-RR (SAT1 antibody) at dilution of 1:400 (under 20x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed RAW 264.7 cells using SAT1 antibody (83319-1-RR, Clone: 240157G2) at dilution of 1:200 and CoraLite@488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) (SA00013-2).



1x10^6 RAW 264.7 cells were intracellularly stained with 0.25 ug SAT1 Recombinant antibody (83319-1-RR, Clone:240157G2) and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2) (recombinant Antibody (98136-1-RR, Clone: 240953C9) (blue). Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).



Biolayer interferometry (BLL) kinetic assays of 83319-1-RR against Human SAT1 were performed. The affinity constant is 0.484 nM.