SunLong Biotech Co.,LTD
Tel: 0086-571-56623320 Fax:0086-571-56623318
E-mail:sales@sunlongbiotech.com
www.sunlongbiotech.com

Rabbit Anti-phospho-VAV3 (Tyr141)antibody

SL10271R

Product Name	phospho-VAV3 (Tyr141)
Chinese Name	磷酸化鸟嘌呤核苷酸交换因子 VAV3 抗体
Alias	VAV3(phospho Tyr141); VAV3(phospho Y141); Guanine nucleotide exchange factor VAV3; Protein vav 3; Protein vav3; VAV 3; Vav 3 guanine nucleotide exchange factor; VAV 3 oncogene; VAV 3 protein; VAV-3; VAV3 oncogene; VAV3 protein; VAV3_HUMAN.
Product Type	Phosphorylated anti
Research Area	Tumour immunology Signal transduction transcriptional regulatory factor G protein-coupled receptor
Immunogen Species	Rabbit
Clonality	Polyclonal
React Species	Mouse, Rat, (predicted: Human, Cow, Horse, Sheep,)
Applications	WB=1:500-2000,IHC-P=1:100-500,IHC-F=1:100-500,IF=1:100-500 （Paraffin sections need antigen repair） not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Theoretical molecular weight	93kDa
Cellular localization	cytoplasmic Extracellular matrix
Form	Liquid
Concentration	1mg/ml
immunogen	KLH conjugated Synthesised phosphopeptide derived from human VAV3 around the phosphorylation site of Tyr141: DI(p-Y)KG
Lsotype	IgG
Purification	affinity purified by Protein A
Buffer Solution	1M TBS(pH7.4) with 1% BSA, 3% Proclin300 and 50% Glycerol.
Storage	Shipped at 4℃. Store at -20 ℃ for one year. Avoid repeated freeze/thaw cycles.

Attention

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.

PubMed

PubMed

Product Detail

The Vav family of Rho guanine nucleotide exchange factors (GEFs) orchestrate signaling events following lymphocyte antigen receptor activation. Vav3, like Vav (also known as Vav1 or p95Vav), undergoes tyrosine phosphorylation downstream of T cell receptor cross-linkage, and subsequently interacts with 2 adaptor molecules, SLP76 and 3BP2. Following these events, however, the paths of Vav and Vav3 diverge; Vav affects IL-2 promotor activity, while Vav3 impacts gene transcription linked to serum response element (SRE). Furthermore, Vav3 expression follows a cell cycle-dependent pattern, with transient upregulation occuring during mitosis. Encforced Vav3 expression leads to the appearance of multinucleate cells, implicating a role for Vav3 in the control of cytokinesis.

Function:
Exchange factor for GTP-binding proteins RhoA, RhoG and, to a lesser extent, Rac1. Binds physically to the nucleotide-free states of those GTPases. Plays an important role in angiogenesis. Its recruitement by phosphorylated EPHA2 is critical for EFNA1-induced RAC1 GTPase activation and vascular endothelial cell migration and assembly (By similarity). May be important for integrin-mediated signaling, at least in some cell types. In osteoclasts, along with SYK tyrosine kinase, required for signaling through integrin alpha-v/beta-1 (ITAGV-ITGB1), a crucial event for osteoclast proper cytoskeleton organization and function. This signaling pathway involves RAC1, but not RHO, activation. Necessary for proper wound healing. In the course of wound healing, required for the phagocytotic cup formation preceding macrophage phagocytosis of apoptotic neutrophils. Responsible for integrin beta-2 (ITGB2)-mediated macrophage adhesion and, to a lesser extent, contributes to beta-3 (ITGB3)-mediated adhesion. Does not affect integrin beta-1 (ITGB1)-mediated adhesion (By similarity).

Subunit:
Interacts with the PH domain of APS. Interacts (via SH2 domains) with the phosphorylated form of EPHA2. Interacts with ROS1; constitutive interaction that mediates VAV3 phosphorylation.

Tissue Specificity:
Isoform 1 and isoform 3 are widely expressed; both are expressed at very low levels in skeletal muscle. In keratinocytes, isoform 1 is less abundant than isoform 3. Isoform 3 is detected at very low levels, if any, in adrenal gland, bone marrow, spleen, fetal brain and spinal chord; in these tissues, isoform 1 is readily detectable.

Similarity:
Contains 1 CH (calponin-homology) domain.

Contains 1 DH (DBL-homology) domain.
Contains 1 PH domain.
Contains 1 phorbol-ester/DAG-type zinc finger.
Contains 1 SH2 domain.
Contains 2 SH3 domains.

