

Datasheet for ABIN501075

anti-Tuberin antibody (N-Term)[Go to Product page](#)**2** Images

Overview

Quantity:	0.1 mg
Target:	Tuberin (TSC2)
Binding Specificity:	N-Term
Reactivity:	Human, Mouse
Host:	Rabbit
Clonality:	Polyclonal
Conjugate:	This Tuberin antibody is un-conjugated
Application:	Western Blotting (WB), Immunofluorescence (IF), Enzyme Immunoassay (EIA)

Product Details

Immunogen:	TSC2 (NT) was raised against a 14 amino acid peptide from near the amino terminus of human TSC2.
Isotype:	IgG
Specificity:	This antibody detects TSC2 at N-term.
Cross-Reactivity (Details):	Species reactivity (tested): Human, mouse
Purification:	Peptide affinity chromatography

Target Details

Target:	Tuberin (TSC2)
Alternative Name:	Tuberin / TSC2 (TSC2 Products)

Target Details

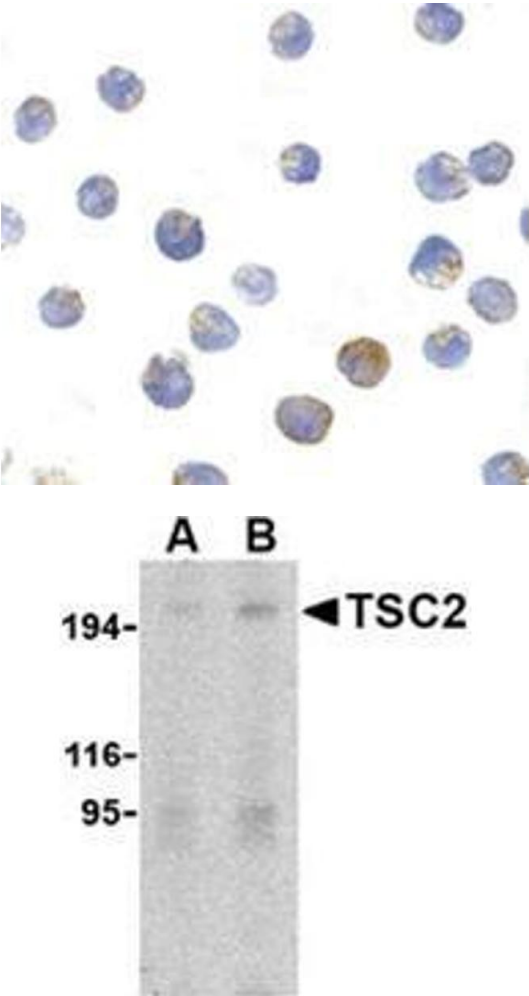
Background:	Tuberous sclerosis complex (TSC) is an autosomal dominant tumor syndrome caused by mutations in either of the TSC1 or TSC2 tumor suppressor genes. The products of these genes form a protein complex that indirectly decreases the signaling of the mammalian Target of Rapamycin (TOR), an evolutionarily conserved serine/threonine kinase that regulates cell growth and cell cycle through its ability to integrate signals from nutrient levels and growth factors (reviewed in 1,2). TOR activity is stimulated by Rheb, a member of the Ras superfamily of G-proteins, when the GTP/GDP ratio bound to Rheb is high (3). Immunoprecipitated TSC1/TSC2 has been shown to stimulate Rheb GTPase activity in vitro (4), suggesting that the TSC1/TSC2 complex decreases the ability of Rheb to stimulate TOR activity. This is supported by experiments showing that overexpression of TSC1 and TSC2 results in a significant decrease in the GTP/GDP ratio bound to Rheb and the inhibition of cell growth (4,5). At least three isoforms of TSC2 exist.Synonyms: TSC4, Tuberous sclerosis 2 protein
Gene ID:	7249
NCBI Accession:	NP_000539
Pathways:	RTK Signaling , AMPK Signaling , Fc-epsilon Receptor Signaling Pathway , EGFR Signaling Pathway , Neurotrophin Signaling Pathway , Regulation of Cell Size , Tube Formation , Protein targeting to Nucleus

Application Details

Application Notes:	ELISA. Western blot: 1 µg/mL. Immunofluorescence. Other applications not tested. Optimal dilutions are dependent on conditions and should be determined by the user.
Restrictions:	For Research Use only

Handling

Buffer:	PBS containing 0.02 % sodium azide
Preservative:	Sodium azide
Precaution of Use:	This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.
Handling Advice:	Avoid repeated freezing and thawing.
Storage:	4 °C/-20 °C
Storage Comment:	Store at 2 - 8 °C for up to one month or (in aliquots) at -20 °C for longer.



Immunofluorescence

Image 1. Immunocytochemistry of TSC2 in L1210 cells with this product at 10 µg/ml.

Western Blotting

Image 2. Western blot analysis of TSC2 in L1210 cell lysate with this product at (A) 2 and (B) 4 µg/ml.