ARG64364
anti-alpha B Crystallin antibody

Package: 100 µg
Store at: -20°C

Summary

Product Description	Goat Polyclonal antibody recognizes alpha B Crystallin
Tested Reactivity	Ms, Rat
Predict Reactivity	Hu
Tested Application	WB
Host	Goat
Clonality	Polyclonal
Isotype	IgG
Target Name	alpha B Crystallin
Species	Human
Immunogen	C-RLEKDRFSVNLD
Conjugation	Un-conjugated
Alternate Names	HSPB5; Rosenthal fiber component; Renal carcinoma antigen NY-REN-27; MFM2; Alpha; CTRCT16; B; HspB5; Heat shock protein beta-5; HEL-S-101; CTPP2; CMD1II; CRYA2; Alpha-crystallin B chain

Application Instructions

Application table

Application	Dilution
WB	0.03 - 0.1 µg/ml

Application Note

WB: Recommend incubate at RT for 1h.
* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.

Properties

Form	Liquid
Purification	Purified from goat serum by antigen affinity chromatography.
Buffer	Tris saline (pH 7.3), 0.02% Sodium azide and 0.5% BSA.
Preservative	0.02% Sodium azide
Stabilizer	0.5% BSA
Concentration	0.5 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: 12955 Mouse GeneID: 25420 Rat Swiss-port # P23927 Mouse Swiss-port # P23928 Rat
Background	Crystallins are separated into two classes: taxon-specific, or enzyme, and ubiquitous. The latter class constitutes the major proteins of vertebrate eye lens and maintains the transparency and refractive index of the lens. Since lens central fiber cells lose their nuclei during development, these crystallins are made and then retained throughout life, making them extremely stable proteins. Mammalian lens crystallins are divided into alpha, beta, and gamma families; beta and gamma crystallins are also considered as a superfamily. Alpha and beta families are further divided into acidic and basic groups. Seven protein regions exist in crystallins: four homologous motifs, a connecting peptide, and N- and C-terminal extensions. Alpha crystallins are composed of two gene products: alpha-A and alpha-B, for acidic and basic, respectively. Alpha crystallins can be induced by heat shock and are members of the small heat shock protein (sHSP also known as the HSP20) family. They act as molecular chaperones although they do not renature proteins and release them in the fashion of a true chaperone; instead they hold them in large soluble aggregates. Post-translational modifications decrease the ability to chaperone. These heterogeneous aggregates consist of 30-40 subunits; the alpha-A and alpha-B subunits have a 3:1 ratio, respectively. Two additional functions of alpha crystallins are an autokinase activity and participation in the intracellular architecture. Alpha-A and alpha-B gene products are differentially expressed; alpha-A is preferentially restricted to the lens and alpha-B is expressed widely in many tissues and organs. Elevated expression of alpha-B crystallin occurs in many neurological diseases; a missense mutation cosegregated in a family with a desmin-related myopathy. [provided by RefSeq, Jul 2008]
Research Area	Cancer antibody; Metabolism antibody; Neuroscience antibody; Signaling Transduction antibody
Calculated Mw	20 kDa

Images

ARG64364 anti-alpha B Crystallin antibody WB image

Western blot: 35 µg of Mouse (A) and Rat (B) eye lysates (in RIPA buffer) stained with ARG64364 anti-alpha B Crystallin antibody at 0.05 µg/ml dilution and incubated at RT for 1 hour.