SWISS:
Q9UKW4

Gene ID:
10451

Database links:

Entrez Gene: 10451 Human

Entrez Gene: 57257 Mouse

Entrez Gene: 295378 Rat

Omim: 605541 Human

SwissProt: Q9UKW4 Human

SwissProt: Q9R0C8 Mouse

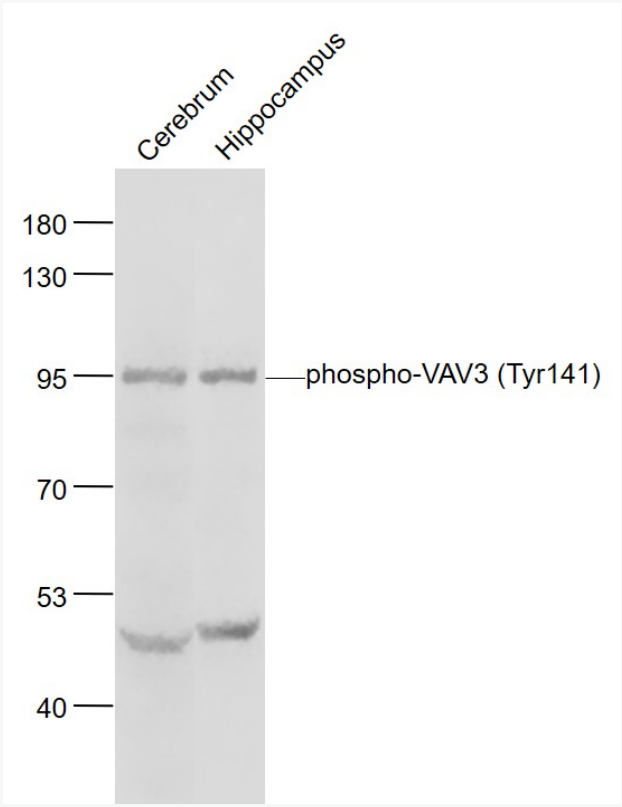
Unigene: 267659 Human

Unigene: 282257 Mouse

Unigene: 27881 Rat

SunLong Biotech Co.,LTD
Tel: 0086-571-56623320 Fax:0086-571-56623318
E-mail:sales@sunlongbiotech.com
www.sunlongbiotech.com

Product Picture



Sample:

Cerebrum(Mouse) Lysate at 40 ug

Hippocampus(Mouse) Lysate at 40 ug

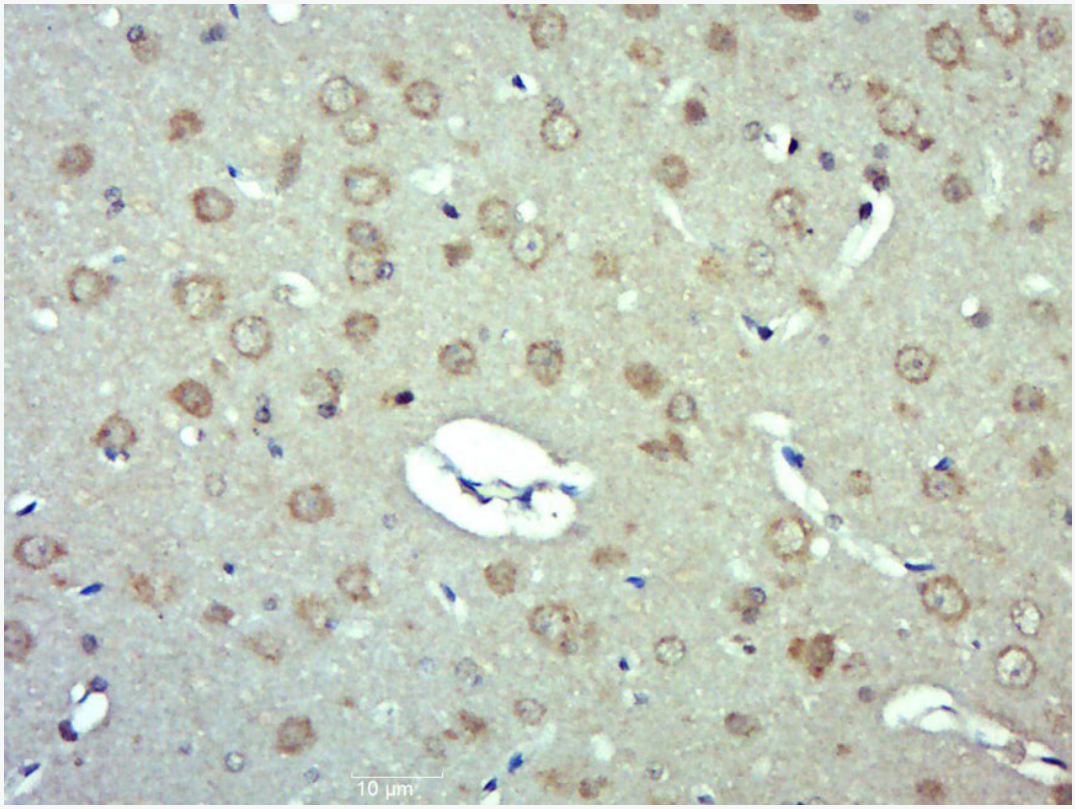
Primary: Anti-phospho-VAV3 (Tyr141) (SL10271R) at 1/1000 dilution

