

Datasheet**NGF-beta****Mouse Recombinant**

Product	Description	Catalogue-No.	Size
NGF-beta	Beta nerve growth factor	CB-1117007 CB-1117008	5 µg 20 µg

Product description

Synonyms: Beta Polypeptide, NGF, NGFB, HSAN5, Beta-NGF, MGC161426, MGC161428.

NGF-beta has nerve growth stimulating activity and the complex is involved in the regulation of growth and the differentiation of sympathetic and certain sensory neurons. Mutations in this gene have been associated with hereditary sensory and autonomic neuropathy, type 5 (HSAN5), and dysregulation of this gene's expression is associated with allergic rhinitis. Nerve Growth Factor was the 1st protein found from the family of neurotrophic factors that influence the growth and differentiation of sympathetic and sensory neurons. NGF consists of 3 different subunits: alpha, beta, and gamma. The beta subunit is accountable for its growth stimulating activity. The synthesis of NGF in astrocytes is enhanced by a range of cytokines such as IL1, TNF-a, PDGF & TGF-b.

Recombinant Mouse b-NGF produced in E.Coli is a noncovalently disulfide-linked homodimer, non-glycosylated, polypeptide chain containing 2 identical chains of 120 amino acids each and having a molecular mass of 13,471 Dalton each.

The Recombinant Mouse-beta-NGF is purified by advanced biology purification technology.

Solubility and storage conditions

It is recommended to reconstitute the lyophilized Murine NGF-beta in sterile 18MΩ-cm H2O not less than 100µg/ml, which can then be further diluted to other aqueous solutions.

Lyophilized Mouse Beta-NGF although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution Murine NGF-Beta should be stored at 4°C between 2-7 days and for future use below -18°C. Please prevent freeze-thaw cycles.

Composition

The Recombinant Mouse b-NGF was lyophilized without additives.

Purity: > 98.0% as determined by:

(a) Analysis by RP-HPLC.

(b) Analysis by SDS-PAGE .

Amino acid sequence: MSSTHPVFHM GEFSVCDSVS VWVGDKTTAT DIKGKEVTVL AEVNINNSVF RQYFFETKCR ASNPVESGCR GIDSKHWNSY CTTTHTFVKA LTTDEKQAAW RFIRIDTACV CVLSRKATTR G.

The Mouse b-NGF activity was measured in a cell proliferation assay using a factor-dependent human erythroleukemic cell line, TF-1, the ED50 for this effect is 0.2 ng/ml, corresponding to a Specific Activity of 5,000,000 units/mg.

Technical support

For technical support, questions or remarks please contact your local PAN-Biotech partner or the technical department of PAN-Biotech via email (info@pan-biotech.com) or phone +49-8543-601630.

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