

LYRIC/AEG1 (2E4) Mouse mAb
Catalog # AP53503**Specification**

LYRIC/AEG1 (2E4) Mouse mAb - Product Information

Application	WB, IHC
Primary Accession	Q86UE4
Host	Mouse
Clonality	Monoclonal Antibody
Calculated MW	63837

LYRIC/AEG1 (2E4) Mouse mAb - Additional Information**Gene ID** 92140**Other Names**
3D3; AEG1; LYRIC; MTDH**Dilution**
WB~~1:5000
IHC~~1:100~500**LYRIC/AEG1 (2E4) Mouse mAb - Protein Information****Name** MTDH**Synonyms** AEG1, LYRIC**Function**

Down-regulates SLC1A2/EAAT2 promoter activity when expressed ectopically. Activates the nuclear factor kappa-B (NF-kappa-B) transcription factor. Promotes anchorage-independent growth of immortalized melanocytes and astrocytes which is a key component in tumor cell expansion. Promotes lung metastasis and also has an effect on bone and brain metastasis, possibly by enhancing the seeding of tumor cells to the target organ endothelium. Induces chemoresistance.

Cellular Location

Endoplasmic reticulum membrane; Single-pass membrane protein. Nucleus membrane; Single-pass membrane protein. Cell junction, tight junction Nucleus, nucleolus. Cytoplasm, perinuclear region Note=In epithelial cells, recruited to tight junctions (TJ) during the maturation of the TJ complexes. A nucleolar staining may be due to nuclear targeting of an isoform lacking the transmembrane domain (By similarity). TNF-alpha causes translocation from the cytoplasm to the nucleus.

Tissue Location

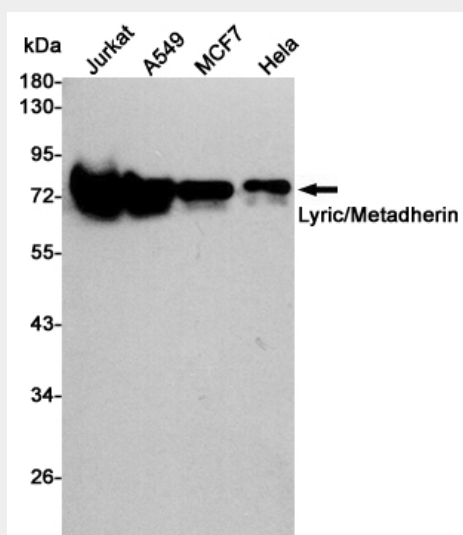
Widely expressed with highest levels in muscle- dominating organs such as skeletal muscle, heart, tongue and small intestine and in endocrine glands such as thyroid and adrenal gland Overexpressed in various cancers including breast, brain, prostate, melanoma and glioblastoma multiforme.

LYRIC/AEG1 (2E4) Mouse mAb - Protocols

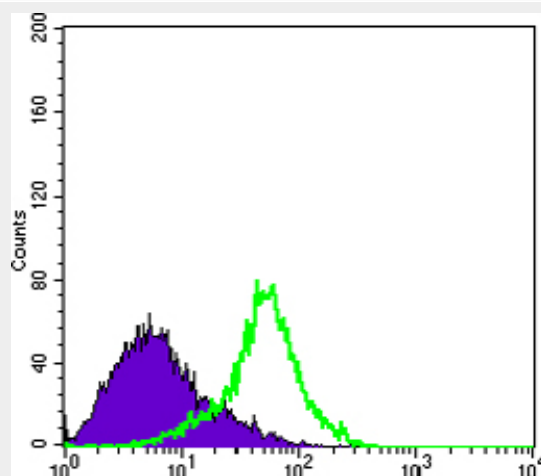
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

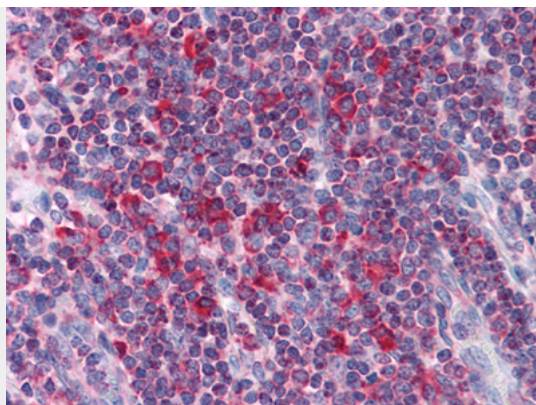
LYRIC/AEG1 (2E4) Mouse mAb - Images



Western blot detection of Lyric/Metadherin in Jurkat, A549, MCF7 and HeLa cell lysates using Lyric/Metadherin mouse mAb (1:5000 diluted). Predicted band size: 64 kDa. Observed band size: 75 kDa.



Flow cytometric analysis of HeLa cells using Metadherin mouse mAb (green) and negative control (purple).



Immunohistochemical analysis of paraffin-embedded human Liver tissues using Metadherin mouse mAb

LYRIC/AEG1 (2E4) Mouse mAb - Background

Swiss-Prot Acc.Q86UE4. Metadherin (Metastasis adhesion protein), also known as MTDH, LYsine-Rich CEACAM1 co-isolated (LYRIC), is a novel protein that localizes with the tight junction proteins ZO-1 and occludin in polarized epithelial cells. At the tight junction, it acts not as a structural component, but is rather recruited during the maturation of the tight junction complex. Metadherin is overexpressed in breast cancer tissue and breast tumor xenografts, while much lower levels are expressed in normal breast tissue. Metadherin binds to lung vasculature, one of the four common sites of breast cancer metastasis, through a C-terminal segment in the extracellular domain; blocking this lung-homing domain with antibodies or inhibiting metadherin with siRNA has been reported to inhibit breast cancer metastasis.