

PSPH Antibody (aa1-225, clone 3G12)
Mouse Monoclonal Antibody
Catalog # ALS12551

Specification

PSPH Antibody (aa1-225, clone 3G12) - Product Information

Application	IHC, WB
Primary Accession	P78330
Reactivity	Human, Mouse
Host	Mouse
Clonality	Monoclonal
Calculated MW	25kDa KDa

PSPH Antibody (aa1-225, clone 3G12) - Additional Information

Gene ID 5723

Other Names

Phosphoserine phosphatase, PSP, PSPase, 3.1.3.3, L-3-phosphoserine phosphatase, O-phosphoserine phosphohydrolase, PSPH

Reconstitution & Storage

Long term: -20°C; Short term: +4°C; Avoid freeze-thaw cycles.

Precautions

PSPH Antibody (aa1-225, clone 3G12) is for research use only and not for use in diagnostic or therapeutic procedures.

PSPH Antibody (aa1-225, clone 3G12) - Protein Information

Name PSPH ([HGNC:9577](#))

Function

Catalyzes the last irreversible step in the biosynthesis of L-serine from carbohydrates, the dephosphorylation of O-phospho-L-serine to L-serine (PubMed:12213811, PubMed:14673469, PubMed:15291819, PubMed:25080166, PubMed:9222972). L-serine can then be used in protein synthesis, to produce other amino acids, in nucleotide metabolism or in glutathione synthesis, or can be racemized to D-serine, a neuromodulator (PubMed:14673469). May also act on O-phospho-D-serine (Probable).

Cellular Location

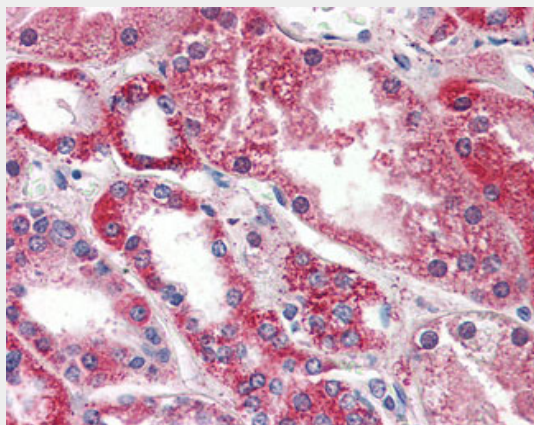
Cytoplasm, cytosol.

PSPH Antibody (aa1-225, clone 3G12) - Protocols

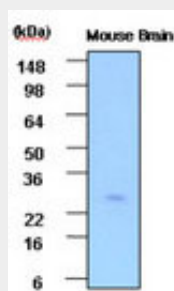
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

PSPH Antibody (aa1-225, clone 3G12) - Images



Anti-PSPH antibody IHC of human kidney.



Cell lysates of Mouse brain (30 ug) were resolved by SDS-PAGE, transferred to PVDF membrane and...

PSPH Antibody (aa1-225, clone 3G12) - Background

Catalyzes the last step in the biosynthesis of serine from carbohydrates. The reaction mechanism proceeds via the formation of a phosphoryl-enzyme intermediates.

PSPH Antibody (aa1-225, clone 3G12) - References

- Collet J.-F., et al. FEBS Lett. 408:281-284(1997).
Ota T., et al. Nat. Genet. 36:40-45(2004).
Bechtel S., et al. BMC Genomics 8:399-399(2007).
Mural R.J., et al. Submitted (JUL-2005) to the EMBL/GenBank/DDBJ databases.

Gauci S., et al. Anal. Chem. 81:4493-4501(2009).