

Rabbit Anti-phospho-DDX3

SL12190R-FITC

Product Name:	Anti-phospho-DDX3(Thr322)/FITC
Chinese Name:	FITC标记的磷酸化三磷酸腺苷依赖解旋酶DDX3抗体
Alias:	p-DDX3 (phospho T322); ATP dependent RNA helicase DDX3X; ATP-dependent RNA helicase DDX3X; CAP Rf; DBX; DDX14; DDX3X; DDX3X_HUMAN; DEAD (Asp Glu Ala Asp) box polypeptide 3 X linked; DEAD box; DEAD box protein 3; DEAD box protein 3 X-chromosomal; DEAD box X isoform; DEAD/H (Asp Glu Ala Asp/His) box polypeptide 3; DEAD/H box 3; Fibroblast Growth Factor Inducible 14; Fin14; Helicase like protein 2; Helicase-like protein 2; HLP2; X isoform; X-chromosomal.
Organism Species:	Rabbit
Clonality:	Polyclonal
React Species:	Human, Mouse, Rat, Chicken, Dog, Pig, Cow, Horse, Sheep,
Applications:	ICC=1:50-200IF=1:50-200 not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Molecular weight:	73kDa
Form:	Lyophilized or Liquid
Concentration:	lmg/ml
immunogen:	KLH conjugated synthesised phosphopeptide derived from human DDX3 around the phosphorylation site of Thr322
Lsotype:	IgG
Purification:	affinity purified by Protein A
Storage Buffer:	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
Storage:	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20 °C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
Product Detail:	background: DDX3 is involved in RNA metabolism. Two DDX3 paralogs are found in humans;

DDX3X is encoded by a gene found on the X chromosome while DDX3Y is encoded by a gene on the Y chromosome. DDX3Y is exclusively expressed in testis and is required for normal spermatogenesis. DDX3X is ubiquitously expressed and predominantly localizes to the nuclear speckles, participating in RNA splicing, transcription, translation initiation, mRNA transport and cell cycle regulation. DDX3X also partakes in HIV-1 replication and hepatitis C viral infections.

Function:

ATP-dependent RNA helicase. Acts as a cofactor for XPO1-mediated nuclear export of incompletely spliced HIV-1 Rev RNAs. Also involved in HIV-1 replication. Interacts specifically with hepatitis C virus core protein resulting in a change in intracellular location.

Subunit:

Interacts with XPO1, TDRD3, PABPC1, NXF1, EIF3C, MAVS, DDX58 and NCAPH. Interacts with DDX5; the interaction is regulated by the phosphorylation status of both proteins. Interacts with EIF4E; DDX3X competes with EIF4G1/EIF4G3 for interaction with EIF4E. Interacts with IKBKE; the interaction is found to be induced upon virus infection and to be inhibited by HBV polymerase. Interacts with TBK1; the interaction is inhibited by HBV polymerase. Associates with the eukaryotic translation initiation factor 3 (eIF-3) complex. Associates with the 40S ribosome. Identified in a mRNP complex, at least composed of DHX9, DDX3X, ELAVL1, HNRNPU, IGF2BP1, ILF3, PABPC1, PCBP2, PTBP2, STAU1, STAU2, SYNCRIP and YBX1. Interacts with HCV core protein. Interacts with vaccinia virus (VACV) protein K7. Found in a complex with HIV-1 Rev and XPO1.

Subcellular Location:

Nucleus speckle. Cytoplasm. Located predominantly in nuclear speckles and, at low levels, throughout the cytoplasm. Located to the outer side of nuclear pore complexes (NPC). Shuttles between the nucleus and the cytoplasm in a XPO1-dependent manner.

Post-translational modifications:

Phosphorylated by TBK1; the phosphorylation is required to synergize with TBK1 in IFN-beta induction. Probably also phosphorylated by IKBKE. The cytoplasmic form is highly phosphorylated in the G1/S phase and much lower phosphorylated in G2/M.

Similarity:

Belongs to the DEAD box helicase family. DDX3/DED1 subfamily.

Contains 1 helicase ATP-binding domain.

Contains 1 helicase C-terminal domain.

Database links:

Entrez Gene: 1654Human

Entrez Gene: 13205 Mouse

Entrez Gene: 317335Rat

Omim: 300160 Human

SwissProt: O00571Human

SwissProt: Q62167Mouse

Unigene: 380774Human

Unigene: 743263Human

Unigene: 289662 Mouse

Unigene: 95841Rat

Important Note:

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.