Datasheet for ABIN3095008

REST Protein (AA 1-1097) (His tag)

1 Image

Go to Product page

Overview

Quantity:	1 mg
Target:	REST
Protein Characteristics:	AA 1-1097
Origin:	Human
Source:	Insect Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This REST protein is labelled with His tag.
Application:	Western Blotting (WB), SDS-PAGE (SDS), Crystallization (Crys), ELISA

Product Details

Sequence:	MATQVMGQSS GGGGLFTSSG NIGMALPNDM YDLHDLSKAE LAAPQLIMLA NVALTGEVNG SCCDYLVGEE RQMAELMPVG DNNFSDSEEG EGLEESADIK GEPHGLENME LRSLELSVVE PQPVFEASGA PDIYSSNKDL PPETPGAEDK GKSSKTKPFR CKPCQYEAES EEQFVHHIRV HSAKKFFVEE SAEKQAKARE SGSSTAEEGD FSKGPIRCDR CGYNTNRYDH YTAHLKHHTR AGDNERVYKC IICTYTTVSE YHWRKHLRNH FPRKVYTCGK CNYFSDRKNN YVQHVRTHTG ERPYKCELCP YSSSQKTHLT RHMRTHSGEK PFKCDQCSYV ASNQHEVTRH ARQVHNGPKP LNCPHCDYKT ADRSNFKKHV ELHVNPRQFN CPVCDYAASK KCNLQYHFKS KHPTCPNKTM DVSKVKLKKT KKREADLPDN ITNEKTEIEQ TKIKGDVAGK KNEKSVKAEK RDVSKEKKPS NNVSVIQVTT RTRKSVTEVK EMDVHTGSNS EKFSKTKKSK RKLEVDSHSL HGPVNDEESS TKKKKKVESK SKNNSQEVPK GDSKVEENKK QNTCMKKSTK KKTLKNKSSK KSSKPPQKEP VEKGSAQMDP PQMGPAPTEA VQKGPVQVEP PPPMEHAQME GAQIRPAPDE PVQMEVVQEG PAQKELLPPV EPAQMVGAQI VLAHMELPPP METAQTEVAQ MGPAPMEPAQ MEVAQVESAP

	MQVVQKEPVQ MELSPPMEVV QKEPVQIELS PPMEVVQKEP VKIELSPPIE VVQKEPVQME LSPPMGVVQK EPAQREPPPP REPPLHMEPI SKKPPLRKDK KEKSNMQSER ARKEQVLIEV GLVPVKDSWL LKESVSTEDL SPPSPPLPKE NLREEASGDQ KLLNTGEGNK EAPLQKVGAE EADESLPGLA ANINESTHIS SSGQNLNTPE GETLNGKHQT DSIVCEMKMD TDQNTRENLT GINSTVEEPV SPMLPPSAVE EREAVSKTAL ASPPATMAAN ESQEIDEDEG IHSHEGSDLS DNMSEGSDDS GLHGARPVPQ ESSRKNAKEA LAVKAAKGDF VCIFCDRSFR KGKDYSKHLN RHLVNVYYLE EAAQGQE **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 REST 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

Product Details

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

Target Details

Target:	REST
Alternative Name:	REST (REST Products)
Background:	Transcriptional repressor which binds neuron-restrictive silencer element (NRSE) and represses neuronal gene transcription in non-neuronal cells. Restricts the expression of neuronal genes by associating with two distinct corepressors, mSin3 and CoREST, which in turn recruit histone deacetylase to the promoters of REST-regulated genes. Mediates repression by recruiting the BHC complex at RE1/NRSE sites which acts by deacetylating and demethylating specific sites on histones, thereby acting as a chromatin modifier. Transcriptional repression by REST-CDYL via the recruitment of histone methyltransferase EHMT2 may be important in transformation suppression. {ECO:0000269|PubMed:12399542, ECO:0000269|PubMed:19061646, ECO:0000269|PubMed:7697725, ECO:0000269|PubMed:7871435, ECO:0000269|PubMed:8568247}.
Molecular Weight:	122.8 kDa Including tag.
UniProt:	Q13127
Pathways:	Negative Regulation of Hormone Secretion, Regulation of Hormone Metabolic Process, Regulation of Hormone Biosynthetic Process, Chromatin Binding, Positive Regulation of Endopeptidase Activity

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

Application Details

	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.
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

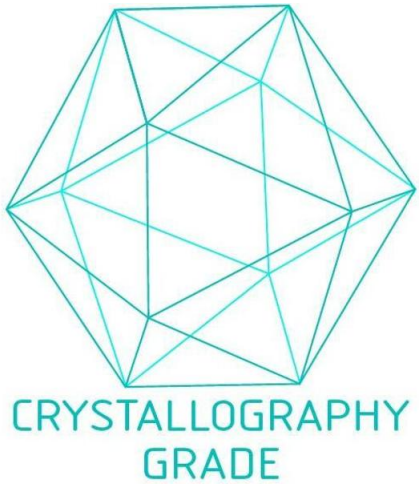

Image 1. „Crystallography Grade“ protein due to multi-step, protein-specific purification process