

CD45 Protein, Mouse (sf9)

Cat. No.:	HY-P72914
Synonyms:	Receptor-type tyrosine-protein phosphatase C; L-CA; T200; PTPRC; CD45
Species:	Mouse
Source:	Sf9 insect cells
Accession:	AAA39458.1 (N453-S1152)
Gene ID:	19264
Molecular Weight:	Approximately 93 kDa

PROPERTIES

AA Sequence

NGKIQRNGTA	EKCNFHTKAD	RPDKVNGMKT	SRPTDNSINV
TCGPPYETNG	PKTFYILVVR	SGGSFVTKYN	KTNCQFYVDN
LYYSTDYEFLL	VSFHNGVYEG	DSVIRNESTN	FNAKALIIFL
VFLIIVTSIA	LLVVLKYIYD	LRKKRSSNLD	EQQELVERDD
EKQLMDVEPI	HSDILLETYK	RKIADEGR LF	LAEFQSIPRV
FSKFP IKDAR	KPHNQNK NRY	VDILPYDYNR	VELSEINGDA
GSTYINASYI	DGFKEPRKYI	AAQGPRDETV	DDFWRMIWEQ
KATVIVMVTR	CEEGNRNKCA	EYWPSMEEGT	RAFKDIVVTI
NDHKRCPDYI	IQKLNVAHKK	EKATGREVTH	IQFTSWPDHG
VPEDPHLLLK	LRRRVNAFSN	FFSGPIVVHC	SAGVGRTGTY
IGIDAMLEGL	EAEQKVDVYG	YVVKLRRQRC	LMVQVEAQYI
LIHQALVEYN	QFGETE VNLS	ELHSC LHNMK	KRDPSPDPSP
LEAEYQRLPS	YRSWRTQHIG	NQEENKKNR	NSNVVPYDFN
RVPLKHELEM	SKESEPE SDE	SSDDSDSEE	TSKYINASFV
MSYWKPEMMI	AAQGPLKETI	GDFWQMIFQR	KVKVIVMLTE
LVNGDQEVCA	QYWGE GKQTY	GDMEVEMKDT	NRASAYTLRT
FELRHSKRKE	PRTVYQYQCT	TWKGEELPAE	PKDLVSMIQD
LKQKLPKASP	EGMKYHKHAS		

Biological Activity

The enzyme activity of this recombinant protein is testing in progress, we cannot offer a guarantee yet.

Appearance

Solution.

Formulation

Supplied as a 0.2 µm filtered solution of 20 mM Tris, 500 mM NaCl, 10% glycerol, 3 mM DTT, pH 7.4.

Endotoxin Level

<1 EU/µg, determined by LAL method.

Reconstitution

N/A

Storage & Stability

Stored at -80°C for 1 year. It is stable at -20°C for 3 months after opening. It is recommended to freeze aliquots at -80°C for extended storage. Avoid repeated freeze-thaw cycles.

Shipping

Shipping with dry ice.

DESCRIPTION**Background**

Receptor-type tyrosine-protein phosphatase C (CD45), a member of the protein tyrosine phosphatase family, exhibits versatile functions, including heparan sulfate proteoglycan binding activity, heparin binding activity, and protein tyrosine phosphatase activity. It is intricately involved in key processes such as lymphocyte differentiation, positive regulation of macromolecule metabolic processes, and regulation of signal transduction. CD45 acts upstream in lymphocyte-related pathways, including differentiation and activation, while being prominently located in the external side of the plasma membrane, focal adhesion, and membrane raft. Widely expressed in various structures such as the 3rd branchial arch, alimentary system, cardiovascular system, hemolymphoid system, and placenta, CD45's significance is underscored by its association with conditions like systemic lupus erythematosus. The human ortholog of this gene, PTPRC (protein tyrosine phosphatase receptor type C), is implicated in hepatitis C, multiple sclerosis, and severe combined immunodeficiency, highlighting its pivotal role in immune-related disorders^{[1][2][3]}.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA