

# Datasheet for ABIN3075449

## VASH1 Protein (AA 1-365) (Strep Tag)



#### Overview

Quantity:	250 μg
Target:	VASH1
Protein Characteristics:	AA 1-365
Origin:	Human
Source:	Cell-free protein synthesis (CFPS)
Protein Type:	Recombinant
Purification tag / Conjugate:	This VASH1 protein is labelled with Strep Tag.
Application:	SDS-PAGE (SDS), ELISA, Western Blotting (WB)

Brand:	AliCE®
Sequence:	MPGGKKVAGG GSSGATPTSA AATAPSGVRR LETSEGTSAQ RDEEPEEEGE EDLRDGGVPF
	FVNRGGLPVD EATWERMWKH VAKIHPDGEK VAQRIRGATD LPKIPIPSVP TFQPSTPVPE
	RLEAVQRYIR ELQYNHTGTQ FFEIKKSRPL TGLMDLAKEM TKEALPIKCL EAVILGIYLT
	NSMPTLERFP ISFKTYFSGN YFRHIVLGVN FAGRYGALGM SRREDLMYKP PAFRTLSELV
	LDFEAAYGRC WHVLKKVKLG QSVSHDPHSV EQIEWKHSVL DVERLGRDDF RKELERHARD
	MRLKIGKGTG PPSPTKDRKK DVSSPQRAQS SPHRRNSRSE RRPSGDKKTS EPKAMPDLNG
	YQIRV
	Sequence without tag. The proposed Strep-Tag is based on experience s with the expression
	system, a different complexity of the protein could make another tag necessary. In case you
	have a special request, please contact us.

- Made in Germany from design to production by highly experienced protein experts.
- · Protein expressed with ALiCE® and purified in one-step affinity chromatography
- These proteins are normally active (enzymatically functional) as our customers have reported (not tested by us and not guaranteed).
- · State-of-the-art algorithm used for plasmid design (Gene synthesis).

This protein is a **made-to-order protein** and will be made for the first time for your order. Our experts in the lab try to ensure that you receive soluble protein.

The big advantage of ordering our **made-to-order proteins** in comparison to ordering custom made proteins from other companies is that there is no financial obligation in case the protein cannot be expressed or purified.

#### Expression System:

- ALiCE®, our Almost Living Cell-Free Expression System is based on a lysate obtained from Nicotiana tabacum c.v.. This contains all the protein expression machinery needed to produce even the most difficult-to-express proteins, including those that require posttranslational modifications.
- During lysate production, the cell wall and other cellular components that are not required for
  protein production are removed, leaving only the protein production machinery and the
  mitochondria to drive the reaction. During our lysate completion steps, the additional
  components needed for protein production (amino acids, cofactors, etc.) are added to
  produce something that functions like a cell, but without the constraints of a living system all that's needed is the DNA that codes for the desired protein!

#### Concentration:

- The concentration of our recombinant proteins is measured using the absorbance at 280nm.
- The protein's absorbance will be measured against its specific reference buffer.
- · We use the Expasy's ProtParam tool to determine the absorption coefficient of each protein.

Purification:	One-step Strep-tag purification of proteins expressed in Almost Living Cell-Free Expression System (AliCE®).
Purity:	> 70-80 % as determined by SDS PAGE, Western Blot and analytical SEC (HPLC).
Grade:	custom-made
Target Details	
Target:	VASH1

## **Target Details**

Alternative Name:	VASH1 (VASH1 Products)
Background:	Tubulinyl-Tyr carboxypeptidase 1 (EC 3.4.17.17) (Tubulin carboxypeptidase 1) (Tyrosine
	carboxypeptidase 1) (TTCP 1) (Vasohibin-1),FUNCTION: Tyrosine carboxypeptidase that
	removes the C-terminal tyrosine residue of alpha-tubulin, thereby regulating microtubule
	dynamics and function (PubMed:29146869, PubMed:31270470, PubMed:31235910,
	PubMed:31171830, PubMed:31235911). Critical for spindle function and accurate chromosome
	segregation during mitosis since microtubule detyronisation regulates mitotic spindle length
	and postioning (PubMed:31171830). Acts as an angiogenesis inhibitor: inhibits migration,
	proliferation and network formation by endothelial cells as well as angiogenesis
	(PubMed:15467828, PubMed:16488400, PubMed:16707096, PubMed:19204325). This
	inhibitory effect is selective to endothelial cells as it does not affect the migration of smooth
	muscle cells or fibroblasts (PubMed:15467828, PubMed:16488400, PubMed:16707096).
	{ECO:0000269 PubMed:15467828, ECO:0000269 PubMed:16488400,
	ECO:0000269 PubMed:16707096, ECO:0000269 PubMed:19204325,
	ECO:0000269 PubMed:29146869, ECO:0000269 PubMed:31171830,
	ECO:0000269 PubMed:31235910, ECO:0000269 PubMed:31235911,
	ECO:0000269 PubMed:31270470}.
Molecular Weight:	41.0 kDa
UniProt:	Q7L8A9
Application Details	
Application Notes:	In addition to the applications listed above we expect the protein to work for functional studies
	as well. As the protein has not been tested for functional studies yet we cannot offer a
	guarantee though.
Comment:	ALiCE®, our Almost Living Cell-Free Expression System is based on a lysate obtained from
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	modifications.
	During lysate production, the cell wall and other cellular components that are not required for
	protein production are removed, leaving only the protein production machinery and the
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## **Application Details**

Restrictions:	For Research Use only
Handling	
Format:	Liquid
Buffer:	The buffer composition is at the discretion of the manufacturer.
	Standard Storage Buffer: PBS pH 7.4, 10 % Glycerol Might differ depending on protein.
Handling Advice:	Avoid repeated freeze-thaw cycles.
Storage:	-80 °C
Storage Comment:	Store at -80°C.
Expiry Date:	12 months