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Anti-Dicer Antibody
Catalog # ABO12729

Specification

Anti-Dicer Antibody - Product Information

Application	**WB, IHC-P**
Primary Accession	Q9UPY3
Host	**Rabbit**
Reactivity	**Human**
Clonality	**Polyclonal**
Format	**Lyophilized**

Description
Rabbit IgG polyclonal antibody for Endoribonuclease Dicer(DICER1) detection. Tested with WB, IHC-P in Human.

Reconstitution
Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-Dicer Antibody - Additional Information

Gene ID 23405

Other Names
Endoribonuclease Dicer, 3.1.26.3, Helicase with RNase motif, Helicase MOI, DICER1, DICER, HERNA, KIAA0928

Calculated MW
218682 MW KDa

Application Details
Immunohistochemistry(Paraffin-embedded Section), 0.5-1 µg/ml, Human, By Heat
Western blot, 0.1-0.5 µg/ml, Human

Subcellular Localization
Cytoplasm .

Protein Name
Endoribonuclease Dicer

Contents
Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg NaN3.

Immunogen
E.coli-derived human Dicer recombinant protein (Position: M1-N195). Human Dicer shares 94% amino acid (aa) sequence identity with mouse Dicer.

Purification
Immunogen affinity purified.

Cross Reactivity
No cross reactivity with other proteins

Storage

At -20˚C for one year. After r˚Constitution, at 4˚C for one month. It˚Can also be aliquotted and stored frozen at -20˚C for a longer time.Avoid repeated freezing and thawing.

Sequence Similarities
Belongs to the helicase family. Dicer subfamily.

Anti-Dicer Antibody - Protein Information

Name DICER1

Synonyms DICER, HERNA, KIAA0928

Function
Double-stranded RNA (dsRNA) endoribonuclease playing a central role in short dsRNA-mediated post-transcriptional gene silencing. Cleaves naturally occurring long dsRNAs and short hairpin pre-microRNAs (miRNA) into fragments of twenty-one to twenty-three nucleotides with 3' overhang of two nucleotides, producing respectively short interfering RNAs (siRNA) and mature microRNAs. SiRNAs and miRNAs serve as guide to direct the RNA-induced silencing complex (RISC) to complementary RNAs to degrade them or prevent their translation. Gene silencing mediated by siRNAs, also called RNA interference, controls the elimination of transcripts from mobile and repetitive DNA elements of the genome but also the degradation of exogenous RNA of viral origin for instance. The miRNA pathway on the other side is a mean to specifically regulate the expression of target genes.

Cellular Location
Cytoplasm. Cytoplasm, perinuclear region

Anti-Dicer 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

Anti-Dicer Antibody - Images

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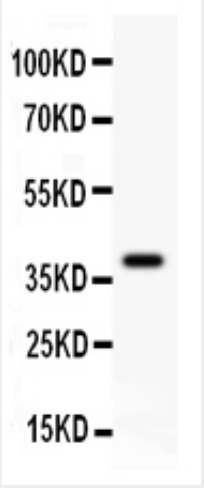
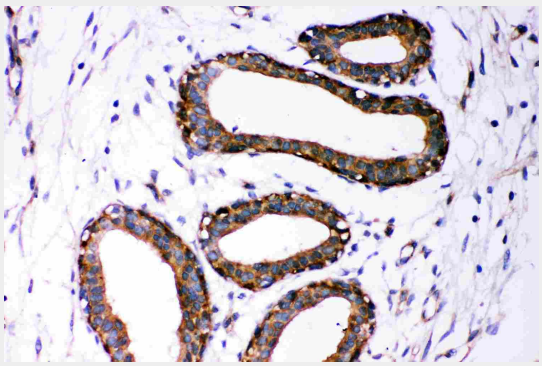


Anti- Dicer antibody, ABO12729, Western blottingAll lanes: Anti Dicer (ABO12729) at 0.5ug/mlWB: Recombinant Human Dicer Protein 0.5ngPredicted bind size: 39KDObserved bind size: 39KD

Anti- Dicer antibody, ABO12729, Western blottingAll lanes: Anti Dicer (ABO12729) at 0.5ug/mlLane 1: Hela Whole Cell Lysate at 40ugLane 2: MCF-7 Whole Cell Lysate at 40ugPredicted bind size: 217KDObserved bind size: 217KD



Anti- Dicer antibody, ABO12729, IHC(P)IHC(P): Human Mammary Cancer Tissue

Anti-Dicer Antibody - Background

Dicer(DICER1), also known as endoribonuclease Dicer or helicase with RNase motif, is an enzyme that in humans is encoded by the DICER1 gene. It is mapped to 14q32.13. The DICER1 gene, a member of the ribonuclease III (RNaseIII) family, is involved in the generation of microRNAs (miRNAs), which modulate gene expression at the posttranscriptional level. DICER1 possesses an

RNA helicase motif containing a DEXH box in its amino terminus and an RNA motif in the carboxy terminus DICER, also known as helicase-MOI, is required by the RNA interference and small temporal RNA (stRNA) pathways to produce the active small RNA component that represses gene expression. In addition, DICER1 is required for formation of the RNA induced silencing complex (RISC). It also cleaves double-stranded RNA to produce short interfering RNAs (siRNAs) which target the selective destruction of complementary RNAs.