

Datasheet for ABIN7562381

ASCL2 Protein (AA 1-263) (His tag)



Overview

Quantity:	1 mg
Target:	ASCL2
Protein Characteristics:	AA 1-263
Origin:	Mouse
Source:	HEK-293 Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This ASCL2 protein is labelled with His tag.

Product Details

Purpose:	Custom-made recombinant Ascl2 Protein expressed in mammalian cells.
Sequence:	MEAHLDWYGV PGLQEASDAC PRESCSSALP EAREGANVHF PPHPVPREHF SCAAPELVAG
	AQGLNASLMD GGALPRLMPT SSGVAGACAA RRRQASPELL RCSRRRRSGA TEASSSSAAV
	ARRNERERNR VKLVNLGFQA LRQHVPHGGA NKKLSKVETL RSAVEYIRAL QRLLAEHDAV
	RAALAGGLLT PATPPSDECA QPSASPASAS LSCASTSPSP DRLGCSEPTS PRSAYSSEES
	SCEGELSPME QELLDFSSWL GGY Sequence without tag. The proposed Purification-Tag is
	based on experiences 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.
Specificity:	If you are looking for a specific domain and are interested in a partial protein or a different
	isoform, please contact us regarding an individual offer.
Characteristics:	Key Benefits:
	Made to order protein - from design to production - by highly experienced protein experts.
	Made to order protein - from design to production - by highly experienced

- · Protein expressed in mammalian cells and purified in one-step affinity chromatography
- The optimized expression system ensures reliability for intracellular, secreted and transmembrane proteins.
- 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.

If you are not interested in a full length protein, please contact us for individual protein fragments.

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.

Purity:

> 90 % as determined by Bis-Tris PAGE, anti-tag ELISA, Western Blot and analytical SEC (HPLC)

Grade:

custom-made

Target Details

Target:	ASCL2

Alternative Name:

Ascl2 (ASCL2 Products)

Background:

Achaete-scute homolog 2 (ASH-2) (mASH-2) (mASH2),FUNCTION: Transcription factor (PubMed:10611232, PubMed:29500235). Binds to E-box motifs 5'-CANNTG-3' in the regulatory elements of target genes, probably as a heterodimer with another basic helix-loop-helix (bHLH) protein such as the transcription factor TCF3 (PubMed:10611232, PubMed:29500235). May bind both open and closed chromatin, acting as a pioneer transcription factor to allow other factors to bind and activate lineage-specific genes (PubMed:29500235). Required during post-implantation development for the generation of some differentiated trophoblast cell types (PubMed:8090202). Transcriptional activity of ASCL2 may be antagonised in a subset of trophoblast cells by bHLH transcription factor HAND1, perhaps by competing for dimerization with other bHLH proteins (PubMed:10611232). Involved in differentiation and function of follicular T-helper (Tfh) cells, thereby playing a role in germinal center responses, probably modulates expression of genes involved in Tfh cell function, such as BCL6 (PubMed:24463518). May also act as a suppressor of Th1-, Th2- and Th17-cell differentiation (PubMed:24463518). Induces the formation of stem cells in intestinal crypts in vitro, synergistically activating transcription of target genes, such as SOX9, together with TCF4/beta-

catenin (PubMed:25620640). May form a bistable transcriptional switch, controlling expression of its own gene together with Wnt/R-spondin signaling, and thereby maintaining stem cell characteristics (PubMed:25620640). Modulates expression of target genes, including perhaps down-regulating EGR1/Krox24 and chemokine CXCL10/Mob-1 and up-regulating CXCR4 and CDKN1C/p57kip2, in Schwann cells (By similarity). May play a role in reducing proliferation of Schwann cells, perhaps acting via modulation of expression of CDKN1C (By similarity). May be dispensable for blastocyst formation and later embryonic function (PubMed:8090202, PubMed:9622625). May be involved in the determination of neuronal precursors (By similarity). {ECO:0000250|UniProtKB:P19360, ECO:0000269|PubMed:10611232, ECO:0000269|PubMed:24463518, ECO:0000269|PubMed:25620640, ECO:0000269|PubMed:29500235, ECO:0000269|PubMed:8090202,

ECO:0000269|PubMed:9622625}.

Molecular Weight: 27.8 kDa

Pathways: Stem Cell Maintenance

Application Details

Application Notes: We expect the protein to work for functional studies. As the protein has not been tested for functional studies yet we cannot offer a guarantee though.

Restrictions: For Research Use only

Handling

UniProt:

Format:	Liquid
Buffer:	The buffer composition 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:	12 months