

Recombinant Human PCT/Procalcitonin (Human PCT/Procalcitonin)

Product Information

Product Name	Cat#	Size
Recombinant Human PCT/Procalcitonin (Human PCT/Procalcitonin)	92544ES10	10 µg
	92544ES60	100 µg
	92544ES76	500 µg

Product Description

Procalcitonin (PCT) belongs to a group of related proteins including calcitonin gene-related peptides I and II, amylin, adrenomodulin and calcitonin (CAPA peptide family). Mature PCT is expressed as a 116 amino acid (aa) protein which is subsequently cleaved into 3 parts: a 57 aa pro-region, a 32 aa Calcitonin peptide and a 21 aa Katalcalcin peptide. PCT is a peptide precursor of the hormone calcitonin, the latter being involved with calcium homeostasis. PCT is produced by parafollicular cells (C cells) of the thyroid and by the neuroendocrine cells of the lung and the intestine. But its level is related to the severity of bacterial sepsis, it is considered to be one of the earliest and most specific markers of sepsis.

Product Properties

Synonyms	CALC1, CALCA, Calcitonin 1, calcitonin gene-related peptide 1, CGRP, Katalcalcin, Procalcitonin
Accession	P01258-1
GeneID	796
Source	E.coli-derived human PCT/Procalcitonin protein, Ala26-Asn141.
Molecular Weight	Approximately 12.8 kDa.
AA Sequence	APFRSALESS PADPATLSED EARLLLAALV QDYVQMKASE LEQEQEREGRS SLDSPRSKRRC GNLSTCMLGT YTQDFNKFHT FPQTAIGVGA PGKKRDMSSD LERDHRPHVS MPQAN
Tag	None
Physical Appearance	Sterile Filtered White lyophilized (freeze-dried) powder.
Purity	>98% by SDS-PAGE and HPLC analyses.
Biological Activity	Testing in progress.
Endotoxin	< 0.1 EU per 1µg of the protein by the LAL method.
Formulation	Lyophilized from a 0.2 µm filtered concentrated solution in 20 mM Tris-HCl, pH 8.0, 150 mM NaCl. We recommend that this vial be briefly centrifuged prior to opening to bring the contents to the bottom.
Reconstitution	Reconstitute in sterile distilled water or aqueous buffer containing 0.1% BSA to a concentration of 0.1-1.0 mg/mL. Stock solutions should be apportioned into working aliquots and stored at ≤ -20°C. Further dilutions should be made in appropriate buffered solutions.

Shipping and Storage

The products are shipped with ice pack and can be stored at -20°C to -80°C for 1 year.

Recommend to aliquot the protein into smaller quantities when first used and avoid repeated freeze-thaw cycles.

Cautions

1. Avoid repeated freeze-thaw cycles.
2. For your safety and health, please wear lab coats and disposable gloves for operation.
3. For research use only!