

**Goat Anti-ASNA1 Antibody**  
**Peptide-affinity purified goat antibody**  
**Catalog # AF1119c****Specification**

---

**Goat Anti-ASNA1 Antibody - Product Information**

Application	WB, E
Primary Accession	<a href="#">O43681</a>
Other Accession	<a href="#">NP_004308</a> , <a href="#">439</a>
Reactivity	Human, Mouse, Rat
Host	Goat
Clonality	Polyclonal
Concentration	100ug/200ul
Isotype	IgG
Calculated MW	38793

**Goat Anti-ASNA1 Antibody - Additional Information****Gene ID** 439**Other Names**

ATPase ASNA1 {ECO:0000255|HAMAP-Rule:MF\_03112}, 3.6.-.-  
{ECO:0000255|HAMAP-Rule:MF\_03112}, Arsenical pump-driving ATPase  
{ECO:0000255|HAMAP-Rule:MF\_03112}, Arsenite-stimulated ATPase  
{ECO:0000255|HAMAP-Rule:MF\_03112}, Transmembrane domain recognition complex 40 kDa  
ATPase subunit, hARSA-I, hASNA-I, ASNA1 {ECO:0000255|HAMAP-Rule:MF\_03112}, ARSA, TRC40

**Dilution**

WB~~1:1000  
E~~N/A

**Format**

0.5 mg IgG/ml in Tris saline (20mM Tris pH7.3, 150mM NaCl), 0.02% sodium azide, with 0.5% bovine serum albumin

**Storage**

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

**Precautions**

Goat Anti-ASNA1 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

**Goat Anti-ASNA1 Antibody - Protein Information****Name** GET3 {ECO:0000255|HAMAP-Rule:MF\_03112, ECO:0000312|HGNC:HGNC:752}

**Function**

ATPase required for the post-translational delivery of tail- anchored (TA) proteins to the endoplasmic reticulum (PubMed:<a href="http://www.uniprot.org/citations/17382883" target="\_blank">17382883</a>). Recognizes and selectively binds the transmembrane domain of TA proteins in the cytosol. This complex then targets to the endoplasmic reticulum by membrane-bound receptors GET1/WRB and CAMLG/GET2, where the tail-anchored protein is released for insertion. This process is regulated by ATP binding and hydrolysis. ATP binding drives the homodimer towards the closed dimer state, facilitating recognition of newly synthesized TA membrane proteins. ATP hydrolysis is required for insertion. Subsequently, the homodimer reverts towards the open dimer state, lowering its affinity for the GET1-CAMLG receptor, and returning it to the cytosol to initiate a new round of targeting. May be involved in insulin signaling.

**Cellular Location**

Cytoplasm. Endoplasmic reticulum. Nucleus, nucleolus

**Tissue Location**

Expressed in the epithelial cells of the liver, kidney, and stomach wall, in the adrenal medulla, in the islet cells of the pancreas, in the red pulp of the spleen, and in cardiac and skeletal muscle.

**Goat Anti-ASNA1 Antibody - Protocols**

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

**Goat Anti-ASNA1 Antibody - Images**

AF1119c (1 µg/ml) staining of Mouse Kidney lysate (35 µg protein in RIPA buffer) with (B) and without (A) blocking with the immunising peptide. Primary incubation was 1 hour. Detected by chemiluminescence.

**Goat Anti-ASNA1 Antibody - Background**

ASNA1 is the human homolog of the bacterial arsA gene. In E. coli, ArsA ATPase is the catalytic component of a multisubunit oxyanion pump that is responsible for resistance to arsenicals and

antimonials.

### **Goat Anti-ASNA1 Antibody - References**

Asna1/TRC40-mediated membrane insertion of tail-anchored proteins. Favaloro V, et al. J Cell Sci, 2010 May 1. PMID 20375064.

Increased sensitivity to platinating agents and arsenite in human ovarian cancer by downregulation of ASNA1. Hemmingsson O, et al. Oncol Rep, 2009 Oct. PMID 19724867.

Defining the human deubiquitinating enzyme interaction landscape. Sowa ME, et al. Cell, 2009 Jul 23. PMID 19615732.

A precursor-specific role for Hsp40/Hsc70 during tail-anchored protein integration at the endoplasmic reticulum. Rabu C, et al. J Biol Chem, 2008 Oct 10. PMID 18667436.

Identification of a targeting factor for posttranslational membrane protein insertion into the ER. Stefanovic S, et al. Cell, 2007 Mar 23. PMID 17382883.