Secondary: IRDye800CW Goat Anti-Rabbit IgG at 1/20000 dilution

Predicted band size: 98 kD

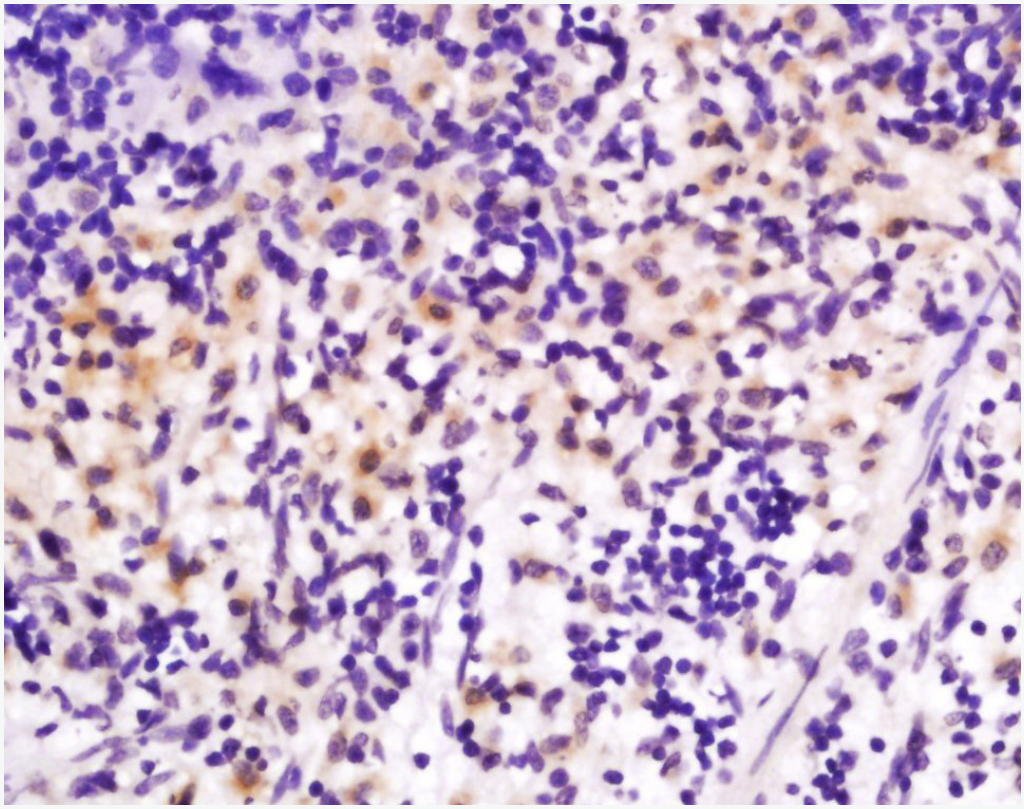
Observed band size: 95 kD

SunLong Biotech Co.,LTD
Tel: 0086-571-56623320 Fax:0086-571-56623318
E-mail:sales@sunlongbiotech.com
www.sunlongbiotech.com



Paraformaldehyde-fixed, paraffin embedded (Rat brain); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (phospho-VAV3(Tyr141)) Polyclonal Antibody, Unconjugated (SL10271R) at 1:500 overnight at 4°C, followed by a conjugated secondary (sp-0023) for 20 minutes and DAB staining.

SunLong Biotech Co.,LTD
Tel: 0086-571-56623320 Fax:0086-571-56623318
E-mail:sales@sunlongbiotech.com
www.sunlongbiotech.com



Tissue/cell: rat spleen tissue; 4% Paraformaldehyde-fixed and paraffin-embedded; Antigen retrieval: citrate buffer (1M, pH 6.0), Boiling bathing for 15min; Block endogenous peroxidase by 3% Hydrogen peroxide for 30min; Blocking buffer (normal goat serum,C-0005) at 37℃ for 20 min;

Incubation: Anti-phospho-VAV3 (Tyr141) Polyclonal Antibody, Unconjugated(SL10271R) 1:200, overnight at 4°C, followed by conjugation to the secondary antibody(SP-0023) and DAB(C-0010) staining