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Datasheet for 600-401-FL8

TOM70 Antibody

Overview

Description:	Anti-TOM70 (RABBIT) Antibody - 600-401-FL8
Item No.:	600-401-FL8
Size:	100 µg
Applications:	ELISA, IF, IHC, WB
Reactivity:	Human, Mouse, Rat
Host Species:	Rabbit

Product Details

Background:	The translocase of outer mitochondrial membrane (TOM) complex is a multisubunit complex involved in the recognition, unfolding, and translocation of preproteins into the mitochondria. TOM70, an important member of the TOM complex, contains a tetratricopeptide repeat domain similar to those found in cytosolic chaperones such as Hsp90 and Hsc70 and provides a docking site for these proteins. This interaction is thought to be a critical first step in the TOM70-dependent mitochondrial import, followed by contact between the preprotein and TOM70. After targeting to TOM70, preproteins are translocated through the outer membrane via the TOM40 import pore complex. The precise mechanism of how preproteins progress from TOM70 to TOM40 to full translocation is still unclear. At least two isoforms of TOM70 are known to exist.
Synonyms:	TOM70 Antibody, KIAA0719, TOM70, Mitochondrial import receptor subunit TOM70, Mitochondrial precursor proteins import receptor, Translocase of outer membrane 70 kDa subunit, Translocase of outer mitochondrial membrane protein 70, TOMM70, TOMM70A
Host Species:	Rabbit
Clonality:	Polyclonal
Format:	IgG

Target Details

Gene Name:	TOMM70
Reactivity:	Human, Mouse, Rat

Immunogen Type:	Conjugated Peptide
Immunogen:	Anti-TOM70 antibody was prepared from whole rabbit serum produced by repeated immunizations with a 17 amino acid synthetic peptide near the N-terminus of human TOM70.
Purity/Specificity:	Anti-TOM70 Antibody was affinity purified from monospecific antiserum by immunoaffinity chromatography. Cross reactivity with TOM70 from other sources has not been determined.
Relevant Links:	• UniProtKB - O94826 • GeneID - 9868 • NCBI - NP_055635.3

Application Details

Tested Applications:	ELISA, IF, IHC, WB
Application Note:	Anti-TOM70 Antibody has been tested for use in ELISA, Western Blotting, Immunohistochemistry and Immunofluorescence. Specific conditions for reactivity should be optimized by the end user. Expect a band at approximately 68 kDa in Western Blots of specific cell lysates and tissues.
Assay Dilutions:	All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.
ELISA:	1:10,000 - 1:20,000
IF:	20 µg/mL
IHC:	2.5 µg/mL
WB:	1-2 µg/mL

Formulation

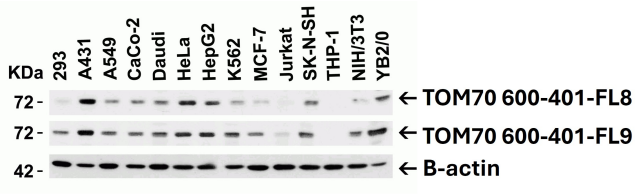
Physical State:	Liquid (sterile filtered)
Concentration:	1 mg/mL by UV absorbance at 280 nm
Buffer:	0.01 M Sodium Phosphate, 0.25 M Sodium Chloride, pH 7.2
Preservative:	0.02% (w/v) Sodium Azide
Stabilizer:	None

Shipping & Handling

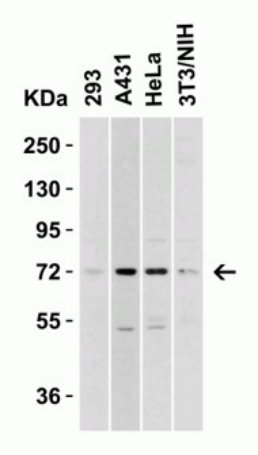
Shipping Condition:	Dry Ice

Storage Condition:	Store vial at -20° C prior to opening. Aliquot contents and freeze at -20° C or below for extended storage. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. This product is stable for several weeks at 4° C as an undiluted liquid. Dilute only prior to immediate use.
Expiration:	Expiration date is one (1) year from date of receipt.

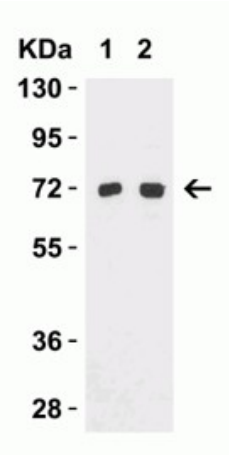
Images



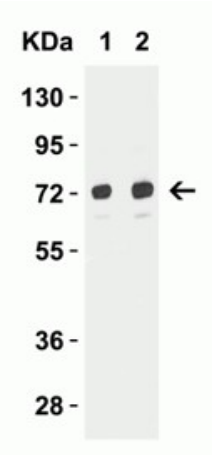
Western Blot
Western Blot using TOM70. Loading: 15 µg of Human, Mouse and Rat Cell Line lysates per lane. Antibodies: TOM70 p/n 600-401-FL8 (2 µg/mL), TOM70 p/n 600-401-FL9 (2 µg/mL) and beta-actin (1 µg/mL), 1h incubation at RT in 5% NFDM/TBST. Secondary: Goat anti-rabbit IgG HRP conjugate at 1:10000 dilution.



