

# Rabbit Anti-AADACL1 antibody

## SL5162R

Product Name:	AADACL1
Chinese Name:	中性胆固醇酯水解酶1抗体
Alias:	Arylacetamide deacetylase like 1; Arylacetamide deacetylase-like 1; Kiaa1363; NCEH; Nceh1; NCEH1_HUMAN; Neutral cholesterol ester hydrolase 1; Neutral cholesterol ester hydrolase.
Organism Species:	Rabbit
Clonality:	Polyclonal
React Species:	Human, Mouse, Rat,
Applications:	ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Molecular weight:	46kDa
Cellular localization:	The cell membrane
Form:	Lyophilized or Liquid
Concentration:	1mg/ml
immunogen:	KLH conjugated synthetic peptide derived from human AADACL1:151-250/408
Lsotype:	IgG
Purification:	affinity purified by Protein A
Storage Buffer:	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
Storage:	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20 °C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
PubMed:	PubMed
Product Detail:	The assembly of very-low-density lipoproteins (VLDLs) in the secretory apparatus of the hepatocyte relies on the mobilization of triacylglycerol (TAG) from the cytosolic pool by lipolysis and re-esterification. However, some of the re-esterified TAG products are returned to the cytosolic pool in the liver, which protects vulnerable body tissues from excess lipotoxic non-esterified fatty acids in the plasma. Some of the

lipases involved in this process include arylacetamide deacetylase (AADAC) and its related proteins AADACL1 and AADACL2. AADAC, a single pass type II membrane protein of the endoplasmic reticulum, is expressed in hepatocytes, intestinal mucosal cells, pancreas and adrenal gland. It plays an important role in the metabolic activation of arylamine substrates to ultimate carcinogens. AADACL1 hydrolyzes the metabolic intermediate 2-acetyl monoalkylglycerol, and its inactivation results in disruption of ether lipid metabolism in cancer cells and impaired cell migration and tumor growth.

#### Function:

Hydrolyzes 2-acetyl monoalkylglycerol ether, thepenultimate precursor of the pathway for de novo synthesis ofplatelet-activating factor. May be responsible for cholesterolester hydrolysis in macrophages, thereby contributing to thedevelopment of atherosclerosis. Also involved in organdetoxification by hydrolyzing exogenous organophosphorus compounds. May contribute to cancer pathogenesis by promoting tumor cellmigration.

## **Subcellular Location:**

Membrane; Single-pass type II membraneprotein (Probable). Microsome

## Tissue Specificity:

Expressed in monocyte-derived macrophages. Up-regulated in invasive melanoma and breast carcinoma cell lines.

#### Post-translational modifications:

N-glycosylated.

## Similarity:

Belongs to the 'GDXG' lipolytic enzyme family.

SWISS: Q6PIU2

Gene ID:

57552

### Database links:

Entrez Gene: 57552 Human

Entrez Gene: 320024 Mouse

Omim: 613234 Human

SwissProt: Q6PIU2 Human

SwissProt: Q8BLF1 Mouse

Unigene: 444099 Human

Unigene: 24576 Mouse

## Important Note:

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.

