

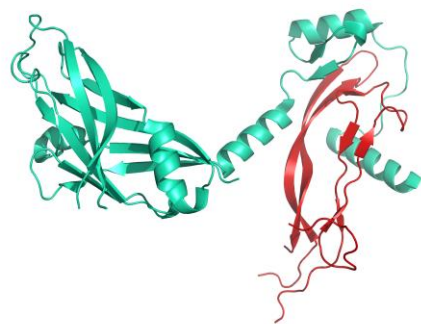
Product Information

Protein:	pro-activin A, GFP/His-tag (~ 73.3 kDa)
Uniprot#:	P08476
Sequence:	MSPTPGSEGHSAAAPDCPSCALAAALPKDVPNSQPEMVEAVKKHILNMLHLKKRPDVTQPVP KAALLNAIRKLVHVGKVGGENGYVEIEDDIGRRAEMNELMEQTSEIITFAESGTARKTLHFE ISKEGSDLSVVERAEVWLFLKVPKANRTRTKVTIRLFQQQKHPQGS�DTGEEAEVGLKG ERSELLSEKVV DARKSTWHVFPVSSSIQRLLDQ GKSSLDVRIACEQCQESGASLVLLGK KKKKEEGEGKKKGGGEGGAGADEEKEQSHRPFLMLQARQSEDHPHRRRRRGLXXXG LECDGKVNICCKKQFFVSKDIGWNDWIIAPSGYHANYCEGECPSHIAGTSGSSLSFHST VINHYRMRGHSPFANLKS CCVPTKLRPMSMLYDDGQNIKKDIQNMIVEECGCS
	Methionine at pos. 1 might be present due to cloning constraints, N-Terminal GFP-fusion not shown in sequence XXX indicates position of His-tag.
Source:	Recombinantly expressed in HEK293 cells.
Tag(s):	GFP/His-tag, N-terminal
Purification:	Purified by affinity chromatography and subsequent buffer exchange.
Formulation:	PBS; pH 7.4. Liquid, stored and shipped at -80 °C.
Purity:	> 95 % (will be determined by densitometry of Coomassie stained gel, example next page)
Concentration:	Will be determined by BCA-Assay.
Long-term storage:	No recommendations.
Comment:	Mature activin A is non-covalently linked to a pro-domain, which is typically released by cleavage through furin-like proteases during the secretory pathway.

Background Information:

Activin A belongs to the TGF-beta superfamily of cytokines and is a disulfide-linked homodimer consisting of four inhibin betaA chains. Any activin is expressed as latent complex, in which the pro-domain of activin is noncovalently linked to the mature, bioactive domain. Activation of activins is induced by proteolytically cleavage of the aminoterminal pro-domain resulting in the formation of disulfide-linked dimers of the bioactive protein. Activity of activin A is highly regulated by follistatin and inhibins.

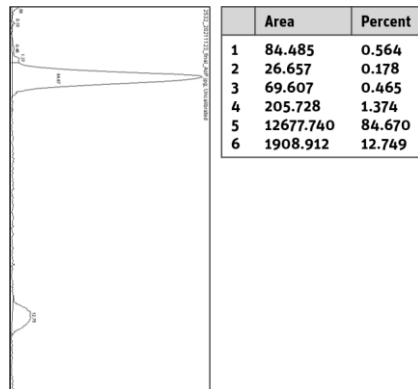
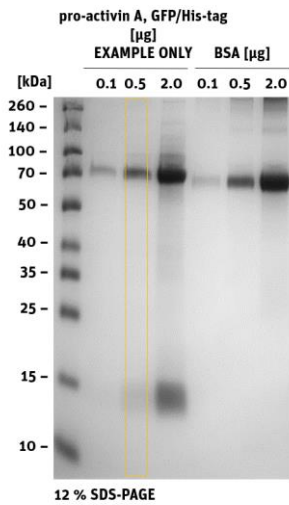
Activin A plays important roles in a variety of physiological and pathological processes, including tissue morphogenesis and repair, fibrosis, inflammation, neural development and development of the reproductive system.



Structural model of pro-activin A, GFP/His-tag with its receptor binding domain (RBD) highlighted (red).

Product Information

Quality Information (provided for each lot):



SDS-PAGE/Coll.Coomassie

Histogram (of marked lane in gel picture)