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Anti-Mucin Gastric Antibody (Monoclonal, 45M1)

Catalog # ABO10449

Specification

Anti-Mucin Gastric Antibody (Monoclonal, 45M1) - Product Information

Application	**WB, IHC-P, ICC**
Primary Accession	P98088
Host	**Mouse**
Isotype	**Mouse IgG1**
Reactivity	**Human, Mouse, Rat**
Clonality	**Monoclonal**
Format	**Lyophilized**

Description
Mouse IgG monoclonal antibody for Mucin Gastric, mucin 5AC, oligomeric mucus/gel-forming (MUC5AC) detection. Tested with WB, IHC-P, ICC in Human;mouse;rabbit;rat. No cross reactivity with other proteins.

Reconstitution
Add 1ml of PBS buffer will yield a concentration of 100ug/ml.

Anti-Mucin Gastric Antibody (Monoclonal, 45M1) - Additional Information

Gene ID 4586

Other Names
Mucin-5AC, MUC-5AC, Gastric mucin, Lewis B blood group antigen, LeB, Major airway glycoprotein, Mucin-5 subtype AC, tracheobronchial, Tracheobronchial mucin, TBM, MUC5AC {ECO:0000303|PubMed:11535137, ECO:0000312|HGNC:HGNC:7515}

Calculated MW
585570 MW KDa

Application Details
Immunohistochemistry(Paraffin-embedded Section), 2-4 µg/ml, Human, mouse, rabbit, rat, By Heat

Immunocytochemistry , 1 µg/ml, Human, mouse, rabbit, rat, -
Western blot, 1-2 µg/ml, Human, mouse, rabbit, rat

Subcellular Localization
Secreted .

Tissue Specificity
Highly expressed in surface mucosal cells of respiratory tract and stomach epithelia. Overexpressed in a number of carcinomas. Also expressed in Barrett's esophagus epithelium and in the proximal duodenum. .

Protein Name
Mucin-5AC

Contents

Mouse ascites fluid, 1.2% sodium acetate, 2mg BSA, with 0.01mg NaN3 as preservative.

Immunogen
Mucin from human ovarian cyst fluid.

Purification
Ascites

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
Contains 1 CTCK (C-terminal cystine knot-like) domain.

Anti-Mucin Gastric Antibody (Monoclonal, 45M1) - Protein Information

Name MUC5AC {ECO:0000303|PubMed:11535137, ECO:0000312|HGNC:HGNC:7515}

Function
Gel-forming glycoprotein of gastric and respiratory tract epithelia that protects the mucosa from infection and chemical damage by binding to inhaled microorganisms and particles that are subsequently removed by the mucociliary system (PubMed:14535999, PubMed:14718370). Interacts with H.pylori in the gastric epithelium, Barrett's esophagus as well as in gastric metaplasia of the duodenum (GMD) (PubMed:14535999).

Cellular Location
Secreted

Tissue Location
Highly expressed in surface mucosal cells of respiratory tract and stomach epithelia. Overexpressed in a number of carcinomas. Also expressed in Barrett's esophagus epithelium and in the proximal duodenum.

Anti-Mucin Gastric Antibody (Monoclonal, 45M1) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

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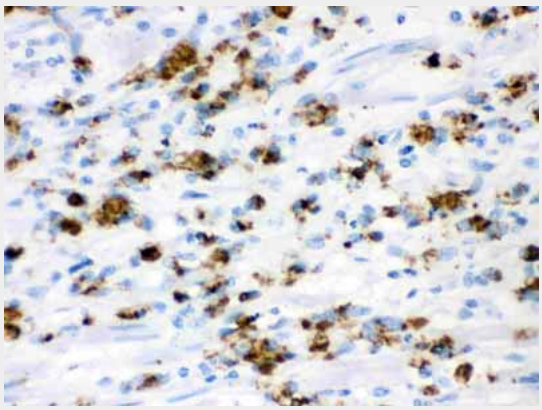
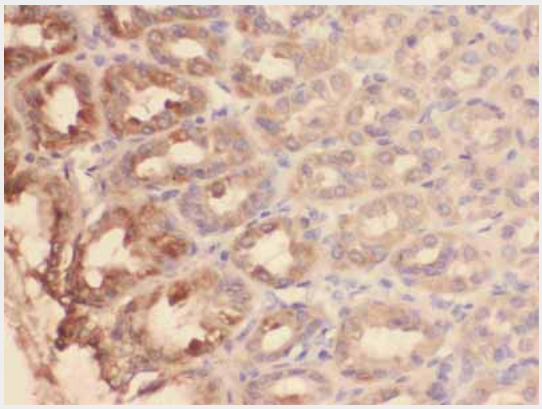
Anti-Mucin Gastric Antibody (Monoclonal, 45M1) - Images



Anti- Mucin Gastric antibody, ABO10449, IHC(P)IHC(P): Human Gastric Cancer Tissue



Anti- Mucin Gastric antibody, ABO10449, IHC(P)IHC(P): Rat Gastric Cancer Tissue

Anti-Mucin Gastric Antibody (Monoclonal, 45M1) - Background

MucinÂ 5ACÂ (Muc5AC)Â isÂ aÂ proteinÂ thatÂ inÂ humansÂ isÂ encodedÂ byÂ theÂ MUC5ACÂ gene.Â UsingÂ real-timeÂ RT-PCR,Â MoehleÂ etÂ al.Â (2006)Â foundÂ thatÂ MUC5ACÂ wasÂ highlyÂ expressedÂ inÂ adultÂ tracheaÂ andÂ stomach.Â ExpressionÂ wasÂ lowerÂ inÂ adultÂ lungÂ andÂ weakÂ inÂ fetalÂ lung,Â andÂ noÂ expressionÂ wasÂ detectedÂ inÂ otherÂ tissues.Â ThisÂ geneÂ hasÂ beenÂ linkedÂ toÂ mucusÂ hypersecretionÂ inÂ theÂ pulmonaryÂ tractsÂ andÂ associatedÂ toÂ chronicÂ obstructiveÂ pulmonaryÂ disease.Â Moreover,Â Muc5acÂ isÂ identifiedÂ asÂ aÂ directÂ andÂ criticalÂ mediatorÂ ofÂ resistanceÂ duringÂ intestinalÂ nematodeÂ infection.