ARG57505
anti-Calnexin antibody [18B9]

Package: 50 µl
Store at: -20°C

Summary

Product Description	Mouse Monoclonal antibody [18B9] recognizes Calnexin
Tested Reactivity	Hu
Tested Application	FACS, ICC/IF, WB
Host	Mouse
Clonality	Monoclonal
Clone	18B9
Isotype	IgG1, kappa
Target Name	Calnexin
Species	Human
Immunogen	Recombinant Human Calnexin (aa. 21-481) purified from E. coli.
Conjugation	Un-conjugated
Alternate Names	P90; CNX; p90; Major histocompatibility complex class I antigen-binding protein p88; Calnexin; IP90

Application Instructions

Application table

Application	Dilution
FACS	2 - 5 µg/10^6 cells
ICC/IF	1:100
WB	1:1000

Application Note: * The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.

Properties

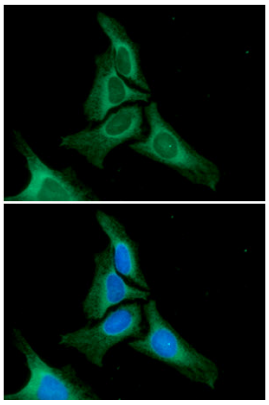
Form	Liquid
Purification	Purification with Protein A.
Buffer	PBS (pH 7.4), 0.02% Sodium azide and 10% Glycerol.
Preservative	0.02% Sodium azide
Stabilizer	10% Glycerol
Concentration	1 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C. 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

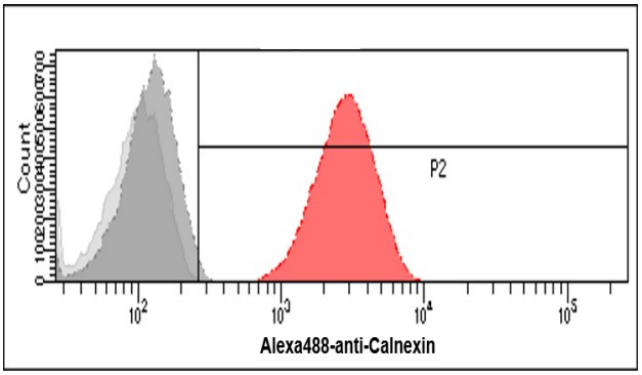
Gene Symbol	CANX
Gene Full Name	calnexin
Background	This gene encodes a member of the calnexin family of molecular chaperones. The encoded protein is a calcium-binding, endoplasmic reticulum (ER)-associated protein that interacts transiently with newly synthesized N-linked glycoproteins, facilitating protein folding and assembly. It may also play a central role in the quality control of protein folding by retaining incorrectly folded protein subunits within the ER for degradation. Alternatively spliced transcript variants encoding the same protein have been described. [provided by RefSeq, Jul 2008]
Function	Calcium-binding protein that interacts with newly synthesized glycoproteins in the endoplasmic reticulum. It may act in assisting protein assembly and/or in the retention within the ER of unassembled protein subunits. It seems to play a major role in the quality control apparatus of the ER by the retention of incorrectly folded proteins. Associated with partial T-cell antigen receptor complexes that escape the ER of immature thymocytes, it may function as a signaling complex regulating thymocyte maturation. Additionally it may play a role in receptor-mediated endocytosis at the synapse. [UniProt]
Calculated Mw	68 kDa
PTM	Phosphorylated at Ser-564 by MAPK3/ERK1. phosphorylation by MAPK3/ERK1 increases its association with ribosomes (By similarity). Palmitoylation by DHHC6 leads to the preferential localization to the perinuclear rough ER. It mediates the association of calnexin with the ribosome-translocon complex (RTC) which is required for efficient folding of glycosylated proteins. Ubiquitinated, leading to proteasomal degradation. Probably ubiquitinated by ZNRF4.

Images



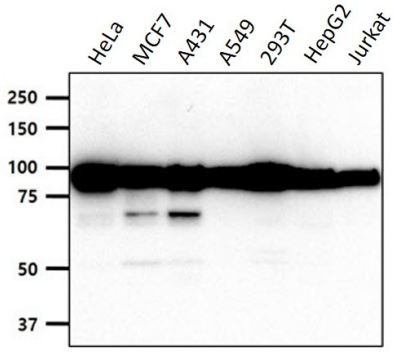
ARG57505 anti-Calnexin antibody [18B9] ICC/IF image

Immunoflorescense: HeLa cells stained with ARG57505 anti-Calnexin antibody [18B9] at 1:100 dilution. The secondary antibody (green) was used Alexa Fluor 488. DAPI was stained the cell nucleus (blue).



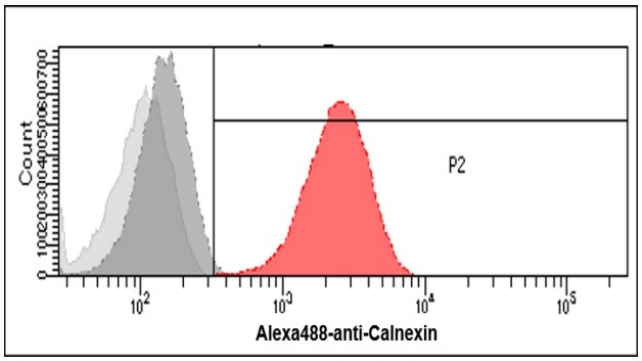
ARG57505 anti-Calnexin antibody [18B9] FACS image

Flow Cytometry: HeLa cells stained with ARG57505 anti-Calnexin antibody [18B9] at 2 - 5 µg/10^6 cells (red). Goat-anti Mouse IgG (Alexa fluor 488) was used as the secondary antibody. Mouse monoclonal IgG was used as the isotype control (dark gray), cells without incubation with primary and secondary antibody was used as the negative control (light gray).



ARG57505 anti-Calnexin antibody [18B9] WB image

Western blot: 40 µg of HeLa, MCF7, A431, A549, 293T, HepG2 and Jurkat cell lysates stained with ARG57505 anti-Calnexin antibody [18B9] at 1:1000 dilution.



ARG57505 anti-Calnexin antibody [18B9] FACS image

Flow Cytometry: A549 cells stained with ARG57505 anti-Calnexin antibody [18B9] at 2 - 5 µg/10^6 cells (red). Goat-anti Mouse IgG (Alexa fluor 488) was used as the secondary antibody. Mouse monoclonal IgG was used as the isotype control (dark gray), cells without incubation with primary and secondary antibody was used as the negative control (light gray).