

CDX1 Antibody
Purified Mouse Monoclonal Antibody
Catalog # AO1839a

Specification

CDX1 Antibody - Product Information

Application	E, WB
Primary Accession	P47902
Reactivity	Human
Host	Mouse
Clonality	Monoclonal
Isotype	IgG2a
Calculated MW	28.1kDa KDa

Description

This gene is a member of the caudal-related homeobox transcription factor gene family. The encoded DNA-binding protein regulates intestine-specific gene expression and enterocyte differentiation. It has been shown to induce expression of the intestinal alkaline phosphatase gene, and inhibit beta-catenin/T-cell factor transcriptional activity.

Immunogen

Purified recombinant fragment of human CDX1 (AA: 122-227) expressed in E. Coli.

Formulation

Purified antibody in PBS with 0.05% sodium azide

CDX1 Antibody - Additional Information

Gene ID 1044

Other Names

Homeobox protein CDX-1, Caudal-type homeobox protein 1, CDX1

Dilution

E~~1/10000

WB~~1/500 - 1/2000

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

CDX1 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

CDX1 Antibody - Protein Information

Name CDX1

Function

Plays a role in transcriptional regulation (PubMed:24623306). Involved in activated KRAS-mediated transcriptional activation of PRKD1 in colorectal cancer (CRC) cells (PubMed:24623306). Binds to the PRKD1 promoter in colorectal cancer (CRC) cells (PubMed:24623306). Could play a role in the terminal differentiation of the intestine. Binds preferentially to methylated DNA (PubMed:28473536).

Cellular Location

Nucleus.

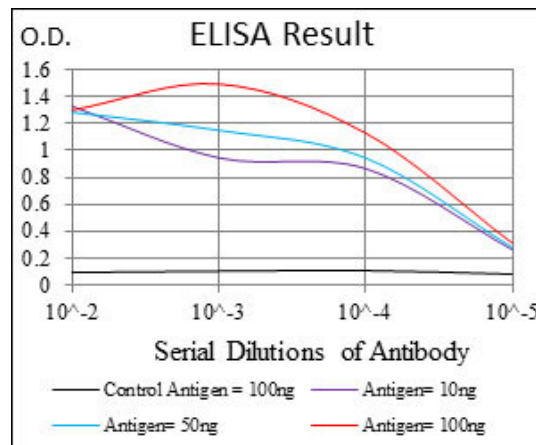
Tissue Location

Intestinal epithelium.

CDX1 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](#)



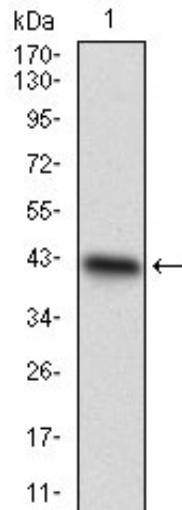


Figure 1: Western blot analysis using CDX1 mAb against human CDX1 recombinant protein. (Expected MW is 37.9 kDa)

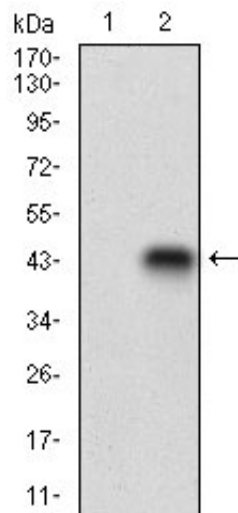


Figure 2: Western blot analysis using CDX1 mAb against HEK293 (1) and CDX1 (AA: 122-227)-hlgGfc transfected HEK293 (2) cell lysate.

CDX1 Antibody - Background

This gene encodes a large protein that resides in the limiting membrane of endosomes and lysosomes and mediates intracellular cholesterol trafficking via binding of cholesterol to its N-terminal domain. It is predicted to have a cytoplasmic C-terminus, 13 transmembrane domains, and 3 large loops in the lumen of the endosome - the last loop being at the N-terminus. This protein transports low-density lipoproteins to late endosomal/lysosomal compartments where they are hydrolyzed and released as free cholesterol. Defects in this gene cause Niemann-Pick type C disease, a rare autosomal recessive neurodegenerative disorder characterized by over accumulation of cholesterol and glycosphingolipids in late endosomal/lysosomal compartments. ;

CDX1 Antibody - References

1. Am J Pathol. 2012 Aug;181(2):487-98.
2. J Korean Med Sci. 2011 May;26(5):647-53.