iFluor™ 840 Anti-human CD47 Antibody *B6.H12*

Catalog number: 104720Q0, 104720Q1
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
Class	Primary
Clonality	Monoclonal
Host	Mouse
Isotype	Mouse igg1, κ
Immunogen	CD47 (gp42, IAP, neurophilin, MER6, Integrin associated protein)
Clone	B6.H12
Conjugate	iFluor™ 840

Biological Properties

Appearance	Dark brown liquid
Preparation	Antibody purified by affinity chromatography and then conjugated with iFluor™ 840 under optimal conditions
Application	Flow Cytometry (FACS), Fluorescence Imaging

Spectral Properties

Conjugate	iFluor™ 840
Excitation Wavelength	836 nm
Emission Wavelength	879 nm

Applications

B6.H12 is an anti-human monoclonal antibody that is specific for the CD47 antigen. CD47 (sometimes called MER6, Integrin associated protein or integrin-associated protein) is a 42 - 52 kD multi-pass membrane protein that is located on the surface of cells like T cells, erythrocytes, epithelial cells and endothelial cells. CD47 acts in essential cellular pathways, for instance, the negative regulation of Fc-gamma receptor

signaling pathway involved in phagocytosis and integrin-mediated signaling pathway. Also, in some organisms, it is involved in the positive regulation of stress fiber assembly, is a promoter of T cell activation and positively regulates phagocytosis. From a research standpoint, it is of biological interest due to its association with vital macromolecules/ligands like CD61. CD47 is a fairly uncommon antibody target, with a little more than 5000 publications in the last decade. Even still, CD47 is frequently used in flow cytometry applications as a phenotypic marker for differentiation of cell types, particularly in the study of immunology. This antibody was purified through affinity chromatography and conjugated to iFluor™ 840 (ex/em = 836/879 nm).