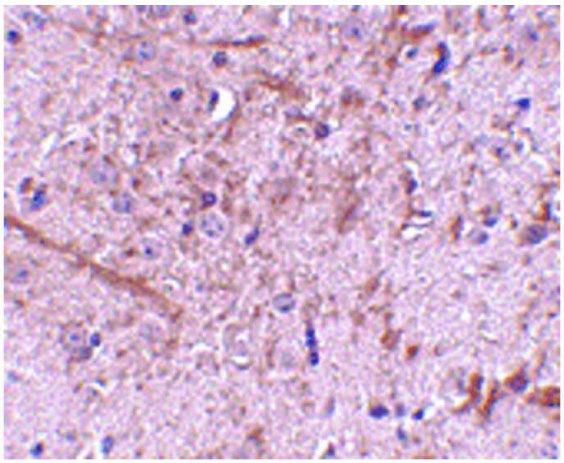
Western Blot
Western Blot Validation using TOM70. Loading: 15 µg of human and mouse cell lysates per lane. Antibodies: TOM70 (2 µg/mL), 1h incubation at RT in 5% NFDM/TBST. Secondary: Goat anti-rabbit IgG HRP conjugate at 1:10000 dilution.



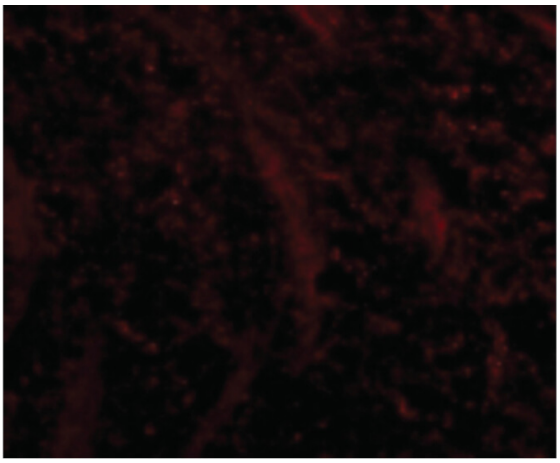
Western Blot
Western Blot Validation using TOM70. Loading: 15 µg of mouse brain tissue lysates per lane. Antibodies: TOM70 (Lane 1: 2 µg/mL and Lane 2: 4 µg/mL), 1h incubation at RT in 5% NFDM/TBST. Secondary: Goat anti-rabbit IgG HRP conjugate at 1:10000 dilution.



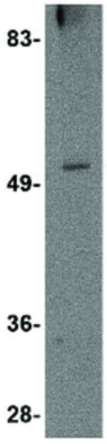
Western Blot
Western Blot Validation using TOM70. Loading: 15 µg of rat tissue lysates per lane. Antibodies: TOM70 (Lane 1: 2 µg/mL and Lane 2: 4 µg/mL), 1h incubation at RT in 5% NFDM/TBST. Secondary: Goat anti-rabbit IgG HRP conjugate at 1:10000 dilution.



Immunohistochemistry
Immunohistochemistry of TOM70 antibody. Tissue: Mouse brain tissue. Fixation: formalin fixed paraffin embedded. Antigen retrieval: not required. Primary antibody: TOM70 antibody at 2.5 µg/mL for 1 h at RT. Secondary antibody: Peroxidase rabbit secondary antibody at 1:10,000 for 45 min at RT. Localization: TOM70 is nuclear and occasionally cytoplasmic. Staining: TOM70 as a precipitated red signal with hematoxylin purple nuclear counterstain.



Immunofluorescence Microscopy
Immunofluorescence Microscopy of TOM70 antibody. Tissue: Mouse brain cells. Fixation: 0.5% PFA. Antigen retrieval: not required. Primary antibody: TOM70 antibody at 5 µg/mL for 1 h at RT. Secondary antibody: Fluorescein rabbit secondary antibody at 1:10,000 for 45 min at RT. Staining: TOM70 as a red fluorescent signal.



Western Blot
Western Blot of TOM70 antibody. Lane A: 293 cell lysate at 2 µg/mL. Load: 35 µg per lane. Secondary antibody: Peroxidase rabbit secondary antibody at 1:10,000 for 45 min at RT. Block: 5% BLOTTO overnight at 4°C. Predicted/Observed size: 104.2 kDa, ~50 kDa for TOM70.

Disclaimer

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