

ARG44761 anti-TSC1 / Hamartin antibody

Package: 50 µg
Store at: -20°C

Summary

Product Description	Mouse Monoclonal antibody recognizes TSC1 / Hamartin
Tested Reactivity	Hu
Tested Application	IP, WB
Host	Mouse
Clonality	Monoclonal
Isotype	IgG1
Target Name	TSC1 / Hamartin
Species	Human
Conjugation	Un-conjugated
Alternate Names	LAM; Tuberous sclerosis 1 protein; Hamartin; TSC

Application Instructions

Application table	Application	Dilution
	IP	10 µg/mL
	WB	1 µg/mL
Application Note	* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	

Properties

Form	Liquid
Purification	Protein A purification
Buffer	PBS with 0.09% sodium azide
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.
Note	For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

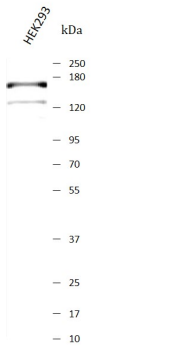
Gene Symbol	TSC1
Gene Full Name	tuberous sclerosis 1
Background	This gene encodes a growth inhibitory protein thought to play a role in the stabilization of tuberin.

Mutations in this gene have been associated with tuberous sclerosis. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Jun 2009]

Function	Capsid-specific restriction factor that prevents infection from non-host-adapted retroviruses. Blocks viral replication early in the life cycle, after viral entry but before reverse transcription. In addition to acting as a capsid-specific restriction factor, also acts as a pattern recognition receptor that activates innate immune signaling in response to the retroviral capsid lattice. Binding to the viral capsid triggers its E3 ubiquitin ligase activity, and in concert with the heterodimeric ubiquitin conjugating enzyme complex UBE2V1-UBE2N (also known as UBC13-UEV1A complex) generates 'Lys-63'-linked polyubiquitin chains, which in turn are catalysts in the autophosphorylation of the MAP3K7/TAK1 complex (includes TAK1, TAB2, and TAB3). Activation of the MAP3K7/TAK1 complex by autophosphorylation results in the induction and expression of NF-kappa-B and MAPK-responsive inflammatory genes, thereby leading to an innate immune response in the infected cell. Restricts infection by N-tropic murine leukemia virus (N-MLV), equine infectious anemia virus (EIAV), simian immunodeficiency virus of macaques (SIVmac), feline immunodeficiency virus (FIV), and bovine immunodeficiency virus (BIV).
Calculated Mw	130 kDa
PTM	Phosphorylation at Ser-505 does not affect interaction with TSC2. [UniProt]
Cellular Localization	Cytoplasm. Membrane; Peripheral membrane protein. At steady state found in association with membranes. [UniProt]

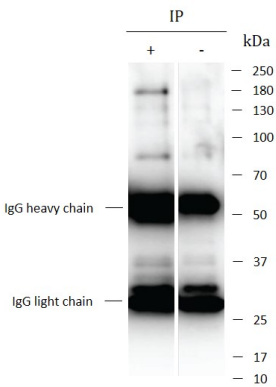
Images

ARG44761 anti-TSC1 / Hamartin antibody WB image



Western blot: HEK293 stained with ARG44761 anti-TSC1 / Hamartin antibody at 1 µg/mL dilution.

ARG44761 anti-TSC1 / Hamartin antibody IP image



Immunoprecipitation: HEK293 lysate immunoprecipitated with 2.5 µg of ARG44761 anti-TSC1 / Hamartin antibody.