

Anti-FUT1 Picoband Antibody

Catalog # ABO12279

Specification

Anti-FUT1 Picoband Antibody - Product Information

ApplicationWB, IHCPrimary AccessionP19526HostRabbitReactivityHuman, Mouse, RatClonalityPolyclonalFormatLyophilizedDescriptionRabbit IgG polyclonal antibody for Galactoside 2-alpha-L-fucosyltransferase 1(FUT1) detection.Tested with WB, IHC-P in Human;Mouse;Rat.

Reconstitution Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-FUT1 Picoband Antibody - Additional Information

Gene ID 2523

Other Names Galactoside 2-alpha-L-fucosyltransferase 1, 2.4.1.69, Alpha(1, 2)FT 1, Blood group H alpha 2-fucosyltransferase, Fucosyltransferase 1, GDP-L-fucose:beta-D-galactoside 2-alpha-L-fucosyltransferase 1, FUT1, H, HSC

Calculated MW 41251 MW KDa

Application Details Immunohistochemistry(Paraffin-embedded Section), 0.5-1 μg/ml, Human, Mouse, Rat, By Heat

 Western blot, 0.1-0.5 μg/ml, Human, Rat

Subcellular Localization Golgi apparatus, Golgi stack membrane; Single-pass type II membrane protein. Membrane-bound form in trans cisternae of Golgi.

Protein Name Galactoside 2-alpha-L-fucosyltransferase 1

Contents Each vial contains 4mg Trehalose, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg NaN3.

Immunogen

A synthetic peptide corresponding to a sequence at the N-terminus of human FUT1 (134-164aa EVDSRTPWRELQLHDWMSEEYADLRDPFLKL), different from the related mouse and rat sequences by seven amino acids.



Purification Immunogen affinity purified.

Cross Reactivity No cross reactivity with other proteins

Storage

At -20°C for one year. After r°Constitution, at 4°C for one month. It°Can also be aliquotted and stored frozen at -20°C for a longer time.Avoid repeated freezing and thawing.

Sequence Similarities Belongs to the glycosyltransferase 11 family.

Anti-FUT1 Picoband Antibody - Protein Information

Name FUT1 (HGNC:4012)

Synonyms H, HSC

Function

Catalyzes the transfer of L-fucose, from a guanosine diphosphate-beta-L-fucose, to the terminal galactose residue of glycoconjugates through an alpha(1,2) linkage leading to H antigen synthesis that is an intermediate substrate in the synthesis of ABO blood group antigens (PubMed:2118655). H antigen is essential for maturation of the glomerular layer of the main olfactory bulb, in cell migration and early cell-cell contacts during tumor associated angiogenesis (PubMed:18205178). Proferentially

href="http://www.uniprot.org/citations/18205178" target="_blank">18205178). Preferentially fucosylates soluble lactose and to a lesser extent fucosylates glycolipids gangliosides GA1 and GM1a (By similarity).

Cellular Location

Golgi apparatus, Golgi stack membrane {ECO:0000250|UniProtKB:O09160}; Single-pass type II membrane protein {ECO:0000250|UniProtKB:O09160}. Note=Membrane-bound form in trans cisternae of Golgi. {ECO:0000250|UniProtKB:O09160}

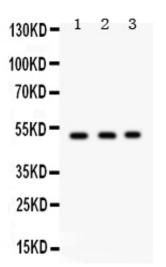
Anti-FUT1 Picoband Antibody - Protocols

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

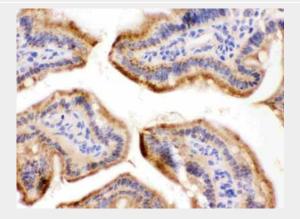
- <u>Western Blot</u>
- Blocking Peptides
- <u>Dot Blot</u>
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Anti-FUT1 Picoband Antibody - Images

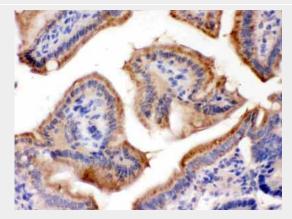




Anti- FUT1 Picoband antibody, ABO12279, Western blottingAll lanes: Anti FUT1 (ABO12279) at 0.5ug/mlLane 1: Rat Kidney Tissue Lysate at 50ugLane 2: SW620 Whole Cell Lysate at 40ugLane 3: A549 Whole Cell Lysate at 40ugPredicted bind size: 50KDObserved bind size: 50KD

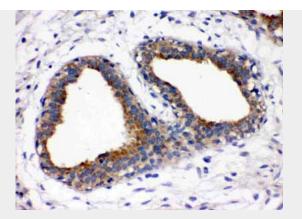


Anti- FUT1 Picoband antibody, ABO12279, IHC(P)IHC(P): Mouse Intestine Tissue



Anti- FUT1 Picoband antibody, ABO12279, IHC(P)IHC(P): Rat Intestine Tissue





Anti- FUT1 Picoband antibody, ABO12279, IHC(P)IHC(P): Human Mammary Cancer Tissue

Anti-FUT1 Picoband Antibody - Background

Galactoside 2-alpha-L-fucosyltransferase 1 is an enzyme that in humans is encoded by the FUT1 gene. It is mapped to 19q13.3. The protein encoded by this gene is a Golgi stack membrane protein that is involved in the creation of a precursor of the H antigen, which is required for the final step in the soluble A and B antigen synthesis pathway. This gene is one of two encoding the galactoside 2-L-fucosyltransferase enzyme. Mutations in this gene are a cause of the H-Bombay blood group.