

1P-315-T100

Monoclonal Antibody to CD222 Phycoerythrin (PE) conjugated (100 tests)

Clone: MEM-238

Isotype: Mouse IgG1

Specificity: The antibody MEM-238 recognizes an epitope between amino acids 192-697 of CD222 (IGF2 receptor), a ubiquitously expressed 250 kDa multifunctional type I transmembrane protein. The majority of CD222 is found in the late endosomal/prelysosomal compartment, 5-10% in the plasma membrane and the truncated (220 kDa) form of CD222 is present in human and bovine serum. HLDA VII; WS Code 70640

Regulatory Status: RUO

Immunogen: Recombinant Vaccinia virus encoding CD222.

Species Reactivity: Human, Non-Human Primates

Preparation: The purified antibody is conjugated with R-Phycoerythrin (PE) under optimum conditions. The conjugate is purified by size-exclusion chromatography and adjusted for direct use. No reconstitution is necessary.

Storage Buffer: The reagent is provided in stabilizing phosphate buffered saline (PBS) solution containing 15mM sodium azide.

Storage / Stability: Store in the dark at 2-8°C. Do not freeze. Avoid prolonged exposure to light. Do not use after expiration date stamped on vial label.

Usage: The reagent is designed for Flow Cytometry analysis of human blood cells using 20 μl reagent / 100 μl of whole blood or 10⁶ cells in a suspension. The content of a vial (2 ml) is sufficient for 100 tests.

Expiration: See vial label

Lot Number: See vial label

Background: CD222 (CIMPR, cation-independent mannose 6-phosphate receptor; IGF2 receptor) is a ubiquitously expressed 250 kDa transmembrane protein. No more than 10% of CD222 is present on the cell surface where it serves as a multifunctional receptor. Intracellular (major) fraction of CD222 is involved in transport of newly synthesized lysosomal enzymes modified by mannose 6-phosphate from Golgi apparatus to lysosomes. The cell surface CD222 binds and internalizes exogeneous mannose 6-phosphate-containing ligands. Importantly, CD222 is crutial for internalization and degradation of insulin-like growth factor 2, thus controling cell growth. CD222 also complexes CD87 (urokinase-type plasminogen-activator receptor), plasminogen and latent TGF-beta, last but not least CD222 serves as a receptor for heparanase and even for Listeria.

For laboratory research only, not for drug, diagnostic or other use.





Antibodies

References:

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