

Clathrin, Light Chain Monoclonal Mouse Antibody (CLC/1421)

Product Description

This antibody recognizes proteins of 31-44 kDa, which are identified as Clathrin Light Chains (both A & B). Clathrin is composed of three heavy chains and three light chains, which associate non-covalently to form a triskelion structure. Clathrin light chain regulates the self-assembly of triskelions onto intracellular membranes. Clathrin light chain subunits (LCA and LCB) contribute to regulation of coated vesicle formation to sort proteins during receptor-mediated endocytosis and organelle biogenesis. LCA and LCB are encoded by two discrete genes. They share only 60% homology, and have certain features in common. Both LCA and LCB undergo alternative mRNA splicing, which results in the generation of tissue-specific isoforms.

Primary antibodies are available purified, or with a selection of fluorescent CF® dyes and other labels. CF® dyes offer exceptional brightness and photostability. See the [CF® Dye Brochure](#) for more information. Note: Conjugates of blue fluorescent dyes like CF®405S and CF®405M are not recommended for detecting low abundance targets, because blue dyes have lower fluorescence and can give higher non-specific background than other dye colors.

Stock status: Because Biotium offers a large number of antibody and conjugation options, primary antibody conjugates may be made to order. Typical lead times are up to one week for CF® dye and biotin conjugates, and up to 2-3 weeks for fluorescent protein and enzyme conjugates. Please email order@biotium.com to inquire about stock status and lead times before placing your order.

Catalog number key for antibody number 1421, Anti-Clathrin, Light Chain (CLC/1421)

Product attributes

Antibody number	#1421
Antibody reactivity (target)	Clathrin, Light Chain
Antibody type	Primary
Host species	Mouse
Clonality	Monoclonal
Clone	CLC/1421
Isotype	IgG2b, kappa
Molecular weight of antigen	31-44 kDa
Synonyms	Clathrin light chain A; Clathrin light chain B; Clathrin light chain LCA; Clathrin light chain LCB; Clathrin light polypeptide A; Clathrin light polypeptide B; Clathrin, light polypeptide (Lca); Clathrin, light polypeptide (Lcb); CLTA; CLTB
Human gene symbol	CLTA, CLTB
Entrez gene ID	1211, 1212
SwissProt	P09496, P09497
Unigene	484241, 522114
Immunogen	Purified recombinant N-terminal fragment of human Clathrin Light Chain
Verified antibody applications	IHC (FFPE) (verified)
Antibody target cellular localization	Cytoplasmic, Lysosomes, Vesicular
Species reactivity	Human
Antibody application notes	Higher concentration may be required for direct detection using primary antibody conjugates than for indirect detection with secondary antibody. Immunofluorescence: 1-2 ug/mL. Immunohistology (formalin): 0.5-1 ug/mL. Staining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 min followed by cooling at RT for 20 min. Flow Cytometry 0.5-1 ug/million cells/0.1 mL, Western blotting 0.5-1 ug/mL. Optimal dilution for a specific application should be determined by user
Positive control	HeLa cells. Placenta or Prostate Carcinoma.
Shipping condition	Room temperature
Storage Conditions	Store at 2 to 8 °C. Protect fluorescent conjugates from light. Note: store BSA-free antibodies at -10 to -35 °C
Shelf life	Guaranteed for at least 24 months from date of receipt when stored as recommended
Regulatory status	For research use only (RUO)
Antibody/conjugate formulation	Conjugates: 0.1 mg/mL in PBS/0.1% BSA/0.05% azide, HRP conjugates: 0.1 mg/mL in PBS/0.05% BSA, Purified: 0.2 mg/mL in PBS/0.05% BSA/0.05% azide, Purified, BSA-free: 1 mg/mL in PBS without azide
Antibody research areas	Membrane trafficking
Product origin	Product may contain either bovine serum albumin (BSA) from bovine serum (<i>Bos taurus</i>), or recombinant BSA produced in Chinese hamster ovary cells. Inquire for the specific lot.

Antibody # prefix	Conjugation	Ex/Em (nm)	Laser line	Detection channel	Dye Features
BNC04	CF®405S	404/431	405	DAPI (microscopy), AF405	CF®405S Features
BNC88	CF®488A	490/515	488	GFP, FITC	CF®488A Features
BNC68	CF®568	562/583	532, 561	RFP, TRITC	CF®568 Features
BNC94	CF®594	593/614	561	Texas Red®	CF®594 Features
BNC40	CF®640R	642/662	633-640	Cy®5	CF®640R Features
BNC47	CF®647	650/665	633-640	Cy®5	CF®647 Features
BNC74	CF®740	742/767	633-685	775/50	CF®740 Features
BNCB	Biotin	N/A	N/A	N/A	
BNUB	Purified	N/A	N/A	N/A	
BNUM	Purified, BSA-free	N/A	N/A	N/A	

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