

Product datasheet for TA501385M

OriGene Technologies, Inc.

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CYB5R3 Mouse Monoclonal Antibody [Clone ID: OTI1E3]

Product data:

Product Type: Primary Antibodies

Clone Name: OTI1E3

Applications: FC, IF, IHC, WB

Recommended Dilution: WB 1:500, IF 1:100

Reactivity: Human
Host: Mouse
Isotype: IgG1

Clonality: Monoclonal

Immunogen: Full length human recombinant protein of human CYB5R3 (NP_000389) produced in HEK293T

cell

Formulation: PBS (pH 7.3) containing 1% BSA, 50% glycerol and 0.02% sodium azide.

Concentration: 0.7 mg/ml

Purification: Purified from mouse ascites fluids or tissue culture supernatant by affinity chromatography

(protein A/G)

Conjugation: Unconjugated

Storage: Store at -20°C as received.

Stability: Stable for 12 months from date of receipt.

Predicted Protein Size: 34.1 kDa

Gene Name: cytochrome b5 reductase 3

Database Link: NP 000389

Entrez Gene 1727 Human

P00387



Background:

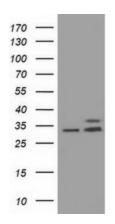
This gene encodes cytochrome b5 reductase, which includes a membrane-bound form in somatic cells (anchored in the endoplasmic reticulum, mitochondrial and other membranes) and a soluble form in erythrocytes. The membrane-bound form exists mainly on the cytoplasmic side of the endoplasmic reticulum and functions in desaturation and elongation of fatty acids, in cholesterol biosynthesis, and in drug metabolism. The erythrocyte form is located in a soluble fraction of circulating erythrocytes and is involved in methemoglobin reduction. The membrane-bound form has both membrane-binding and catalytic domains, while the soluble form has only the catalytic domain. Alternate splicing results in multiple transcript variants. Mutations in this gene cause methemoglobinemias. [provided by RefSeq]

Synonyms: B5R; DIA1

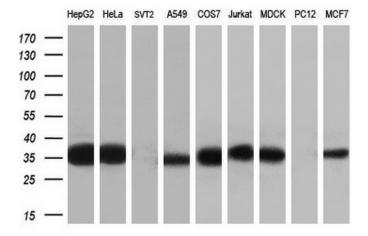
Protein Families: Druggable Genome

Protein Pathways: Amino sugar and nucleotide sugar metabolism

Product images:

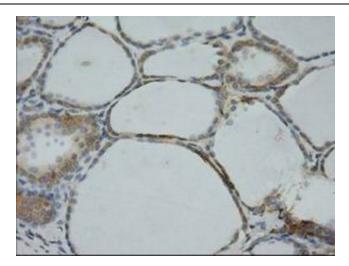


HEK293T cells were transfected with the pCMV6-ENTRY control (Left lane) or pCMV6-ENTRY CYB5R3 ([RC201592], Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-CYB5R3. Positive lysates [LY400140] (100ug) and [LC400140] (20ug) can be purchased separately from OriGene.

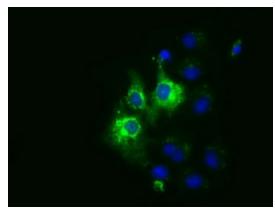


Western blot analysis of extracts (35ug) from 9 different cell lines by using anti-CYB5R3 monoclonal antibody (HepG2: human; HeLa: human; SVT2: mouse; A549: human; COS7: monkey; Jurkat: human; MDCK: canine; PC12: rat; MCF7: human) (1:200).

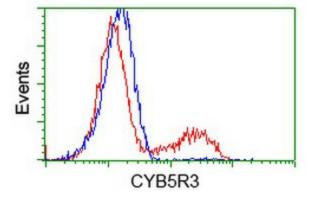




Immunohistochemical staining of paraffinembedded Human thyroid tissue within the normal limits using anti-CYB5R3 mouse monoclonal antibody. ([TA501385]). Heat-induced epitope retrieval by EDTA solution buffer pH 8.0 at 120°C for 3 min.



Anti-CYB5R3 mouse monoclonal antibody ([TA501385]) immunofluorescent staining of COS7 cells transiently transfected by pCMV6-ENTRY CYB5R3 ([RC201592]).



HEK293T cells transfected with either [RC201592] overexpress plasmid (Red) or empty vector control plasmid (Blue) were immunostained by anti-CYB5R3 antibody ([TA501385]), and then analyzed by flow cytometry.