

Anti-ALDH1A1 (N-terminal region) Antibody
Catalog # AN1628**Specification**

Anti-ALDH1A1 (N-terminal region) Antibody - Product Information

Application	WB
Primary Accession	P00352
Host	Mouse
Clonality	Mouse Monoclonal
Isotype	IgG2a
Calculated MW	54862

Anti-ALDH1A1 (N-terminal region) Antibody - Additional Information

Gene ID	216
Other Names	
RALDH, ALDH-E1, ALHDII, Aldehyde dehydrogenase, ALDC, PUMB1, ALDH1A1	

Target/Specificity

Aldehyde dehydrogenase (ALDH) superfamily is a ubiquitous group of enzymes found in all taxonomic domains. ALDH detoxifies endogenous and exogenous aldehydes, protecting cellular homeostasis and organismal functions. These enzymes are necessary for the synthesis of retinoic acid, betaine, and folate. Recent studies have reported high levels of ALDH found in cancer cells, suggesting that ALDH can act as a marker for cancer cells found in a wide variety of tissues including skin, prostate, lung, and neural tissues. Additionally, certain diseases can be identified when ALDH activity is absent. ALDH1A1 is vital for retinol synthesis and alcohol metabolism. ALDH1A1 active sites include an active cysteine residue, which catalyses the transformation of aldehydes into their respective carboxylic groups. ALDH1A1 amino acid sequence and function is highly conserved in humans and rodents.

Dilution

WB~~1:1000

Format

Protein G Purified

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

Anti-ALDH1A1 (N-terminal region) Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Shipping

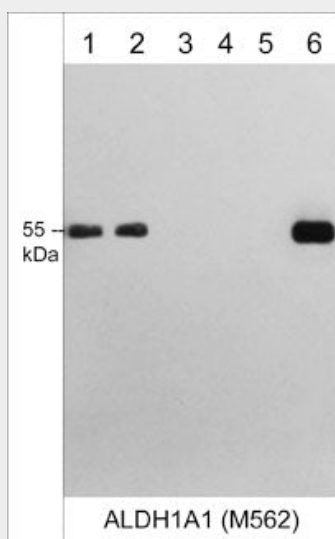
Blue Ice

Anti-ALDH1A1 (N-terminal region) Antibody - Protocols

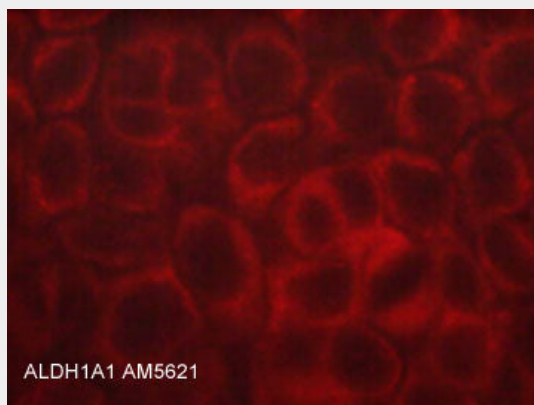
Provided below are standard protocols that you may find useful for product applications.

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

Anti-ALDH1A1 (N-terminal region) Antibody - Images



Western blot image of human A431 (lane 1), HepG2 (lane 2), PC3 (lane 3), Jurkat (lane 4), bovine tubulin (lane 5), and recombinant human ALDH1A1 (lane 6). The blot was probed with mouse monoclonal ALDH1A1 M562 (lanes 1-6) at a dilution of 1:1,000.



Immunocytochemical labeling of ALDH1A1 in aldehyde fixed and NP-40 permeabilized human A431 cells. The cells were labeled with mouse monoclonal anti-ALDH1A1 (AM5621). The antibody was detected using goat anti-mouse DyLight® 594.

Anti-ALDH1A1 (N-terminal region) Antibody - Background

Aldehyde dehydrogenase (ALDH) superfamily is a ubiquitous group of enzymes found in all taxonomic domains. ALDH detoxifies endogenous and exogenous aldehydes, protecting cellular homeostasis and organismal functions. These enzymes are necessary for the synthesis of retinoic

acid, betaine, and folate. Recent studies have reported high levels of ALDH found in cancer cells, suggesting that ALDH can act as a marker for cancer cells found in a wide variety of tissues including skin, prostate, lung, and neural tissues. Additionally, certain diseases can be identified when ALDH activity is absent. ALDH1A1 is vital for retinol synthesis and alcohol metabolism. ALDH1A1 active sites include an active cysteine residue, which catalyses the transformation of aldehydes into their respective carboxylic groups. ALDH1A1 amino acid sequence and function is highly conserved in humans and rodents.