

Mitofusin 2 Antibody

Mitofusin 2 Antibody, Clone S153-5 Catalog # ASM10291

Specification

Mitofusin 2 Antibody - Product Information

Application WB, IHC, ICC
Primary Accession Q80U63
Other Accession NP_573464.2
Host Mouse
Isotype IgG2a

Reactivity Human, Mouse, Rat

Clonality Monoclonal

Description

Mouse Anti-Human Mitofusin 2 Monoclonal IgG2a

Target/Specificity

Detects ~90kDa. No cross-reactivity against Mitofusin-1.

Other Names

CMT2A Antibody, CMT2A2 Antibody, CPRP 1 Antibody, CPRP1 Antibody, Fzo Antibody, HSG Antibody, hyperplasia suppressor gene Antibody, Hypertension related protein 1 Antibody, KIAA0214 Antibody, MARF Antibody, MFN 2 Antibody, Mfn2 Antibody, Mitochondrial assembly regulatory factor Antibody, Mitofusin-2 Antibody, Mitofusin2 Antibody, Transmembrane GTPase MFN2 Antibody

Immunogen

Fusion protein amino acids 370-600 (cytoplasmic N-terminus) of mouse Mitofusin-2. Rat: 97% identity (226/231 amino acids identical). Human: 92% identity (214/231 amino acids identical) \sim 55% identity with Mitofusin-1.

Purification

Protein G Purified

Storage -20°C

Storage Buffer

PBS pH 7.4, 50% glycerol, 0.1% sodium azide

Shipping Temperature Blue Ice or 4°C

Certificate of Analysis

 $1~\mu g/ml$ of SMC-457 was sufficient for detection of Mitofusin-2 in 20 μg of mouse cardiac mitochondrial lysate by colorimetric immunoblot analysis using Goat anti-mouse IgG:HRP as the secondary antibody.

Cellular Localization

Mitochondrion | Mitochondrion Outer Membrane

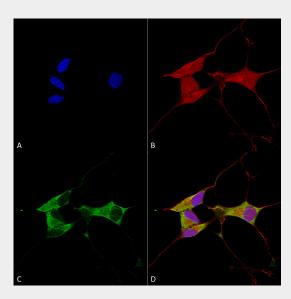
Mitofusin 2 Antibody - Protocols

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



- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Mitofusin 2 Antibody - Images



Immunocytochemistry/Immunofluorescence analysis using Mouse Anti-Mitofusin 2 Monoclonal Antibody, Clone N153/5 (ASM10291). Tissue: Neuroblastoma cells (SH-SY5Y). Species: Human. Fixation: 4% PFA for 15 min. Primary Antibody: Mouse Anti-Mitofusin 2 Monoclonal Antibody (ASM10291) at 1:100 for overnight at 4°C with slow rocking. Secondary Antibody: AlexaFluor 488 at 1:1000 for 1 hour at RT. Counterstain: Phalloidin-iFluor 647 (red) F-Actin stain; Hoechst (blue) nuclear stain at 1:800, 1.6mM for 20 min at RT. (A) Hoechst (blue) nuclear stain. (B) Phalloidin-iFluor 647 (red) F-Actin stain. (C) Mitofusin 2 Antibody (D) Composite.

Mitofusin 2 Antibody - Background

Mitofusin-2 (Mfn2) is a membrane protein of the mitochondria and is important in mitochondrial fusion in mammalian cells. Mfn2 activity has also been implicated in mitochondrial metabolism and the loss of Mfn2 may be the reason for certain metabolic modifications that are seen in individuals with obesity. Mfn2 has been associated with maintaining the membrane potential of the mitochondria. Mfn2 has been shown to hinder mitochondrial antiviral signaling by inhibiting production of type 1 interferons. Mfn2 is a p53-inducible target and involved in cell proliferation, apoptosis promotion and tumor suppression.