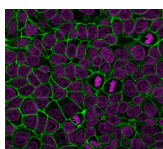


# E-Cadherin / CD324 Monoclonal Mouse Antibody (4A2)



## Product Description

This antibody recognizes a protein of 120-80 kDa, identified as E-cadherin. Cadherins comprise a family of  $\text{Ca}^{2+}$ -dependent adhesion molecules that function to mediate cell-cell binding critical to the maintenance of tissue structure and morphogenesis. The classical cadherins, E-, N- and P-cadherin, consist of large extracellular domains characterized by a series of five homologous NH2 terminal repeats. The relatively short intracellular domains interact with a variety of cytoplasmic proteins, such as  $\beta$ -catenin, to regulate cadherin function. E-cadherin plays an important role in epithelial cell adhesion. A decreased expression of E-cadherin is associated with metastatic potential and poor prognosis in breast cancer, prostate and esophageal cancer. In combination with p120 Catenin, it is useful for the differentiation between ductal (E-cadherin+) and lobular (E-cadherin-) breast carcinomas. It may also help in diagnosis of mesothelioma.

Primary antibodies are available purified, or with a selection of fluorescent CF® dyes and other labels. CF® dyes offer exceptional brightness and photostability. See the [CF® Dye Brochure](#) for more information. Note: Conjugates of blue fluorescent dyes like CF®405S and CF®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® 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 1429, Anti-CD324|E-Cadherin (4A2)**

Call us : [800-304-5357](tel:800-304-5357) Email: [techsupport@biotium.com](mailto:techsupport@biotium.com)

## Product attributes

Antibody number	#1429
Antibody reactivity (target)	CD324, E-Cadherin
Antibody type	Primary
Host species	Mouse
Clonality	Monoclonal
Clone	4A2
Isotype	IgG1, kappa
Molecular weight	120-80 kDa (Mature); 135 kDa (Precursor)
Synonyms	Arc 1, cadherin 1 type 1 E-cadherin, Cadherin1, CAM 120/80, CD324, CDH1, CDHE, E-Cad/CTF3, E-cadherin, ECAD, Epithelial cadherin, epithelial calcium dependent adhesion protein, Liver cell adhesion molecule (LCAM), Uvomorulin (UVO)
Human gene symbol	CDH1
Entrez gene ID	999
SwissProt	P12830
Unigene	461086
Immunogen	Recombinant human full-length E-Cadherin protein
Antibody target cellular localization	Plasma membrane
Verified antibody applications	Flow (verified), IF (verified), IHC (FFPE) (verified), WB (verified)
Species reactivity	Human, Mouse, Rat
Expected antibody applications	IP (published for clone)
Antibody application notes	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): 0.5-1 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 min, Flow Cytometry 0.5-1 ug/million cells/0.1 mL, Western blotting 0.5-1 ug/mL, Optimal dilution for a specific application should be determined by user
Positive control	LS174T, Raji, HT29, SK-BR3 cells. Prostate or Colon carcinomas.
Shipping condition	Room temperature
Storage Conditions	Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C
Shelf life	Guaranteed for at least 24 months from date of receipt when stored as recommended
Regulatory status	For research use only (RUO)
Antibody/conjugate formulation	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
Antibody research areas	Cancer, Cell adhesion
Product origin	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.
Cell/tissue expression	Epithelial cells
Tumor expression	Breast cancer

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

Alexa Fluor, Pacific Blue, Pacific Orange, and Texas Red are trademarks or registered trademarks of Thermo Fisher Scientific; Cy is a registered trademark of Cytiva; IRDye, LI-COR, and Odyssey are registered trademarks of LI-COR Bioscience.

## References

Note: References for this clone sold by other suppliers may be listed for expected applications.

Cancer Res (2005) 65: 2. (immunoprecipitation; immunofluorescence)

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Product link: <https://biotium.com/product/mouse-monoclonal-anti-e-cadherin-cd324-4a2/>