Datasheet for ABIN7455653

NOG Protein (Fc Tag)

Go to Product page

Overview

Quantity:	50 µg
Target:	NOG
Origin:	Human
Source:	HEK-293 Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This NOG protein is labelled with Fc Tag.

Product Details

Purpose:	Recombinant Human Noggin is produced by our Mammalian expression system and the target gene encoding Gln28-Cys232 is expressed with a Fc tag at the C-terminus.
Characteristics:	Extracellular Domain Protein
Purity:	Greater than 95 % as determined by reducing SDS-PAGE.

Target Details

Target:	NOG
Alternative Name:	Noggin (NOG Products)
Background:	Noggin, NOGNoggin is a secreted homodimeric glycoprotein that is an antagonist of bone morphogenetic proteins (BMPs). Mature Human Noggin contains an N-terminal acidic region, a central basic heparin-binding segment and a C-terminal cysteine-knot structure. Noggin is very highly conserved among vertebrates, such that mature human Noggin shares 99 % , 99 %, 98 %, 97 % and 89 % aa sequence identity with mouse, rat bovine, equine and chicken Noggin,

Target Details

	respectively. Secreted Noggin probably remains close to the cell surface due to its binding of heparin-containing proteoglycans. Noggin binds some BMPs such as BMP4 with high affinity and others such as BMP7 with lower affinity. It antagonizes BMP bioactivities by blocking epitopes on BMPs that are needed for binding to both type I and type II receptors. Noggin is expressed in defined areas of the adult central nervous system and peripheral tissues such as lung, skeletal muscle and skin. During culture of human embryonic stem cells (hESC) or neural stem cells under certain conditions, addition of Noggin to antagonize BMP activity may allow stem cells to proliferate while maintaining their undifferentiated state, or alternatively, to differentiate into dopaminergic neurons.
Molecular Weight:	50.2 KDa
UniProt:	Q13253
Pathways:	Stem Cell Maintenance, Tube Formation

Application Details

Restrictions:	For Research Use only

Handling

Format:	Lyophilized
Buffer:	a 0.2 µm filtered solution of PBS, pH 7.4.
Storage:	-20 °C
Storage Comment:	Lyophilized protein should be stored at < -20°C, though stable at room temperature for 3 weeks. Reconstituted protein solution can be stored at 4-7°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.
Expiry Date:	12 months