

Product datasheet for **AM21059PU-N**

CD45 (PTPRC) Mouse Monoclonal Antibody [Clone ID: PD7/26/16 + 2B11]

Product data:

Product Type:	Primary Antibodies
Clone Name:	PD7/26/16 + 2B11
Applications:	FC, IF, IHC
Recommended Dilution:	Flow Cytometry. Immunofluorescence. Immunohistochemistry on Paraffin Sections: 10 µg/ml.
Reactivity:	Human
Host:	Mouse
Isotype:	IgG1
Clonality:	Monoclonal
Immunogen:	pD7/26/16: Human peripheral blood lymphocytes maintained in T cell growth factor. 2B11: Isolated neoplastic cells from T cell lymphoma.
Specificity:	Recognizes CD45. Cellular Localization: Cell membrane.
Formulation:	10mM PBS, pH 7.4, with 0.2% BSA and 0.09% Sodium Azide State: Purified State: Liquid purified IgG fraction
Concentration:	lot specific
Purification:	Protein G Chromatography
Conjugation:	Unconjugated
Storage:	Store the antibody undiluted at 2-8°C.
Stability:	Shelf life: one year from despatch.
Gene Name:	protein tyrosine phosphatase, receptor type C
Database Link:	Entrez Gene 5788 Human P08575



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Background:

CD45 (PTPRC) is a family of high-molecular weight glycoproteins uniquely expressed on the surface of all leukocytes and their hematopoietic progenitors. The CD45 family consists of multiple members that are all products of a single gene. Structurally, CD45 is composed of one fibronectin extracellular domain, one transmembrane domain, and two cytoplasmic tyrosine phosphatase domains. It is essential for B- and T-cell activation. For both cell-types, CD45 has been shown to interact with kinases including Lyn, src family kinase Lck, and Janus-family kinases. In T cells, CD45 is required for the initiation of receptor signaling by dephosphorylating a negative regulatory tyrosine in the C-terminal tail of Lck. CD45 may also negatively regulate Lck by dephosphorylating the tyrosine in the activation loop, thereby attenuating Lck activity.

Synonyms:

PTPRC, Leukocyte common antigen, L-CA, T200

Note:

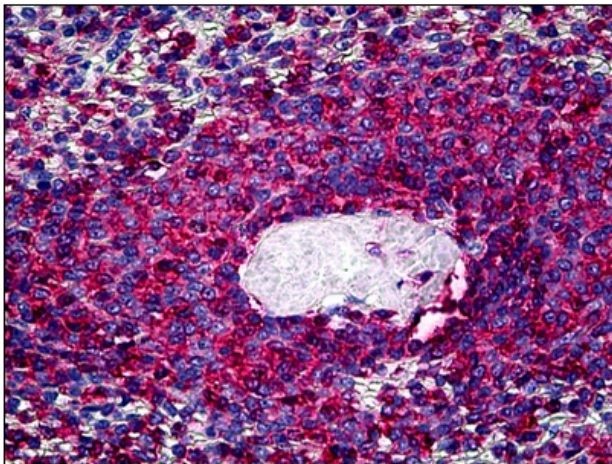
Molecular Weight: 220, 205, 190, 180 kDa

Protein Families:

Druggable Genome, ES Cell Differentiation/IPS, Phosphatase, Transmembrane

Protein Pathways:

Cell adhesion molecules (CAMs), Fc gamma R-mediated phagocytosis, Primary immunodeficiency, T cell receptor signaling pathway

Product images:

Human Spleen: Formalin-Fixed, Paraffin-Embedded (FFPE)