

CD71/TfR Monoclonal Antibody

Catalog No: YM0132

Reactivity: Human

Applications: WB;IHC;IF;FCM;ELISA

Target: CD71/TfR

Fields: >>HIF-1 signaling

pathway;>>Endocytosis;>>Phagosome;>>Ferroptosis;>>Hematopoietic cell

lineage

Gene Name: TFR1

Protein Name: Transferrin receptor protein 1

Q62351

Human Gene Id: 4155

Human Swiss Prot P02786

No:

Mouse Swiss Prot

No:

Immunogen: Purified recombinant fragment of human CD71 expressed in E. Coli.

Specificity: CD71 Monoclonal Antibody detects endogenous levels of CD71 protein.

Formulation : Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.

Source: Monoclonal, Mouse

Dilution: WB 1:500 - 1:2000. IHC 1:200 - 1:1000. IF 1:200 - 1:1000. Flow cytometry:

1:200 - 1:400. ELISA: 1:10000. Not yet tested in other applications.

Purification : Affinity purification

Storage Stability: -15°C to -25°C/1 year(Do not lower than -25°C)

Molecularweight: 85kD

1/4

Cell Pathway : Protein_Acetylation

P References: 1. Cancer Epidemiol Biomarkers Prev. 2009 May;18(5):1651-8.

2. Biochemistry. 2009 Jun 9;48(22):4720-7.

Background:

This gene encodes a cell surface receptor necessary for cellular iron uptake by the process of receptor-mediated endocytosis. This receptor is required for erythropoiesis and neurologic development. Multiple alternatively spliced variants have been identified. [provided by RefSeq, Sep 2015],

Function:

function:Cellular uptake of iron occurs via receptor-mediated endocytosis of ligand-occupied transferrin receptor into specialized endosomes. Endosomal acidification leads to iron release. The apotransferrin-receptor complex is then recycled to the cell surface with a return to neutral pH and the concomitant loss of affinity of apotransferrin for its receptor. Transferrin receptor is necessary for development of erythrocytes and the nervous system (By similarity). A second ligand, the heditary hemochromatosis protein HFE, competes for binding with transferrin for an overlapping C-terminal binding site.,induction:Regulated by cellular iron levels through binding of the iron regulatory proteins, IRP1 and IRP2, to iron-responsive elements in the 3'-UTR. Up-regulated upon mitogenic stimulation.,miscellaneous:Canine and feline parvoviruses bind human and feline transferrin receptors and use t

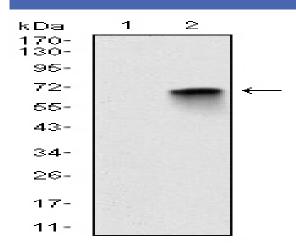
Subcellular Location :

Cell membrane; Single-pass type II membrane protein. Melanosome. Identified by mass spectrometry in melanosome fractions from stage I to stage IV..; [Transferrin receptor protein 1, serum form]: Secreted.

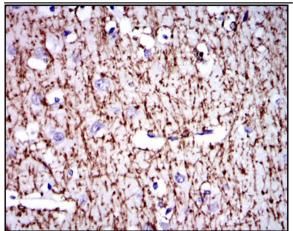
Expression:

Brain, Epithelium, Erythroleukemia, Eye, Human endometrium carcinoma cell line, Liver, Pl

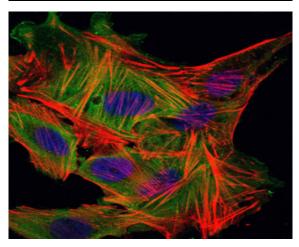
Products Images



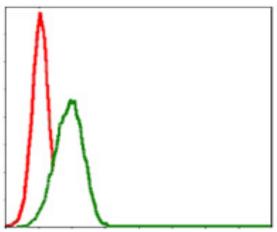
Western Blot analysis using CD71 Monoclonal Antibody against HEK293 (1) and MBP-hlgGFc transfected HEK293 (2) cell lysate.



Immunohistochemistry analysis of paraffin-embedded brain tissues with DAB staining using CD71 Monoclonal Antibody.



Immunofluorescence analysis of MSCS cells using CD71 Monoclonal Antibody (green). Blue: DRAQ5 fluorescent DNA dye. Red: Actin filaments have been labeled with Alexa Fluor-555 phalloidin.



Flow cytometric analysis of HepG2 cells using CD71 Monoclonal Antibody (green) and negative control (red).

