Datasheet for ABIN3096478

ZC3HAV1 Protein (AA 2-902) (His tag)

Go to Product page

1 Image

Overview

Quantity:	1 mg
Target:	ZC3HAV1
Protein Characteristics:	AA 2-902
Origin:	Human
Source:	Insect Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This ZC3HAV1 protein is labelled with His tag.
Application:	ELISA, Western Blotting (WB), Crystallization (Crys), SDS-PAGE (SDS)

Product Details

Sequence:	ADPEVCCFIT KILCAHGGRM ALDALLQEIA LSEPQLCEVL QVAGPDRFVV LETGGEAGIT RSVVATTRAR VCRRKYCQRP CDNLHLCKLN LLGRCNYSQS ERNLCKYSHE VLSEENFKVL KNHELSGLNK EELAVLLLQS DPFFMPEICK SYKGEGRQQI CNQQPPCSRL HICDHFTRGN CRFPNCLRSH NLMDRKVLAI MREHGLNPDV VQNIQDICNS KHMQKNPPGP RAPSSHRRNM AYRARSKSRD RFFQGSQEFL ASASASAERS CTPSPDQISH RASLEDAPVD DLTRKFTYLG SQDRARPPSG SSKATDLGGT SQAGTSQRFL ENGSQEDLLH GNPGSTYLAS NSTSAPNWKS LTSWTNDQGA RRKTVFSPTL PAARSSLGSL QTPEAVTTRK GTGLLSSDYR IINGKSGTQD IQPGPLFNNN ADGVATDITS TRSLNYKSTS SGHREISSPR IQDAGPASRD VQATGRIADD ADPRVALVND SLSDVTSTTS SRVDDHDSEE ICLDHLCKGC PLNGSCSKVH FHLPYRWQML IGKTWTDFEH METIEKGYCN PGIHLCSVGS YTINFRVMSC DSFPIRRLST PSSVTKPANS VFTTKWIWYW KNESGTWIQY GEEKDKRKNS NVDSSYLESL YQSCPRGVVP FQAGSRNYEL SFQGMIQTNI ASKTQKDVIR RPTFVPQWYV QQMKRGPDHQ PAKTSSVSLT ATFRPQEDFC

	FLSSKKYKLS EIHHLHPEYV RVSEHFKASM KNFKIEKIKK IENSELLDKF TWKKSQMKEE GKLLFYATSR AYVESICSNN FDSFLHETHE NKYGKGIYFA KDAIYSHKNC PYDAKNVVMF VAQVLVGKFT EGNITYTSPP PQFDSCVDTR SNPSVFVIFQ KDQVYPQYVI EYTEDKACVI S **Sequence without tag. Tag location is at the discretion of the manufacturer. If you have a special request, please contact us.**
Characteristics:	• Made in Germany - from design to production - by highly experienced protein experts. • Human ZC3HAV1 Protein (raised in Insect Cells) purified by multi-step, protein-specific process to ensure crystallization grade. • 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 will ensure that you receive a correctly folded 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. In the unlikely event that the protein cannot be expressed or purified we do not charge anything (other companies might charge you for any performed steps in the expression process for custom-made proteins, e.g. fees might apply for the expression plasmid, the first expression experiments or purification optimization). When you order this made-to-order protein you will only pay upon receival of the correctly folded protein. With no financial risk on your end you can rest assured that our experienced protein experts will do everything to make sure that you receive the protein you ordered. The concentration of our recombinant proteins is measured using the absorbance at 280nm. The protein's absorbance will be measured in several dilutions and is measured against its specific reference buffer. The concentration of the protein is calculated using its specific absorption coefficient. We use the Expasy's protparam tool to determine the absorption coefficient of each protein.
Purification:	Two step purification of proteins expressed in baculovirus infected SF9 insect cells: 1. In a first purification step, the protein is purified from the cleared cell lysate using three different His-tag capture materials: high yield, EDTA resistant, or DTT resistant. Eluate fractions are analyzed by SDS-PAGE. 2. Protein containing fractions of the best purification are subjected to second purification step through size exclusion chromatography. Eluate fractions are analyzed by SDS-PAGE and Western blot.
Purity:	>95 % as determined by SDS PAGE, Size Exclusion Chromatography and Western Blot.
Sterility:	0.22 µm filtered

Product Details

Endotoxin Level:	Protein is endotoxin free.
Grade:	Crystallography grade

Target Details

Target:	ZC3HAV1
Alternative Name:	ZC3HAV1 (ZC3HAV1 Products)
Background:	Antiviral protein which inhibits the replication of viruses by recruiting the cellular RNA degradation machineries to degrade the viral mRNAs. Binds to a ZAP-responsive element (ZRE) present in the target viral mRNA, recruits cellular poly(A)-specific ribonuclease PARN to remove the poly(A) tail, and the 3'-5' exoribonuclease complex exosome to degrade the RNA body from the 3'-end. It also recruits the decapping complex DCP1-DCP2 through RNA helicase p72 (DDX17) to remove the cap structure of the viral mRNA to initiate its degradation from the 5'-end. Its target viruses belong to families which include retroviridae: human immunodeficiency virus type 1 (HIV-1), moloney and murine leukemia virus (MoMLV) and xenotropic MuLV-related virus (XMRV), filoviridae: ebola virus (EBOV) and marburg virus (MARV), togaviridae: sindbis virus (SINV) and Ross river virus (RRV). Specifically targets the multiply spliced but not unspliced or singly spliced HIV-1 mRNAs for degradation. Isoform 1 is a more potent viral inhibitor than isoform 2. Isoform 2 acts as a positive regulator of DDX58/RIG-I signaling resulting in activation of the downstream effector IRF3 leading to the expression of type I IFNs and IFN stimulated genes (ISGs). {ECO:0000269|PubMed:18225958, ECO:0000269|PubMed:21102435, ECO:0000269|PubMed:21876179, ECO:0000269|PubMed:22720057}.
Molecular Weight:	102.3 kDa Including tag.
UniProt:	Q7Z2W4

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 gurantee though.
Comment:	In cases in which it is highly likely that the recombinant protein with the default tag will be insoluble our protein lab may suggest a higher molecular weight tag (e.g. GST-tag) instead to increase solubility. We will discuss all possible options with you in detail to assure that you receive your protein of interest.

Application Details

Restrictions:	For Research Use only

Handling

Format:	Liquid
Buffer:	100 mM NaCL, 20 mM Hepes, 10% glycerol. pH value is at the discretion of the manufacturer.
Handling Advice:	Avoid repeated freeze-thaw cycles.
Storage:	-80 °C
Storage Comment:	Store at -80°C.
Expiry Date:	Unlimited (if stored properly)

Images

Image 1. „Crystallography Grade“ protein due to multi-step, protein-specific purification process