

TMEM135 Antibody

Catalog # ASC11639

Specification

TMEM135 Antibody - Product Information

Application Primary Accession Other Accession Reactivity Host Clonality Isotype Calculated MW

Application Notes

WB, IHC, IF <u>Q86UB9</u> <u>NP_075069</u>, <u>281182571</u> Human, Mouse, Rat Rabbit Polyclonal IgG Predicted: 50 kDa

Observed: 53 kDa KDa TMEM135 Antibody can be used for detection of TMEM135 by Western blot starting at 1 μ g/mL.

TMEM135 Antibody - Additional Information

Gene ID

65084

Target/Specificity TMEM135; At least two isoforms of TMEM135 are known to exist; this antibody will detect both isoforms.

Reconstitution & Storage TMEM135 antibody can be stored at 4°C for three months and -20°C, stable for up to one year.

Precautions TMEM135 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

TMEM135 Antibody - Protein Information

Name TMEM135 (<u>HGNC:26167</u>)

Function

Involved in mitochondrial metabolism by regulating the balance between mitochondrial fusion and fission. May act as a regulator of mitochondrial fission that promotes DNM1L-dependent fission through activation of DNM1L. May be involved in peroxisome organization.

Cellular Location

Mitochondrion membrane {ECO:0000250|UniProtKB:Q9CYV5}; Multi-pass membrane protein {ECO:0000250|UniProtKB:Q9CYV5}. Peroxisome membrane {ECO:0000250|UniProtKB:Q9CYV5}; Multi-pass membrane protein



TMEM135 Antibody - Protocols

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

- <u>Western Blot</u>
- <u>Blocking Peptides</u>
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

TMEM135 Antibody - Images



Western blot analysis of TMEM135 in rat liver tissue lysate with TMEM135 antibody at (A) 1 and (B) 2 μ g/mL.



Immunohistochemistry of TMEM135 in human liver tissue with TMEM135 antibody at 2.5 µg/ml.





Immunofluorescence of TMEM135 in human liver tissue with TMEM135 antibody at 20 µg/ml.

TMEM135 Antibody - Background

TMEM135 Antibody: The transmembrane protein 135 (TMEM135), also known as peroxisomal membrane protein 52 (PMP52), was initially identified as a protein that might be critical for adipogenesis and osteoblastogenesis. Further studies have indicated that TMEM135 may be part of a regulatory circuit that plays an important role in fat metabolism and energy expenditure in both C. elegans as well as mammalian organisms. Finally, recent experiments has suggested that TMEM135 may be an additional driver of breast cancer.

TMEM135 Antibody - References

Scheideler M, Elabd C, Zaragosi LE, et al. Comparative transcriptomics of human multipotent stem cells during adipogenesis and osteoblastogenesis. BMC Genomics 2008; 9:340.

Exil VJ, Avila DS, Benedetto A, et al. Stress-induced TMEM135 protein is part of a conserved genetic network involved in fat storage and longetivity regulation in Caenorhabditis elegans. PLoS One 2010; 5:e14228.

Natrajan R, Mackay A, Lambros MB, et al. A whole-genome massively parallel sequencing analysis of BRCA1 mutant oestrogen receptor-negative and –positive breast cancers. J. Pathol. 2012; 227:29-41.