

Growth Factor Data Sheet

GoldBio growth factors are manufactured for RESEARCH USE ONLY and cannot be sold for human consumption!

Human Parathyroid Hormone (PTH) is a hormone expressed and secreted as preproPTH by chief cells of the parathyroid glands when extracellular calcium levels are low. It is coexpressed with furin, the enzyme believed to be responsible for processing proPTH to PTH. PTH is a ligand for two different receptors, PTH1R in bone and kidney and PTH2R found in the CNS, pancreas, and placenta. PTH plays a major role in bone metabolism and calcium homeostasis, as well as renal excretion. In osteoblasts, PTH stimulates glycogenesis and the uptake of [1-(14)C]-2-deoxy-D-glucose (2DG).

Catalog Number	3110-05
Product Name	PTH (1-84), Human Recombinant Human Parathyroid Hormone (PTH) Parathyrin Parathormone Parathyroid Hormone 1 (PTH1)
Source	<i>Escherichia coli</i>
MW	~9.4 kDa (84 amino acids)
Sequence	SVSEIQLMHN LGKHLNSMER VEWLRKKLQD VHNFVALGAP LAPRDAGSQR PRKKEDNVLV ESHEKSLGEA DKADVNVLTAKSQ
Accession Number	P01270
Purity	>97% by SDS-PAGE and HPLC analyses
Biological Activity	Fully biologically active when compared to standard. The ED ₅₀ as determined by its ability to induce cAMP accumulation in murine MC3T3E1 cells is less than 50 ng/ml, corresponding to a specific activity of >2.0×10 ⁴ IU/mg.
Formulation	Sterile filtered white lyophilized powder. Purified and tested for use in cell culture.
Storage/Handling	This lyophilized preparation is stable at 2-8°C, but should be kept at -20°C for long term storage. The reconstituted sample can be apportioned into working aliquots and stored at -80 °C for up to 6 months. Avoid repeated freeze/thaw cycles.
Reconstitution	The sample should be briefly centrifuged prior to opening to bring the contents to the bottom. Reconstitute in a siliconized tube using PBS that contains a 0.1% BSA to a concentration of 0.1-1.0 mg/mL. Reconstituted solutions are stable for up to one week at 2-8°C. Stock solutions should be aliquoted and stored at -80°C. Further dilutions should be made in appropriate buffered solutions containing BSA or serum.