

Overview

Synonyms	NOG
Description	<p>Noggin, also known as NOG, is a homodimeric glycoprotein that binds to and modulates the activity of TGF-beta family ligands. It is expressed in condensing cartilage and immature chondrocytes. Noggin antagonizes bone morphogenetic protein (BMP) activities by blocking epitopes on BMPs needed for binding to their receptors. Noggin has been shown to be involved in many developmental processes, such as neural tube formation and joint formation. During development, Noggin diffuses through extracellular matrices and forms morphogenic gradients, regulating cellular responses dependent on the local concentration of the signaling molecule.</p> <p>Recombinant Human Noggin Fc Chimera produced in <i>CHO</i> cells is a polypeptide chain containing 438 amino acids with the C-terminal human IgG1 Fc fragment. A fully biologically active molecule, rhNoggin has a molecular mass of 57 kDa analyzed by reducing SDS-PAGE and is obtained by chromatographic techniques.</p>
Source	<i>CHO</i>
Biological Activity	ED ₅₀ <60ng/ml, measured in a bioassay using ATDC5 cells in the presence of 10ng/ml human BMP-4.
Sequence	<p>QHYLEHIRPAP SDNLPLVDLI EHPDPIFDPK EKDLNETLLR SLLGGHYDPG FMATSPPEDR PGGGGGAAGG AEDLAELDQL LRQRPSGAMP SEIKGLEFSE GLAQGKKQRL SKKLRRKLQM WLWSQTFPCV LYAWNDLGSR FWPYRVKVG S CFSKRSCSVP EGMVCKPSKS VHLTIVLRWRC QRRGGQRCGW IPIQYPIISE CKCSCIEGRM DDKTHTCPPC PAPELLGGPS VFLFPPKPKD TLMISRTPVE TCVVVDVSHE DPEVKFNWYV DGVEVHNAKT KPREEQYNST YRVVSVLTVL HQDWLNGKEY KCKVSNKALP APIEKTISKA KGQPREPQVY TLPPSREEMT KNQVSLTCLV KGFYPSDIAV EWESNGQPEN NYKTTTPVLD SDGSFFLYSK LTVDKSRWQQ GNVFSCSVMH EALHNHYTQK SLSLSPGK</p>

Properties

Measured Molecular Weight	57 kDa, observed by reducing SDS-PAGE.
Purity	> 97% as analyzed by reducing SDS-PAGE.
Formulation	Lyophilized from a 0.2 µm filtered solution in PBS.
Reconstitution	Reconstituted in ddH ₂ O or PBS at 100 µg/ml.
Endotoxin Level	< 0.2 EU/µg, determined by LAL method.
Storage	Lyophilized recombinant Human Noggin remains stable up to 6 months at lower than -70°C from date of receipt. Upon reconstitution, Human Noggin should be stable up to 1 week at 4°C or up to 3 months at -20°C. For long term storage it is recommended that a carrier protein (example 0.1% BSA) be added. Avoid repeated freeze-thaw cycles.

India Contact:

Life Technologies (India) Pvt. Ltd.

306, Aggarwal City Mall, Opposite M2K Pitampura,
Delhi – 110034 (INDIA).

Mobile: +91-9810521400, Ph: +91-11-42208000

Email: customerservice@lifetechindia.com

Web: www.lifetechindia.com