

MUC1 Monoclonal Antibody (MH1 (CT2))

Product Details

Size	500 µL
Species Reactivity	Human, Mouse
Published Species	Rat, Human, Mouse
Host/Isotope	Armenian hamster / IgG
Class	Monoclonal
Type	Antibody
Clone	MH1 (CT2)
Conjugate	Unconjugated
Immunogen	A synthetic peptide corresponding to aa 239-255 (SSLSYTNPAVAATSANL) from the cytoplasmic tail of MUC1
Form	Liquid
Concentration	0.1 mg/mL
Purification	Protein G
Storage buffer	PBS, pH 7.4, with 0.2% BSA
Contains	0.09% sodium azide
Storage Conditions	4° C
RRID	AB_11000874

Applications	Tested	Dilution	Published
Immunohistochemistry (IHC)	-		11 Publications
Western Blot (WB)	✓	1:50	13 Publications
ChIP assay (ChIP)	-		5 Publications
Immunohistochemistry (Paraffin) (IHC (P))	✓	1:100-1:200	3 Publications
Miscellaneous PubMed (MISC)	-	1:200	2 Publications
Immunocytochemistry (ICC)	✓	1:10-1:100	6 Publications
Immunoprecipitation (IP)	-		4 Publications
Immunohistochemistry (Frozen) (IHC (F))	-	1:500	1 Publication
Flow Cytometry (Flow)	✓	1-2 µg/test	
Immunofluorescence (IF)	✓	1:10-1:100	

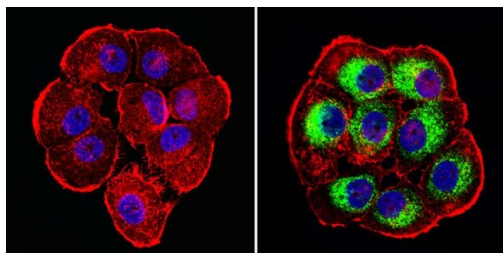
Product Specific Information

MA5-11202 detects smaller subunits (14-28kDa) of MUC-1.

Muc-1 is overexpressed in Breast cancer cells.

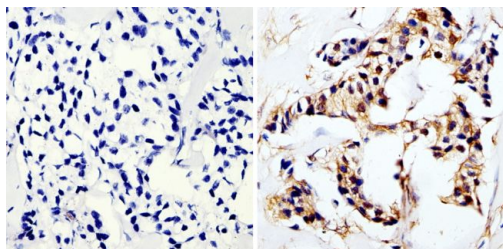
T47D cell lysate could be used as a positive control.

Product Images For MUC1 Monoclonal Antibody (MH1 (CT2))



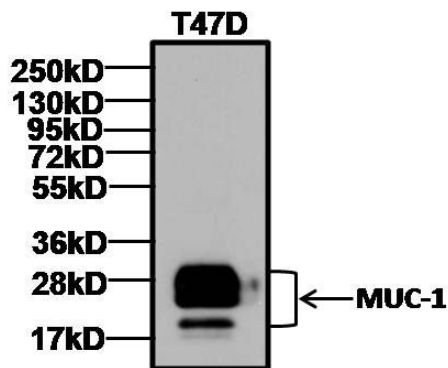
MUC1 Antibody (MA5-11202) in IF

Immunofluorescent analysis of CD227/MUC1/Mucin 1 (green) showing staining in the cytoplasm of T47D cells (right) compared to a negative control without primary antibody (left). Formalin-fixed cells were permeabilized with 0.1% Triton X-100 in TBS for 5-10 minutes and blocked with 3% BSA-PBS for 30 minutes at room temperature. Cells were probed with a CD227/MUC1/Mucin 1 monoclonal antibody (Product # MA5-11202) in 3% BSA-PBS at a dilution of 1:50 and incubated overnight at 4°C in a humidified chamber. Cells were washed with PBST and incubated with a DyLight-conjugated secondary antibody in PBS at room temperature in the dark. F-actin (red) was stained with a fluorescent red phalloidin and nuclei (blue) were stained with Hoechst or DAPI. Images were taken at a magnification of 60x.



