

Activin-B Human Recombinant, Active

Item Number	rAP-2124
Synonyms	Inhibin beta B (activin AB beta polypeptide), Inhibin, beta-2, Activin beta-B chain, MGC157939.
Description	Activin B human Recombinant produced in Nicotiana benthamiana plant is a beta-B single chain (aa 293-406) containing 123 amino acids (molecular formula C ₆₁₅ H ₉₁₀ N ₁₇₈ O ₁₇₇ S ₁₂). Activin B is fused to a 10-His-tag at the N-terminal having the total molecular mass of 14kDa and purified by standard chromatography.
Uniprot Accession Number	P09529
Amino Acid Sequence	HHHHHHHHHH GLECDGRTNL CCRQQFFIDF RLIQWNDWII APTGYGNYC EGSCPAYLAG VPGSASS-FHT AVVNQYRMRG LNPQTVNSCC IPTKLSTMSM LYFDDEYNIV KRDPVNMIVE ECG.
Source	Nicotiana benthamiana plant
Physical Appearance and Stability	Sterile Filtered White lyophilized (freeze-dried) powder. Lyophilized Activin B although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution Activin B should be stored at 4°C between 2-7 days and for future use below -18°C. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Please prevent freeze-thaw cycles.
Formulation and Purity	Lyophilized from 1mg/ml solution in 0.05M Tris-HCl buffer pH 7.4. Greater than 97.0% as determined by Analysis by SDS-PAGE.
Application	
Solubility	It is recommended to reconstitute the lyophilized Activin B in sterile 18M-cm H ₂ O not less than 100µg/ml, which can then be further diluted to other aqueous solutions.
Biological Activity	The biological activity of Activin B is measured by its ability to inhibit mouse plasmacytoma cell line (MPC-11) cells proliferation. EC ₅₀ $\leq 5\text{ng/ml}$ is required to stimulate a half-maximal response at cytokine saturation. Note: Since applications vary, e
Shipping Format and Condition	Lyophilized powder at room temperature.

Optimal dilutions should be determined by each laboratory for each application. The listed dilutions are for recommendation only and the final conditions should be optimized by the ender users! This product is sold for **Research Use Only**