10320 Camino Santa Fe, Suite G
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RNF2 Antibody - middle region
Rabbit Polyclonal Antibody
Catalog # AI16052

Specification

RNF2 Antibody - middle region - Product Information

Application	**WB**
Primary Accession	Q99496
Other Accession	XP_005245469
Reactivity	**Human, Mouse, Rat, Rabbit, Pig, Horse, Bovine, Dog**
Predicted	**Human, Mouse, Rat, Rabbit, Pig, Horse, Bovine, Dog**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**36kDa KDa**

RNF2 Antibody - middle region - Additional Information

Gene ID 6045

Alias Symbol	**RNF2, BAP1, DING, HIPI3, RING1B,**

Other Names
E3 ubiquitin-protein ligase RING2, 6.3.2.-, Huntingtin-interacting protein 2-interacting protein 3, HIP2-interacting protein 3, Protein DinG, RING finger protein 1B, RING1b, RING finger protein 2, RING finger protein BAP-1, RNF2, BAP1, DING, HIPI3, RING1B

Format
Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.

Reconstitution & Storage
Add 50 &mu, l of distilled water. Final Anti-RNF2 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at -20°C. Avoid repeat freeze-thaw cycles.

Precautions
RNF2 Antibody - middle region is for research use only and not for use in diagnostic or therapeutic procedures.

RNF2 Antibody - middle region - Protein Information

Name RNF2

Synonyms BAP1, DING, HIPI3, RING1B

Function
E3 ubiquitin-protein ligase that mediates monoubiquitination of 'Lys-119' of histone H2A (H2AK119Ub), thereby playing a central role in histone code and gene regulation (PubMed:15386022, PubMed:<a

href="http://www.uniprot.org/citations/16359901" target="_blank">16359901, PubMed:25519132, PubMed:33864376, PubMed:21772249, PubMed:25355358, PubMed:26151332). H2AK119Ub gives a specific tag for epigenetic transcriptional repression and participates in X chromosome inactivation of female mammals. May be involved in the initiation of both imprinted and random X inactivation (By similarity). Essential component of a Polycomb group (PcG) multiprotein PRC1-like complex, a complex class required to maintain the transcriptionally repressive state of many genes, including Hox genes, throughout development (PubMed:16359901, PubMed:26151332). PcG PRC1 complex acts via chromatin remodeling and modification of histones, rendering chromatin heritably changed in its expressibility (PubMed:26151332). E3 ubiquitin-protein ligase activity is enhanced by BMI1/PCGF4 (PubMed:21772249). Acts as the main E3 ubiquitin ligase on histone H2A of the PRC1 complex, while RING1 may rather act as a modulator of RNF2/RING2 activity (Probable). Association with the chromosomal DNA is cell-cycle dependent. In resting B- and T-lymphocytes, interaction with AURKB leads to block its activity, thereby maintaining transcription in resting lymphocytes (By similarity). Also acts as a negative regulator of autophagy by mediating ubiquitination of AMBRA1, leading to its subsequent degradation (By similarity).

Cellular Location
Nucleus. Cytoplasm {ECO:0000250|UniProtKB:Q9CQJ4}. Chromosome {ECO:0000250|UniProtKB:Q9CQJ4}. Note=Enriched on inactive X chromosome (Xi) in female trophoblast stem (TS) cells as well as differentiating embryonic stem (ES) cells. The enrichment on Xi is transient during TS and ES cell differentiation. The association with Xi is mitotically stable in non-differentiated TS cells. {ECO:0000250|UniProtKB:Q9CQJ4}

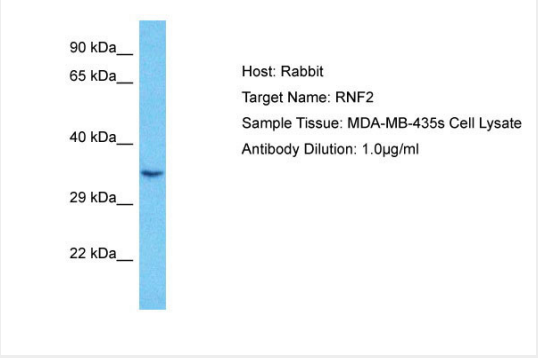
RNF2 Antibody - middle region - Protocols

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

RNF2 Antibody - middle region - Images

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Host: Rabbit
Target Name: RNF2
Sample Tissue: MDA-MB-435s Whole cell lysate
s
Antibody Dilution: 1.0µg/ml

RNF2 Antibody - middle region - Background

E3 ubiquitin-protein ligase that mediates monoubiquitination of 'Lys-119' of histone H2A (H2AK119Ub), thereby playing a central role in histone code and gene regulation. H2AK119Ub gives a specific tag for epigenetic transcriptional repression and participates in X chromosome inactivation of female mammals. May be involved in the initiation of both imprinted and random X inactivation. Essential component of a Polycomb group (PcG) multiprotein PRC1-like complex, a complex class required to maintain the transcriptionally repressive state of many genes, including Hox genes, throughout development. PcG PRC1 complex acts via chromatin remodeling and modification of histones, rendering chromatin heritably changed in its expressibility. E3 ubiquitin-protein ligase activity is enhanced by BMI1/PCGF4. Acts as the main E3 ubiquitin ligase on histone H2A of the PRC1 complex, while RING1 may rather act as a modulator of RNF2/RING2 activity. In resting B- and T-lymphocytes, interaction with AURKB leads to block its activity, thereby maintaining transcription in resting lymphocytes.

RNF2 Antibody - middle region - References

Dyer M.J.S.,et al.Submitted (JAN-1997) to the EMBL/GenBank/DDBJ databases.
Li S.-F.,et al.Submitted (APR-1999) to the EMBL/GenBank/DDBJ databases.
Ota T.,et al.Nat. Genet. 36:40-45(2004).
Gregory S.G.,et al.Nature 441:315-321(2006).
Mural R.J.,et al.Submitted (JUL-2005) to the EMBL/GenBank/DDBJ databases.