

SERPINB5 Human

Serpin Peptidase Inhibitor, Clade B Member 5 Human Recombinant
RCP2048

Product Overview

Name SERPINB5 Human

Description

Serpin Peptidase Inhibitor, Clade B Member 5 Human Recombinant

Accession (Primary) [P36952](#)

Synonyms

PI5, maspin, SERPINB5, serpin peptidase inhibitor clade B (ovalbumin) member 5, Serpin B5, Protease inhibitor 5.

Introduction

SERPINB5 (Maspin) is a tumor suppressor protein of the serine proteinase inhibitor family. Maspin plays a vital role in embryonic development through critical functions in cell adhesion. In addition, Maspin is present in normal breast and prostatic epithelial cells although down regulated in the particular carcinomas. SERPINB5 impedes the growth, invasion, and metastatic properties of mammary tumors as well as the invasive ability of pancreatic ductal adenocarcinoma cells. SERPINB5 being a breast tumor suppressor gene is a significant marker of the disease progression in breast neoplasms. Furthermore, high expression of maspin is linked to squamous cell carcinoma in non-small-cell lung cancer. Moreover, maspin expression has been directly linked with the biological aggressiveness of ovarian carcinoma. Maspin exhibits no serine protease inhibitory activity since it does not undergo the stressed to relaxed conformational transition typical of active serpins.

Source

Escherichia Coli.

Physical Appearance

Sterile Filtered colorless solution.

Formulation

The SERPINB5 solution (1mg/ml) contains 20mM Tris-HCl buffer (pH 8.0), 1mM DTT and 10% glycerol.

Stability

Store at 4°C if entire vial will be used within 2-4 weeks. Store, frozen at -20°C for longer periods of time. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Avoid multiple freeze-thaw cycles.

Purity

Greater than 95.0% as determined by SDS-PAGE.

Amino acid sequence

MGSSHHHHHH SSGLVPRGSH MDALQLANSA FAVDLFKQLC EKEPLGNVLF SPICLSTSLA LAQVGAKGDT
ANEIGQVLHF ENVKDVPFGF QTVTSDVNKL SSFYSLKLIK RLYVDKSLNL STEFISSTKR PYAKELETVD
FKDKLEETKG QINNSIKDLT DGHFENILAD NSVNDQTKILVVNAAYFVGK WMKKFPESET KECPFVRNKT
DTKPVQMMNM EATFCMGNID SINCKIMELP FQNKHLSMFI LLPKDVEDES TGLEKIEKQLNSELSQWTN
PSTMANAKVK LSIPKFKVEK MIDPKACLEN LGLKHIFSED TSDFSGMSET KGVALSNVIH KVCLEITEDG
GDSIEVPGAR ILQHKDELNA DHPFIYIIRH NKTRNIIFFG KFCSP.

Precautions

SERPINB5 Human is for research use only and not for use in diagnostic or therapeutic procedures.

Target Information: ([P36952](#))