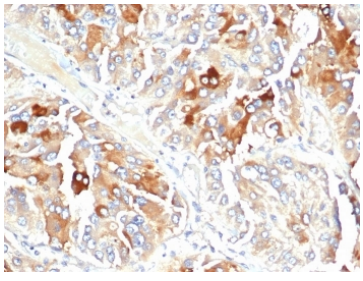
# APO-J Antibody / Lipid Transport and Chaperone Protein [clone CLU/4723] (V9373)

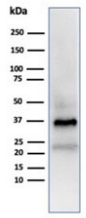
| Catalog No. | Formulation | Size |
|---|---|---|
| V9373-100UG | 0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced), 0.05% sodium azide | 100 ug |
| V9373-20UG | 0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced), 0.05% sodium azide | 20 ug |
| V9373SAF-100UG | 1 mg/ml in 1X PBS; BSA free, sodium azide free | 100 ug |

**Bulk quote request**

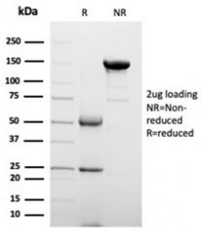
| | |
|---|---|
| **Availability** | 1-3 business days |
| **Species Reactivity** | Human |
| **Format** | Purified |
| **Host** | Mouse |
| **Clonality** | Monoclonal (mouse origin) |
| **Isotype** | Mouse IgG2b, kappa |
| **Clone Name** | CLU/4723 |
| **Purity** | Protein A/G affinity |
| **UniProt** | P10909 |
| **Localization** | Nucleus, Cytoplasm |
| **Applications** | Western blot: 2-4ug/ml<br>Immunohistochemistry (FFPE): 1-2ug/ml |
| **Limitations** | This APO-J Antibody / Lipid Transport and Chaperone Protein is available for research use only. |



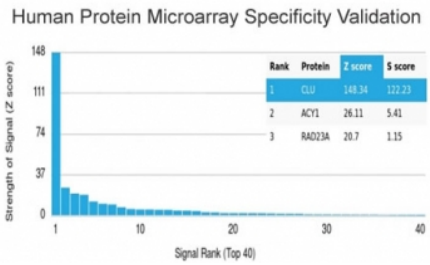
APO-J Antibody Adrenal Gland IHC. Immunohistochemistry analysis of FFPE human adrenal gland tissue using APO-J antibody. The mouse monoclonal antibody clone CLU/4723 demonstrates cytoplasmic staining in glandular cells, consistent with Clusterin / APO-J expression as a lipid transport and chaperone protein. Signal is observed within adrenal cortical cell populations, reflecting the presence of this secreted glycoprotein in metabolically active and lipid-associated tissue environments, while surrounding stromal elements show lower staining. HIER: boil tissue sections in 10 mM Tris with 1 mM EDTA, pH 9, for 20 min followed by cooling prior to staining.




APO-J Antibody Testis WB. Western blot analysis of human testis lysate using APO-J antibody. The mouse monoclonal antibody clone CLU/4723 detects bands at approximately 75-80 kDa and lower molecular weight bands around 34-39 kDa, consistent with the predicted molecular weight of full-length Clusterin / APO-J and its processed alpha and beta subunits. This banding pattern reflects proteolytic cleavage and glycosylation of this secreted chaperone protein, supporting its role in lipid transport and extracellular protein stabilization in western blot analysis.




SDS-PAGE analysis of purified, BSA-free APO-J antibody (clone CLU/4723) as confirmation of integrity and purity.




APO-J Antibody Protein Microarray Specificity Validation. Analysis of HuProt(TM) microarray containing more than 19,000 full-length human proteins using APO-J antibody. The mouse monoclonal antibody clone CLU/4723 shows a strong and specific signal for Clusterin / APO-J, with a high Z-score and clear separation from non-target proteins, supporting its specificity as a lipid transport and chaperone protein marker. The Z-score reflects signal intensity above background, while the S-score indicates the degree of separation from the next highest signal, confirming selective binding to the intended target.

## Description

Clusterin (CLU), also known as Apolipoprotein J (APO-J), is a secreted glycoprotein that functions as both a molecular chaperone and a lipid-associated protein involved in extracellular homeostasis. APO-J antibody is widely used to study this proteinÃ¢Â€Â™s role in lipid transport, protein stabilization, and extracellular signaling, particularly in tissues where lipoprotein metabolism and protein turnover are tightly coordinated.

APO-J antibody, also referred to as Clusterin antibody, CLU antibody, or Apolipoprotein J antibody in the literature, enables detection of this multifunctional protein in pathways associated with lipid transport and extracellular chaperone activity. Clusterin associates with high-density lipoprotein-like particles and other lipid-protein complexes, where it contributes to maintaining solubility and preventing aggregation of extracellular proteins. This lipoprotein-associated chaperone function is a defining characteristic of APO-J biology and clearly differentiates it from intracellular stress-response proteins.

Functionally, APO-J binds hydrophobic regions of partially unfolded proteins, forming soluble complexes that facilitate extracellular clearance and prevent deposition in tissues. In parallel, its association with lipoproteins allows it to participate in lipid transport, membrane remodeling, and extracellular signaling processes. APO-J antibody is therefore particularly valuable for studying the interface between lipid metabolism and protein homeostasis, especially in systems involving secreted proteins and circulating factors.

APO-J is broadly expressed in epithelial tissues, liver, and secretory environments, where it is released into extracellular fluids including plasma and interstitial spaces. Its presence in circulation allows it to act in a paracrine and systemic manner, influencing neighboring cells and contributing to tissue-level homeostasis. This extracellular distribution and mobility reinforce its role as a mediator of protein stability and lipid-associated transport mechanisms.

Subcellularly, APO-J is synthesized in the endoplasmic reticulum, glycosylated, and secreted through the classical

secretory pathway. Post-translational processing results in heterodimeric forms and heavily glycosylated variants that may be detected as multiple bands in western blot analysis. In immunohistochemistry, APO-J is typically observed in both cytoplasmic and extracellular compartments, consistent with its synthesis, secretion, and accumulation in the tissue microenvironment.

This APO-J antibody is supported by immunohistochemistry and western blot data demonstrating detection of Clusterin in relevant biological samples, along with protein microarray specificity validation confirming selective binding. Together, these features support its use in studies of lipid transport, extracellular chaperone function, and secreted protein biology.

This antibody is part of a broader range of Clusterin antibody products supporting research into chaperone function, stress response, and disease biology.

## Application Notes

Optimal dilution of the APO-J Antibody / Lipid Transport and Chaperone Protein should be determined by the researcher.

## Immunogen

A portion of amino acids 150-300 was used as the immunogen for the APO-J antibody.

## Storage

Aliquot the APO-J antibody and store frozen at -20oC or colder. Avoid repeated freeze-thaw cycles.

## Alternate Names

Clusterin antibody, CLU antibody, Apolipoprotein J antibody, APO-J protein antibody, Lipoprotein-associated clusterin antibody


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