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Milk Fat Globule (Breast Epithelial Marker) Antibody - With BSA and Azide

Mouse Monoclonal Antibody [Clone EDM45]
Catalog # AH11812

Product Information

Application	IHC, IF, FC
Primary Accession	Q08431
Other Accession	4240, 3745
Reactivity	Human
Host	Mouse
Clonality	Monoclonal
Isotype	Mouse / IgG1, kappa
Clone Names	EDM45
Calculated MW	43105

Additional Information

Gene ID	4240
Other Names	Lactadherin, Breast epithelial antigen BA46, HMFG, MFGM, Milk fat globule-EGF factor 8, MFG-E8, SED1, Lactadherin short form, Medin, MFGE8
Application Note	IHC~~1:100~500 IF~~1:50~200 FC~~1:10~50
Storage	Store at 2 to 8°C.Antibody is stable for 24 months.
Precautions	Milk Fat Globule (Breast Epithelial Marker) Antibody - With BSA and Azide is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	MFGE8
Function	Plays an important role in the maintenance of intestinal epithelial homeostasis and the promotion of mucosal healing. Promotes VEGF-dependent neovascularization (By similarity). Contributes to phagocytic removal of apoptotic cells in many tissues. Specific ligand for the alpha-v/beta-3 and alpha-v/beta-5 receptors. Also binds to phosphatidylserine-enriched cell surfaces in a receptor-independent manner. Zona pellucida-binding protein which may play a role in gamete interaction.
Cellular Location	Membrane; Peripheral membrane protein. Secreted. Cytoplasmic vesicle, secretory vesicle, acrosome membrane {ECO:0000250|UniProtKB:P79385}; Peripheral membrane protein {ECO:0000250|UniProtKB:P79385}. Note=Located in the acrosomal region of zona-pellucida bound sperm.

{ECO:0000250|UniProtKB:P79385}

Tissue Location	Mammary epithelial cell surfaces and aortic media. Overexpressed in several carcinomas

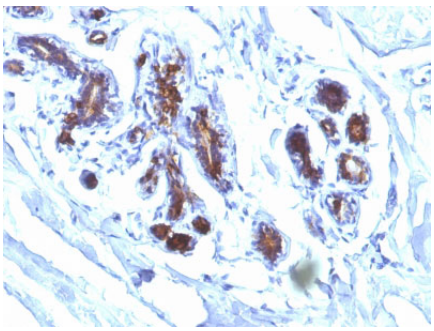
Background

Recognizes a protein of 40-45kDa, identified as human milk fat globule membrane protein (HMFG). HMFG is present on normal human breast epithelial cells and cell lines derived from breast carcinomas, as well as to the outer surface of the human milk fat globule. HMFG is considered as a differentiation marker. It is useful as specific breast epithelial marker and can also provide a tool to study the role of the cell surface in normal and neoplastic mammary development.

References

Larocca D et al. A Mr 46,000 human milk fat globule protein that is highly expressed in human breast tumors contains factor VIII-like domains. Cancer Res 1991, 51: 4994-4998 | Ceriani RL et al. Surface differentiation antigens of human mammary epithelial cells carried on the human milk fat globule. Proc Natl Acad Sci USA 1977, 74(2):582-6 | Corcoran D and Walker RA. Ultrastructural localization of milk fat globule membrane antigens in human breast carcinomas. J Pathol 1990,161(2):161-6 | Sterns EE et al. Prognostic significance of the immunohistochemical reaction to human milk fat globule antibodies in node-negative and node-positive breast cancer. Breast Cancer Res Treat 1992, 21(3):193-9 | Baildam AD et al. The expression of milk fat globule antigens within human mammary tumours: relationship to steroid hormone receptors and response to endocrine treatment. Eur J Cancer Clin Oncol 1989, 25(3):459-6

Images



Formalin-fixed, paraffin-embedded human Breast Carcinoma stained with Milk Fat Globule Monoclonal Antibody (EDM45)

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.