

ARSB Antibody

Catalog # ASC11693

Product Information

Application WB, IF, E, IHC-P

Primary Accession P15848

Other AccessionNP_000037, 38569405ReactivityHuman, Mouse, Rat

Host Rabbit
Clonality Polyclonal
Isotype IgG
Calculated MW 59687
Concentration (mg/ml) 1 mg/mL
Conjugate Unconjugated

Application Notes ARSB antibody can be used for detection of ARSB by Western blot at 1 - 2

□g/ml.

Additional Information

Gene ID 411

Other Names Arylsulfatase B, ASB, 3.1.6.12, N-acetylgalactosamine-4-sulfatase, G4S, ARSB

Target/Specificity ARSB; ARSB antibody is human, mouse and rat reactive. At least two isoforms

of ARSB are known to exist; this antibody only recognizes the longest isoform.

Reconstitution & Storage ARSB antibody can be stored at 4°C for three months and -20°C, stable for up

to one year.

Precautions ARSB Antibody is for research use only and not for use in diagnostic or

therapeutic procedures.

Protein Information

Name ARSB

Function Removes sulfate groups from chondroitin-4-sulfate (C4S) and regulates its

degradation (PubMed:<u>19306108</u>). Involved in the regulation of cell adhesion, cell migration and invasion in colonic epithelium (PubMed:<u>19306108</u>). In the central nervous system, is a regulator of neurite outgrowth and neuronal plasticity, acting through the control of sulfate glycosaminoglycans and

neurocan levels (By similarity).

Cellular Location Lysosome {ECO:0000250|UniProtKB:P50429}. Cell surface

{ECO:0000250 | UniProtKB:P50429}

Background

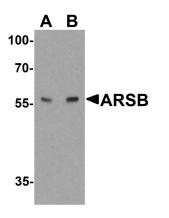
Aryl sulfatase B (ARSB) forms a homodimer that hydrolyzes sulfate groups of N-Acetyl-D-galactosamine, chondriotin sulfate, and dermatan sulfate (1). ARSB localizes to the lysozyme as well as to the extracellular matrix (2). Mucopolysaccharidosis type VI is an autosomal recessive lysosomal storage disorder resulting from a deficiency of arylsulfatase B (3), and can be treated with exogenous ARSB (4).

References

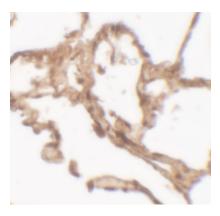
Wasserman SI and Austen KF. Arylsulfatase B of human lung. Isolation, characterization, and interaction with slow-reacting substance of anaphylaxis. J. Clin. Invest. 1976; 57:738-44.

Mitsunaga-Nakatsubo K, Kusunoki S, Kawakami H, et al. Cell-surface arylsulfatase A and B on sinusoidal endothelial cells, hepatocytes, and Kupffer cells in mammalian livers. Med. Mol. Morphol. 2009; 42:63-9. Valayannopoulos V, Nicely H, Harmatz P, et al. Mucopolysaccharidosis VI. Orphanet. J. Rare Dis. 2010; 5:5. Harmatz P, Whitley CB, Waber L, et al. Enzyme replacement therapy in mucopolysaccharidosis VI (Maroteaux-Lamy syndrome). J. Pediatr. 2004; 144:574-80.

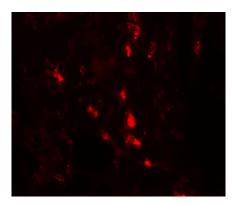
Images



Western blot analysis of ARSB in mouse lung tissue lysate with ARSB antibody at (A) 1 and (B) 2 µg/ml.



Immunohistochemistry of ARSB in human lung tissue with ARSB antibody at 2.5 µg/mL.



Immunofluorescence of ARSB in human lung tissue with ARSB antibody at 20 $\mu g/mL$.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.