MUC1 Antibody (MA5-11202) in IHC (P)

Immunohistochemistry analysis of Mucin 1 showing staining in the cytoplasm of paraffin-embedded human breast carcinoma (right) compared to a negative control without primary antibody (left). To expose target proteins, antigen retrieval was performed using 10mM sodium citrate (pH 6.0), microwaved for 8-15 min. Following antigen retrieval, tissues were blocked in 3% H₂O₂-methanol for 15 min at room temperature, washed with ddH₂O and PBS, and then probed with a Mucin 1 monoclonal antibody (Product # MA5-11202) diluted in 3% BSA-PBS at a dilution of 1:20 overnight at 4°C in a humidified chamber. Tissues were washed extensively in PBST and detection was performed using an HRP-conjugated secondary antibody followed by colorimetric detection using a DAB kit. Tissues were counterstained with hematoxylin and dehydrated with ethanol and xylene to prep for mounting.



MUC1 Antibody (MA5-11202) in WB

Western blot analysis of MUC-1 (CT2) was performed by loading 25 µg of T47D cell lysates, and 10 µL of PageRuler Plus Prestained Protein Ladder (Product # 26619) onto a Novex® 4-20% Tris-Glycine polyacrylamide gel. Proteins were transferred to a PVDF membrane using the G2 Fast Blotter (Product # 62288), and blocked with 5% milk in TBST for 1 hour at room temperature. Small subunits of MUC-1 were detected between ~14 kD to 30 kD using a MUC-1 monoclonal antibody (Product # MA5-11202) at a concentration of 1 µg/mL overnight at 4C on a rocking platform, followed by a goat anti-Armenian hamster IgG-HRP secondary antibody (Product # PA1-32045) at a dilution of 1:10,000 for at least 1 hour at room temperature. Chemiluminescent detection was performed using SuperSignal West Dura (Product # 34076).

[View more figures on thermofisher.com](http://thermofisher.com)

45 References

Immunohistochemistry (11)

PloS one

Generation and phenotypic characterization of Pde1a mutant mice.

"Published figure using MUC1 monoclonal antibody (Product # MA5-11202) in Immunohistochemistry"

Authors: Wang X,Yamada S,LaRiviere WB,Ye H,Bakeberg JL,Irazabal MV,Chebib FT,van Deursen J,Harris PC,Sussman CR,Behfar A,Ward CJ,Torres VE

Species
Not Applicable

Dilution
Not Cited

Year
2017

Oncology letters

Recurrent intracranial neurenteric cyst with malignant transformation: A case report and literature review.

"MA5-11202 was used in immunohistochemistry - paraffin section to study a case report and literature review of recurrent intracranial neurenteric cyst with malignant transformation"

Authors: Yang Y,Fang J,Li DA,Wang L, Ji N,Zhang J

Species
Not Applicable

Dilution
Not Cited

Year
2016

[View more IHC references on thermofisher.com](#)

Western Blot (13)

Molecular cancer

Targeting MUC1-C inhibits the AKT-S6K1-eIF4A pathway regulating TIGAR translation in colorectal cancer.

"MA511202 was used in western blot to determine effects of the MUC1-C subunit inhibitor (GO-203) on human colorectal cancer cells"

Authors: Ahmad R,Alam M,Hasegawa M,Uchida Y,AI-Obaid O,Kharbanda S,Kufe D

Species
Human

Dilution
Not Cited

Year
2017

Oncotarget

MUC1-C nuclear localization drives invasiveness of renal cancer cells through a sheddase/gamma secretase dependent pathway.

"MA5-11202 was used in immunohistochemistry and western blot to study the role of ADAM10, ADAM17 and gamma-secretase in the mechanism by which nuclear MUC1-C drives renal cancer cell invasion"

Authors: Bouillez A,Gnemmi V,Gaudelot K,Hémon B, Ringot B,Pottier N,Glowacki F,Butruille C,Cauffiez C,Hamdane M, Sergeant N, Van Seuningem I,Leroy X,Aubert S,Perrais M

Species
Human

Dilution
1:3000

Year
2014

[View more WB references on thermofisher.com](#)

More applications with references on thermofisher.com

ChIP (5)

IHC (P) (3)

MISC (2)

ICC (6)

IP (4)

IHC (F) (1)

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