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Tankyrase Polyclonal Antibody
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP59144

Specification

Tankyrase Polyclonal Antibody - Product Information

Application	**WB, IHC-P, IHC-F, IF, E**
Primary Accession	O95271
Reactivity	**Rat, Dog, Bovine**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**142 KDa**
Physical State	**Liquid**
Immunogen	**KLH conjugated synthetic peptide derived from human Tankyrase**
Epitope Specificity	**1101-1250/1327**

Purity
affinity purified by Protein A

Buffer	**0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.**
SUBCELLULAR LOCATION	**Cytoplasm.**
SIMILARITY	**Contains 1 C2H2-type zinc finger.**
SUBUNIT	**Interacts with TBK1 (via TRAF-C domain). Interacts with TRAF1 (via TRAF-C domain). Interacts with TRAF2 (via TRAF-C domain); the interaction is disrupted by the phosphorylation of TANK by IKBKE. Interacts with TRAF3 (via TRAF-C domain); the interaction with TRAF3 is weaker than the interactions with TRAF1 and TRAF3. Interacts with IKBKG; the interaction is enhanced by IKBKE and TBK1. Part of a ternary complex consisting of TANK, IKBKB and IKBKG.**
Post-translational modifications	**Phosphorylated by IKBKE.**
Important Note	**This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.**

Background Descriptions
TANK was initially identified as a novel TRAF-interacting protein that regulated TRAF-mediated signal transduction. Specifically, ligand binding by surface receptors in the tumor necrosis factor (TNF) receptor and Toll/interleukin-1 (IL-1) receptor families lead to the formation of a TRAF/TANK complex that mediates the activation of the transcription factor NF-kappaB. TANK is found in the cytoplasm and can bind to TRAF1, TRAF2, or TRAF3, thereby inhibiting TRAF function by sequestering the TRAFs in a latent state in the cytoplasm. For example, this protein can block TRAF2 binding to LMP1, the Epstein Barr virus transforming protein, and inhibit LMP1-mediated NF kappa B activation.

Tankyrase Polyclonal Antibody - Additional Information

Gene ID 8658

Other Names
Poly [ADP-ribose] polymerase tankyrase-1, 2.4.2.30, ADP-ribosyltransferase diphtheria toxin-like 5, ARTD5, Poly [ADP-ribose] polymerase 5A, Protein poly-ADP-ribosyltransferase tankyrase-1, 2.4.2.-, TNKS-1, TRF1-interacting ankyrin-related ADP-ribose polymerase, Tankyrase I, Tankyrase-1, TANK1, TNKS (HGNC:11941)

Target/Specificity
Ubiquitous.

Dilution
WB~~1:1000<br \>IHC-P~~N/A<br \>IHC-F~~N/A<br \>IF~~1:50~200<br \>E~~N/A

Format
0.01M TBS(pH7.4), 0.09% (W/V) sodium azide and 50% Glyce

Storage
Store at -20 ℃ for one year. Avoid repeated freeze/thaw cycles. 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 ℃.

Tankyrase Polyclonal Antibody - Protein Information

Name TNKS (HGNC:11941)

Function
Poly-ADP-ribosyltransferase involved in various processes such as Wnt signaling pathway, telomere length and vesicle trafficking (PubMed:10988299, PubMed:11739745, PubMed:16076287, PubMed:19759537, PubMed:21478859, PubMed:22864114, PubMed:23622245, PubMed:25043379, PubMed:28619731). Acts as an activator of the Wnt signaling pathway by mediating poly-ADP-ribosylation (PARsylation) of AXIN1 and AXIN2, 2 key components of the beta-catenin destruction complex: poly-ADP- ribosylated target proteins are recognized by RNF146, which mediates their ubiquitination and subsequent degradation (PubMed:19759537, PubMed:21478859). Also mediates PARsylation of BLZF1 and CASC3, followed by recruitment of RNF146 and subsequent ubiquitination (PubMed:21478859). Mediates PARsylation of TERF1, thereby contributing to the regulation of telomere length (PubMed:11739745). Involved in centrosome maturation during prometaphase by mediating PARsylation of HEPACAM2/MIKI (PubMed:22864114). May also regulate vesicle trafficking and modulate the subcellular distribution of

SLC2A4/GLUT4-vesicles (PubMed:10988299). May be involved in spindle pole assembly through PARsylation of NUMA1 (PubMed:16076287). Stimulates 26S proteasome activity (PubMed:23622245).

Cellular Location
Cytoplasm. Golgi apparatus membrane; Peripheral membrane protein. Cytoplasm, cytoskeleton, microtubule organizing center, centrosome. Nucleus, nuclear pore complex. Chromosome, telomere. Cytoplasm, cytoskeleton, spindle pole. Note=Associated with the Golgi and with juxtanuclear SLC2A4/GLUT4-vesicles (PubMed:22864114). A minor proportion is also found at nuclear pore complexes and around the pericentriolar matrix of mitotic centromeres (PubMed:10523501). During interphase, a small fraction of TNKS is found in the nucleus, associated with TERF1 (PubMed:12768206). Localizes to spindle poles at mitosis onset via interaction with NUMA1 (PubMed:12080061)

Tissue Location
Ubiquitous; highest levels in testis.

Tankyrase Polyclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Tankyrase Polyclonal Antibody - Images