

ARG63079 anti-NTAL / LAB antibody [NAP-07]

Package: 100 µg
Store at: -20°C

Summary

Product Description	Mouse Monoclonal antibody [NAP-07] recognizes NTAL / LAB
Tested Reactivity	Hu, Ms
Tested Application	FACS, ICC/IF, IP, WB
Specificity	The clone NAP-07 reacts with Non-T cell activation linker (NTAL), also known as LAB (linker of activated B cells), a 25 - 30 kDa transmembrane adaptor protein present in membrane microdomains (rafts) of B lymphocytes, NK cells and myeloid cells.
Host	Mouse
Clonality	Monoclonal
Clone	NAP-07
Isotype	IgG1
Target Name	NTAL / LAB
Species	Human
Immunogen	Recombinant cytoplasmic domain (aa 91-243) of human NTAL.
Conjugation	Un-conjugated
Alternate Names	Membrane-associated adapter molecule; Non-T-cell activation linker; WSCR5; WBSCR15; Linker for activation of B-cells; HSPC046; LAB; WBSCR5; NTAL; Williams-Beuren syndrome chromosomal region 15 protein; Linker for activation of T-cells family member 2; Williams-Beuren syndrome chromosomal region 5 protein

Application Instructions

Application table	Application	Dilution
	FACS	1 - 4 µg/ml
	ICC/IF	Assay-dependent
	IP	Assay-dependent
	WB	2 µg/ml
Application Note	<p>WB: Antibody incubation: 60 min. Sample preparation: Resuspend approx. 50 mil. cells in 1 ml cold Lysis buffer (1% laurylmaltoside in 20 mM Tris/Cl, 100 mM NaCl pH 8.2, 50 mM NaF including Protease inhibitor Cocktail). Incubate 60 min on ice. Centrifuge to remove cell debris. Mix lysate with non-reducing SDS-PAGE sample buffer. Application note: Non-reducing condition. 12% separating SDS-PAGE gel.</p> <p>* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.</p>	
Positive Control	<p>FACS: Positive control: Raji and Ramos WB: Positive control: Ramos. Negative control: HeLa</p>	

Properties

Form	Liquid
Purification	Purified from hybridoma culture supernatant by protein-A affinity chromatography.
Purity	> 95% (by SDS-PAGE)
Buffer	PBS (pH 7.4) and 15 mM Sodium azide
Preservative	15 mM Sodium azide
Concentration	1 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C or below. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.
Note	For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

Database links	GeneID: 56743 Mouse GeneID: 7462 Human Swiss-port # Q9GZY6 Human Swiss-port # Q9JHL0 Mouse
Gene Symbol	LAT2
Gene Full Name	linker for activation of T cells family, member 2
Background	NTAL (Non-T cell activation linker), also known as LAB (Linker for activation of B cells), is a 30 kDa double-palmitoylated transmembrane adaptor protein expressed by B cells, NK cells, mast cells and macrophages. It is a negative regulator of early stages of BCR-dependent B cell signaling and serves as a negative regulator also in mast cells. However, in mast cells, NTAL also contributes to some activation processes, partially overlapping with LAT function.
Function	Involved in FCER1 (high affinity immunoglobulin epsilon receptor)-mediated signaling in mast cells. May also be involved in BCR (B-cell antigen receptor)-mediated signaling in B-cells and FCGR1 (high affinity immunoglobulin gamma Fc receptor I)-mediated signaling in myeloid cells. Couples activation of these receptors and their associated kinases with distal intracellular events through the recruitment of GRB2. [UniProt]
Research Area	Immune System antibody; Signaling Transduction antibody
Calculated Mw	27 kDa
PTM	Phosphorylated on tyrosines following cross-linking of BCR in B-cells, FCGR1 in myeloid cells, or FCER1 in mast cells; which induces the recruitment of GRB2. May be polyubiquitinated.



ARG63079 anti-NTAL / LAB antibody [NAP-07] ICC/IF image

Immunofluorescence: THP-1 cells stained with ARG63079 anti-NTAL / LAB antibody [NAP-07] (green).

Nuclei was stained with propidium iodide (red).
