

ARG43144 anti-TRIM21 antibody

Package: 50 μg Store at: -20°C

Summary

Product Description	Rabbit Polyclonal antibody recognizes TRIM21
Tested Reactivity	Hu, Ms, Rat
Tested Application	FACS, ICC/IF, WB
Host	Rabbit
Clonality	Polyclonal
Isotype	lgG
Target Name	TRIM21
Species	Human
Immunogen	Recombinant protein corresponding to E12-Y475 of Human TRIM21.
Conjugation	Un-conjugated
Alternate Names	RNF81; Ro; EC 6.3.2; SSA1; SS-A; RO52; Ro/SSA; E3 ubiquitin-protein ligase TRIM21; 52 kDa ribonucleoprotein autoantigen Ro/SS-A; Sjoegren syndrome type A antigen; 52 kDa Ro protein; RING finger protein 81; SSA; Tripartite motif-containing protein 21

Application Instructions

Application table	Application	Dilution
	FACS	1:150 - 1:500
	ICC/IF	1:200 - 1:1000
	WB	1:500 - 1:2000
Application Note	* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	
Observed Size	~ 53 kDa	

Properties

Form	Liquid
Purification	Affinity purification with immunogen.
Buffer	0.2% Na2HPO4, 0.9% NaCl, 0.05% Sodium azide and 4% Trehalose.
Preservative	0.05% Sodium azide
Stabilizer	4% Trehalose
Concentration	0.5 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C or below. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed

before use.

For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

Gene Symbol	TRIM21
Gene Full Name	tripartite motif containing 21
Background	This gene encodes a member of the tripartite motif (TRIM) family. The TRIM motif includes three zinc- binding domains, a RING, a B-box type 1 and a B-box type 2, and a coiled-coil region. The encoded protein is part of the RoSSA ribonucleoprotein, which includes a single polypeptide and one of four small RNA molecules. The RoSSA particle localizes to both the cytoplasm and the nucleus. RoSSA interacts with autoantigens in patients with Sjogren syndrome and systemic lupus erythematosus. Alternatively spliced transcript variants for this gene have been described but the full-length nature of only one has been determined. [provided by RefSeq, Jul 2008]
Function	E3 ubiquitin-protein ligase whose activity is dependent on E2 enzymes, UBE2D1, UBE2D2, UBE2E1 and UBE2E2. Forms a ubiquitin ligase complex in cooperation with the E2 UBE2D2 that is used not only for the ubiquitination of USP4 and IKBKB but also for its self-ubiquitination. Component of cullin-RING-based SCF (SKP1-CUL1-F-box protein) E3 ubiquitin-protein ligase complexes such as SCF(SKP2)-like complexes. A TRIM21-containing SCF(SKP2)-like complex is shown to mediate ubiquitination of CDKN1B ('Thr-187' phosphorylated-form), thereby promoting its degradation by the proteasome. Monoubiquitinates IKBKB that will negatively regulates Tax-induced NF-kappa-B signaling. Negatively regulates IFN-beta production post-pathogen recognition by polyubiquitin-mediated degradation of IRF3. Mediates the ubiquitin-mediated proteasomal degradation of IgG1 heavy chain, which is linked to the VCP-mediated ER-associated degradation (ERAD) pathway. Promotes IRF8 ubiquitination, which enhanced the ability of IRF8 to stimulate cytokine genes transcription in macrophages. Plays a role in the regulation of the cell cycle progression. Enhances the decapping activity of DCP2. Exists as a ribonucleoprotein particle present in all mammalian cells studied and composed of a single polypeptide and one of four small RNA molecules. At least two isoforms are present in nucleated and red blood cells, and tissue specific differences in RO/SSA proteins have been identified. The common feature of these proteins is their ability to bind HY RNAs.2. Involved in the regulation of innate immunity and the inflammatory response in response to IFNG/IFN-gamma. Organizes autophagic machinery by serving as a platform for the assembly of ULK1, Beclin 1/BECN1 and ATG8 family members and recognizes specific autophagy. Acts as an autophagy receptor for the degradation of IRF3, hence attenuating type I interferon (IFN)-dependent immune responses (PubMed:26347139). [UniProt]
Calculated Mw	54 kDa
PTM	Autoubiquitinated; does not lead to its proteasomal degradation. Deubiquitinated by USP4; leading to its stabilization. [UniProt]
Cellular Localization	Cytoplasm. Cytoplasmic vesicle, autophagosome. Nucleus. Cytoplasm, P-body. Note=Enters the nucleus upon exposure to nitric oxide. Localizes to small dot- or rod-like structures in the cytoplasm, called processing bodies (P-bodies) that are located underneath the plasma membrane and also diffusely in the cytoplasm. They are located along the microtubules and are highly motile in cells. Colocalizes with DCP2 in P-bodies. [UniProt]



ARG43144 anti-TRIM21 antibody ICC/IF image

Immunofluorescence: U2OS cells were blocked with 10% goat serum and then stained with ARG43144 anti-TRIM21 antibody (green) at 2 μ g/ml dilution, overnight at 4°C. DAPI (blue) for nuclear staining.



ARG43144 anti-TRIM21 antibody WB image

Western blot: 50 μ g of sample under reducing conditions. Rat lung, Mouse lung, Rat thymus, Mouse thymus, HeLa and THP-1 whole cell lysates stained with ARG43144 anti-TRIM21 antibody at 0.5 μ g/ml dilution, overnight at 4°C.



ARG43144 anti-TRIM21 antibody FACS image

Flow Cytometry: SiHa cells were blocked with 10% normal goat serum and then stained with ARG43144 anti-TRIM21 antibody (blue) at 1 μ g/10^6 cells for 30 min at 20°C, followed by incubation with DyLight®488 labelled secondary antibody. Isotype control antibody (green) was rabbit IgG (1 μ g/10^6 cells) used under the same conditions. Unlabelled sample (red) was also used as a control.