

PTPRC, 1031-1251aa Human, His tag, E.coli

Cat.NO.: TP03600

3th Edition

Synonyms:Protein tyrosine phosphatase, receptor type, isoform 1, LCA, LY5, B220, CD45, T200, GP180

Description:PTPRC, also known as CD45, is a member of the protein tyrosine phosphatase (PTP) family. PTPs are known to be signaling molecules that regulate a variety of cellular processes including cell growth, differentiation, mitosis, and oncogenic transformation. This PTP contains an extracellular domain, a single transmembrane segment and two tandem intracytoplasmic catalytic domains, and thus is classified as a receptor type PTP. This PTP has been shown to be an essential regulator of T- and B-cell antigen receptor signaling. It functions through either direct interaction with components of the antigen receptor complexes, or by activating various Src family kinases required for the antigen receptor signaling. This PTP also suppresses JAK kinases, and thus functions as a regulator of cytokine receptor signaling. Recombinant human PTPRC protein, fused to His-tag at N-terminus, was expressed in E.coli and purified by using conventional chromatography techniques.

Form:Liquid. In 20mM Tris-HCl buffer (pH 8.0) containing 0.15M NaCl, 10% glycerol, 1mM DTT

Molecular Weight:29.6 kDa (257aa) confirmed by MALDI-TOF

Sequences:

MRGSHHHHHHGMASMTGGQMQGRDLYDDDDKDRWGSVMIAAQGPLKETIGDFWQMIFQRKVKVIVMLTELKHG
DQEICAQYWGEKQTYGDIEVDLKDSDKSSTYTLRVFELRHSKRKDSRTVYQYQYTNWSVEQLPAEPKELISMIQV
VKQKLPQKNSSEGNKHHKSTPLLIHCRDGSQQTGIFCALLNLLESAETEEVVDIFQVVKALRKARPGMVSTFEQYQF
LYDVIASTYPAQNGQVKKNNHQEDKIEFDNE

Purity:> 95% by HPLC

Concentration:0.25 mg/ml (determined by Bradford assay)

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.