10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

FUS / TLS Antibody

Rabbit mAb
Catalog # AP91020

Product Information

Application	WB, IHC, IF, FC, ICC, IHF
Primary Accession	P35637
Reactivity	Rat, Human, Mouse
Clonality	Monoclonal
Other Names	FUS; ALS6; CHOP; FUS-CHOP; FUS1; Fused in sarcoma; HnRNPP2; Oncogene TLS; ETM4; Fus-like protein; Oncogene FUS; POMP75;
Isotype	Rabbit IgG
Host	Rabbit
Calculated MW	53426

Additional Information

Dilution	WB 1:500~1:2000 IHC 1:50~1:200 ICC/IF 1:50~1:200 FC 1:50
Purification	Affinity-chromatography
Immunogen	A synthesized peptide derived from human FUS / TLS
Description	FUS/TLS (fused in sarcoma/translocated in liposarcoma) was initially identified by investigators as a component of fusion proteins found in a variety of cancers such as myxoid liposarcoma, acute myeloid leukemia, and Ewing's tumor.
Storage Condition and Buffer	Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term. Avoid freeze / thaw cycle.

Protein Information

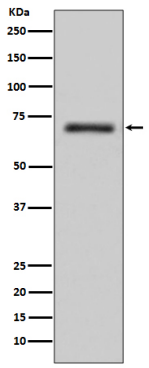
Name	FUS
Synonyms	TLS
Function	DNA/RNA-binding protein that plays a role in various cellular processes such as transcription regulation, RNA splicing, RNA transport, DNA repair and damage response (PubMed:27731383). Binds to ssRNA containing the consensus sequence 5'-AGGUAA-3' (PubMed:21256132). Binds to nascent pre-mRNAs and acts as a molecular mediator between RNA polymerase II and U1 small nuclear ribonucleoprotein thereby coupling transcription and splicing (PubMed:26124092). Also binds its own pre- mRNA and autoregulates its expression; this autoregulation mechanism is mediated by non-sense-mediated decay (PubMed:24204307). Plays a role in DNA repair mechanisms by promoting D-loop formation and homologous recombination during DNA double-strand break repair (PubMed:10567410). In neuronal cells, plays crucial roles in dendritic spine formation and stability, RNA

transport, mRNA stability and synaptic homeostasis (By similarity).

Cellular Location Nucleus Note=Displays a punctate pattern inside the nucleus and is excluded from nucleoli.

Tissue Location Ubiquitous.

Images



Western blot analysis of FUS / TLS expression in K562 cell lysate.