

ARG62961 anti-ApoJ / Clusterin antibody [Hs-3]

Package: 100 μg Store at: -20°C

Summary

Product Description	Mouse Monoclonal antibody [Hs-3] recognizes ApoJ / Clusterin
Tested Reactivity	Hu
Species Does Not React With	Bov, Cat, Dog, Pig
Tested Application	ELISA, ICC/IF, IHC-P, WB
Host	Mouse
Clonality	Monoclonal
Clone	Hs-3
Isotype	lgG1
Target Name	ApoJ / Clusterin
Species	Human
Immunogen	Freshly ejaculated human sperms were washed in PBS and extracted in 3% acetic acid, 10% glycerol, 30 mM benzaminidine. The acid extract was dialyzed against 0.2% acetic acid and subsequently used for immunization.
Conjugation	Un-conjugated
Alternate Names	Clusterin; Apolipoprotein J; SGP-2; SP-40; APOJ; ApoJbeta; CLU2; CLU1; NA1/NA2; TRPM2; CLI; SGP2; Apo-J; TRPM-2; ApoJalpha; Aging-associated gene 4 protein; APO-J; Complement cytolysis inhibitor a chain; Ku70-binding protein 1; Complement cytolysis inhibitor b chain; Testosterone-repressed prostate message 2; Complement-associated protein SP-40,40; KUB1; AAG4; Complement cytolysis inhibitor

Application Instructions

Application table	Application	Dilution
	ELISA	Assay-dependent
	ICC/IF	Assay-dependent
	IHC-P	10 μg/ml
	WB	1 μg/ml
Application Note	* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	
Positive Control	WB: Seminal plasma IHC-P: Sertoli cells	

Properties

Form	Liquid
Purification	Purified from ascites 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	GenelD: 1191 Human
	Swiss-port # P10909 Human
Gene Symbol	CLU
Gene Full Name	clusterin
Background	Clusterin (APO J, SGP-2, TRPM-2, SP-40, pADHC-9, CLJ, T64, GP III, XIP8) is a 75-80 kD disulfide-linked heterodimeric protein containing about 30% of N-linked carbohydrate rich in sialic acid but truncated forms targeted to the nucleus have also been identified. It is a conserved secreted glycoprotein expressed by a wide range of tissues and being implicated in many physiological processes, including e.g. lipid transportation, complement inhibition, tissue remodeling, membrane recycling, or clearence of cellular debris. It is nearly ubiqitously expressed in most mammalian tissues and can be found in plasma, milk, urine, cerebrospinal fluid and semen. Clusterin is able to bind and form complexes with numerous partners (immunoglobulins, lipids, heparin, bacteria, complement components, paraoxonase, beta amyloid, leptin etc.) and is expressed in many pathological and clinically relevant situations including cancer, organ regeneration, infection, Alzheimer disease, retinitis pigmentosa, myocardial infarction, renal tubular damage, autoimmunity and others. A genuine function of clusterin is still enigmatic.
Function	Isoform 1 functions as extracellular chaperone that prevents aggregation of nonnative proteins. Prevents stress-induced aggregation of blood plasma proteins. Inhibits formation of amyloid fibrils by APP, APOC2, B2M, CALCA, CSN3, SNCA and aggregation-prone LYZ variants (in vitro). Does not require ATP. Maintains partially unfolded proteins in a state appropriate for subsequent refolding by other chaperones, such as HSPA8/HSC70. Does not refold proteins by itself. Binding to cell surface receptors triggers internalization of the chaperone-client complex and subsequent lysosomal or proteasomal degradation. Secreted isoform 1 protects cells against apoptosis and against cytolysis by complement. Intracellular isoforms interact with ubiquitin and SCF (SKP1-CUL1-F-box protein) E3 ubiquitin-protein ligase complexes and promote the ubiquitination and subsequent proteasomal degradation of target proteins. Promotes proteasomal degradation of COMMD1 and IKBKB. Modulates NF-kappa-B transcriptional activity. Nuclear isoforms promote apoptosis. Mitochondrial isoforms suppress BAX- dependent release of cytochrome c into the cytoplasm and inhibit apoptosis. Plays a role in the regulation of cell proliferation. [UniProt]
Research Area	Cancer antibody; Cell Biology and Cellular Response antibody; Immune System antibody; Metabolism antibody; Signaling Transduction antibody
Calculated Mw	52 kDa
PTM	Isoform 1 is proteolytically cleaved on its way through the secretory system, probably within the Golgi lumen. Polyubiquitinated, leading to proteasomal degradation. Heavily N-glycosylated. About 30% of the protein mass is comprised of complex N-linked carbohydrate.



ARG62961 anti-ApoJ / Clusterin antibody [Hs-3] WB image

Western blot: Human seminal plasma lysate stained with ARG62961 anti-ApoJ / Clusterin antibody [Hs-3], in non-reducing conditions.