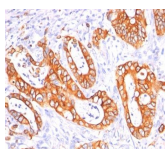


# Mucin 1 / EMA / Episialin / CD227 Monoclonal Mouse Antibody (GP1.4 + E29)



## Product Description

In Western blotting, it recognizes proteins in MW range of 265-400 kDa, identified as different glycoforms of EMA. The  $\alpha$  subunit has cell adhesive properties. It can act both as an adhesion and an anti-adhesion protein. EMA may provide a protective layer on epithelial cells against bacterial and enzyme attack. The  $\beta$  subunit contains a C-terminal domain, which is involved in cell signaling, through phosphorylations and protein-protein interactions. In immunohistochemical assays, it superbly stains routine formalin/paraffin carcinoma tissues. Antibody to EMA is useful as a pan-epithelial marker for detecting early metastatic loci of carcinoma in bone marrow or liver.

Primary antibodies are available purified, or with a selection of fluorescent CF<sup>®</sup> dyes and other labels. CF<sup>®</sup> dyes offer exceptional brightness and photostability. See the [CF<sup>®</sup> Dye Brochure](#) for more information. Note: Conjugates of blue fluorescent dyes like CF<sup>®</sup>405S and CF<sup>®</sup>405M are not recommended for detecting low abundance targets, because blue dyes have lower fluorescence and can give higher non-specific background than other dye colors.

**Stock status:** Because Biotium offers a large number of antibody and conjugation options, primary antibody conjugates may be made to order. Typical lead times are up to one week for CF<sup>®</sup> dye and biotin conjugates, and up to 2-3 weeks for fluorescent protein and enzyme conjugates. Please email [order@biotium.com](mailto:order@biotium.com) to inquire about stock status and lead times before placing your order.

**Catalog number key for antibody number 0743, Anti-CD227 (GP1.4 E29)**

Call us : [800-304-5357](tel:800-304-5357)

## Product attributes

<b>Antibody number</b>	#0743
<b>Antibody reactivity (target)</b>	CD227, EMA, Episialin, Mucin 1
<b>Antibody type</b>	Primary
<b>Host species</b>	Mouse
<b>Clonality</b>	Monoclonal
<b>Clone</b>	GP1.4 + E29
<b>Isotype</b>	IgG's
<b>Molecular weight of antigen</b>	265-400 kDa
<b>Synonyms</b>	Breast carcinoma-associated antigen DF3; CA15-3; Carcinoma-associated mucin Episialin; Epithelial Membrane Antigen; H23AG; KL-6; MAM6; MUC-1; MUC-1/SEC; MUC-1/X; MUC1-alpha; MUC1-beta; MUC1-CT; MUC1-NT; MUC1/ZD; Mucin 1 cell surface associated; Mucin-1 subunit beta; Peanut-reactive urinary mucin; PEM; PEMT; Polymorphic epithelial mucin; PUM; Tumor-associated epithelial membrane antigen
<b>Human gene symbol</b>	MUC1
<b>Entrez gene ID</b>	4582
<b>SwissProt</b>	P15941
<b>Unigene</b>	89603
<b>Immunogen</b>	Human milk fat globule membranes (GP1.4); Delipidated extract of human milk fat globule membranes (E29)
<b>Antibody target cellular localization</b>	Plasma membrane
<b>Verified antibody applications</b>	IHC (FFPE) (verified)
<b>Species reactivity</b>	Human
<b>Antibody application notes</b>	Higher concentration may be required for direct detection using primary antibody conjugates than for indirect detection with secondary antibody, Immunofluorescence: 0.5-1 ug/mL, Immunohistology formalin-fixed 0.1-0.2 ug/mL, Staining of formalin-fixed tissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 min followed by cooling at RT for 20 minutes, Flow Cytometry 0.5-1 ug/million cells/0.1 mL, Optimal dilution for a specific application should be determined by user
<b>Positive control</b>	MCF-7 or MDA-231 cells. Breast, colon, ovarian, endometrial carcinoma.
<b>Shipping condition</b>	Room temperature
<b>Storage Conditions</b>	Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C
<b>Shelf life</b>	Guaranteed for at least 24 months from date of receipt when stored as recommended
<b>Regulatory status</b>	For research use only (RUO)
<b>Antibody/conjugate formulation</b>	Conjugates: 0.1 mg/mL in PBS/0.1% BSA/0.05% azide, HRP conjugates: 0.1 mg/mL in PBS/0.05% BSA, Purified: 0.2 mg/mL in PBS/0.05% BSA/0.05% azide, Purified, BSA-free: 1 mg/mL in PBS without azide
<b>Antibody research areas</b>	Cancer, Mucins
<b>Product origin</b>	Product may contain either bovine serum albumin (BSA) from bovine serum (Bos taurus), or recombinant BSA produced in Chinese hamster ovary cells. Inquire for the specific lot.
<b>Cell/tissue expression</b>	Epithelial cells, Mammary gland
<b>Tumor expression</b>	Breast cancer

Antibody # prefix	Conjugation	Ex/Em (nm)	Laser line	Detection channel	Dye Features
BNC04	CF <sup>®</sup> 405S	404/431	405	DAPI (microscopy), AF405	<a href="#">CF<sup>®</sup>405S Features</a>
BNC88	CF <sup>®</sup> 488A	490/515	488	GFP, FITC	<a href="#">CF<sup>®</sup>488A Features</a>
BNC68	CF <sup>®</sup> 568	562/583	532, 561	RFP, TRITC	<a href="#">CF<sup>®</sup>568 Features</a>
BNC94	CF <sup>®</sup> 594	593/614	561	Texas Red <sup>®</sup>	<a href="#">CF<sup>®</sup>594 Features</a>
BNC40	CF <sup>®</sup> 640R	642/662	633-640	Cy <sup>®</sup> 5	<a href="#">CF<sup>®</sup>640R Features</a>
BNC47	CF <sup>®</sup> 647	650/665	633-640	Cy <sup>®</sup> 5	<a href="#">CF<sup>®</sup>647 Features</a>
BNC74	CF <sup>®</sup> 740	742/767	633-685	775/50	<a href="#">CF<sup>®</sup>740 Features</a>
BNCB	Biotin	N/A	N/A	N/A	
BNUB	Purified	N/A	N/A	N/A	
BNUM	Purified, BSA-free	N/A	N/A	N/A	

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Product link: <https://biotium.com/product/monoclonal-anti-mucin-1-ema-episialin-cd227-gp1-4-e29/>