

Recombinant Human PI3 / Elafin / WFDC14 Protein (His tag)

Cat.NO.: TP07845

3th Edition

Synonyms:cementoin;ESI;MGC13613;SKALP;WAP3;WFDC14

Description:Elafin, also known as Elastase-specific inhibitor, Peptidase inhibitor 3, Protease inhibitor WAP3, Skinderived antileukoproteinase, WAP four-disulfide core domain protein 14, PI3, WAP3 and WFDC14, is a secreted protein which contains one WAP domain. Elafin / PI3 consists of two domains: the transglutaminase substrate domain (cementoin moiety) and the elastase inhibitor domain. The transglutaminase substrate domain at the Nterminus serves as an anchor to localize elafin covalently to specific sites on extracellular matrix proteins. The serine anti-protease Elafin / PI3 is expressed by monocytes, alveolar macrophages, neutrophils, and at mucosal surfaces and possesses antimicrobial activity. It is also known to reduce lipopolysaccharide-induced neutrophil influx into murine alveoli as well as to abrogate lipopolysaccharide-induced production of matrix metalloprotease 9, macrophage inhibitory protein 2, and tumor necrosis factor-alpha by as-yet unidentified mechanisms. Elafin / PI3 is a neutrophil serine protease inhibitor expressed in lung and displaying anti-inflammatory and anti-bacterial properties. Elafin / PI3 is a neutrophil and pancreatic elastase-specific inhibitor of skin. It may prevent elastasemediated tissue proteolysis. Elafin / PI3 will regulate proteolytic enzymes during menstruation and will contribute to the innate defense against uterine infection.

Form:PBS

Molecular Weight: 11.3 kDa

Sequences:Met 1-Gln 117

Purity:> 95% by HPLC

Concentration:

Endotoxin Level:<1.0 EU per 1 ug of protein (determined by LAL method)

Storage:Can be stored at +4°C short term (1-2 weeks). For long term storage, aliquot and store at -20°C or -70°C. Avoid repeated freezing and thawing cycles.