PacBlue Anti-human/mouse CD44 Antibody *IM7*

Catalog number: 104411J0, 104411J1
Unit size: 100 tests, 500 tests

Product Details

Storage Conditions	2-8°C with minimized light exposure. Do not freeze.
Expiration Date	12 months upon receiving
Concentration	0.1 mg/mL
Formulation	Phosphate-buffered saline (PBS, pH 7.2), 0.09% sodium azide, 0.2% (w/v) BSA

Antibody Properties

Species Reactivity	Human, mouse
Class	Primary
Clonality	Monoclonal
Host	Rat
Immunogen	CD44 (ECMR-III, Pgp-1, HUTCH-1, H-CAM)
Clone	IM7
Conjugate	PacBlue

Biological Properties

Appearance	Light yellow liquid
Preparation	Antibody purified by affinity chromatography and then conjugated with PacBlue under optimal conditions
Application	Flow Cytometry (FACS), Fluorescence Imaging

Spectral Properties

Conjugate	PacBlue
Excitation Wavelength	404 nm
Emission Wavelength	455 nm

Applications

IM7 is an anti-human/mouse monoclonal antibody that targets the CD44 antigen. CD44 (sometimes referred to as Epican, H-CAM, PGP-1 or ECMR III) is a 85 kD glycoprotein that is found on the surface of cells like NK cells, endothelial cells and macrophages. CD44 is involved with key cellular pathways, in particular, the negative regulation of intrinsic apoptotic signaling pathway in response to DNA damage by p53 class mediator and interferon-gamma-mediated signaling pathway. Moreover, in some organisms, it upregulates peptidyl-tyrosine phosphorylation, plays a role in the upregulation of ERK1 and ERK2 cascade and is a positive regulator of peptidyl-serine phosphorylation. From a research

standpoint, it is of biological interest due to its association with vital macromolecules/ligands like MIP1β, Ankyrin, Collagen and Osteopontin. CD44 is a very popular antibody target, with over 40000 publications in the last decade. CD44 is vital to cell adhesion, cell biology and immunology research, often serving as a phenotypic marker for differentiating cell types in flow cytometric applications. This antibody was purified through affinity chromatography and conjugated to PacBlue (ex/em = 404/455 nm). It is compatible with the 405 nm laser and 456/51 nm bandpass filter (for example, as in the Luminex Amnis CellStream).