9F, No. 108, Jhouzih St., Taipei, Taiwan
Tel: + 886-2-8751-1888 Fax: + 886-2-6602-1218
E-mail: sales@abnova.com

Datasheet

ALDH1A1 monoclonal antibody, clone ALDH1A1/1381

Catalog Number: MAB14520

Regulatory Status: For research use only (RUO)

Product Description: Mouse monoclonal antibody raised against partial recombinant human ALDH1A1.

Clone Name: ALDH1A1/1381

Immunogen: Recombinant protein corresponding to amino acids 315-434 of human ALDH1A1.

Host: Mouse

Theoretical MW (kDa): 56

Reactivity: Human

Applications: Flow Cyt, IF, IHC-P, WB
(See our web site product page for detailed applications information)

Protocols: See our web site at http://www.abnova.com/support/protocols.asp or product page for detailed protocols

Form: Liquid

Purification: Protein A/G purification

Isotype: IgG1

Recommend Usage: Flow Cytometry (0.5-1 ug/10^6 cells)
Immunofluorescence (1-2 ug/mL)
Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) (0.5-1 ug/mL)
Western Blotting (0.5-1 ug/mL)
The optimal working dilution should be determined by the end user.

Storage Buffer: In 10 mM PBS (0.05% BSA, 0.05% sodium azide).

Storage Instruction: Store at 4°C.

Entrez GeneID: 216

Gene Symbol: ALDH1A1

Gene Alias: ALDC, ALDH-E1, ALDH1, ALDH11, MGC2318, PUMB1, RALDH1

Gene Summary: This protein belongs to the aldehyde dehydrogenases family of proteins. Aldehyde dehydrogenase is the second enzyme of the major oxidative pathway of alcohol metabolism. Two major liver isoforms of this enzyme, cytosolic and mitochondrial, can be distinguished by their electrophoretic mobilities, kinetic properties, and subcellular localizations. Most Caucasians have two major isozymes, while approximately 50% of Orientals have only the cytosolic isozyme, missing the mitochondrial isozyme. A remarkably higher frequency of acute alcohol intoxication among Orientals than among Caucasians could be related to the absence of the mitochondrial isozyme. This gene encodes a cytosolic isoform, which has a high affinity for aldehydes. [provided by RefSeq]

References:

1. Comparison of quantum dot technology with conventional immunohistochemistry in examining aldehyde dehydrogenase 1A1 as a potential biomarker for lymph node metastasis of head and neck cancer. Xu J, M?ller S, Nannapaneni S, Pan L, Wang Y, Peng X, Wang D, Tighiouart M, Chen Z, Saba NF, Beitler JJ, Shin DM, Chen ZG. Eur J Cancer. 2012 Jul;48(11):1682-91. doi: 10.1016/j.ejca.2011.12.029. Epub 2012 Feb 15.