abcam

Product datasheet

Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free ab236047

Recombinant RabMAb

11 Images

Overview

Product name	Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free
Description	Rabbit monoclonal [EPR3411] to RBBP4 - ChIP Grade – BSA and Azide free
Host species	Rabbit
Tested applications	**Suitable for:** Flow Cyt (Intra), IHC-P, IP, WB, ChIP-sequencing, ICC/IF
Species reactivity	**Reacts with:** Mouse, Rat, Human
Immunogen	Synthetic peptide. This information is proprietary to Abcam and/or its suppliers.
Positive control	WB: HeLa cells; IHC-P: Human breast cancer, Rat pancreas and Mouse cerebrum; Flow Cyt (intra): MCF7 cells; IP: HeLa cells; ICC/IF: MCF-7 and HeLa cells. ChIP-Seq: Chromatin from HeLa cells.
General notes	ab236047 is the carrier-free version of **ab79416**. Our **carrier-free** antibodies are typically supplied in a PBS-only formulation, purified and free of BSA, sodium azide and glycerol. The carrier-free buffer and high concentration allow for increased conjugation efficiency. This conjugation-ready format is designed for use with fluorochromes, metal isotopes, oligonucleotides, and enzymes, which makes them ideal for antibody labelling, functional and cell-based assays, flow-based assays (e.g. mass cytometry) and Multiplex Imaging applications. Use our **conjugation kits** for antibody conjugates that are ready-to-use in as little as 20 minutes with <1 minute hands-on-time and 100% antibody recovery: available for fluorescent dyes, HRP, biotin and gold. This product is compatible with the Maxpar® Antibody Labeling Kit from Fluidigm, without the need for antibody preparation. Maxpar® is a trademark of Fluidigm Canada Inc. This product is a recombinant monoclonal antibody, which offers several advantages including: - High batch-to-batch consistency and reproducibility - Improved sensitivity and specificity - Long-term security of supply - Animal-free production For more information **see here**. Our RabMAb® technology is a patented hybridoma-based technology for making rabbit monoclonal antibodies. For details on our patents, please refer to **RabMAb® patents**.

Properties

Form	Liquid
Storage instructions	Shipped at 4°C. Store at +4°C. Do Not Freeze.
Storage buffer	pH: 7.2 Constituent: PBS
Carrier free	Yes
Purity	Protein A purified
Clonality	Monoclonal
Clone number	EPR3411
Isotype	IgG

Applications

The Abpromise guarantee Our **Abpromise guarantee** covers the use of ab236047 in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

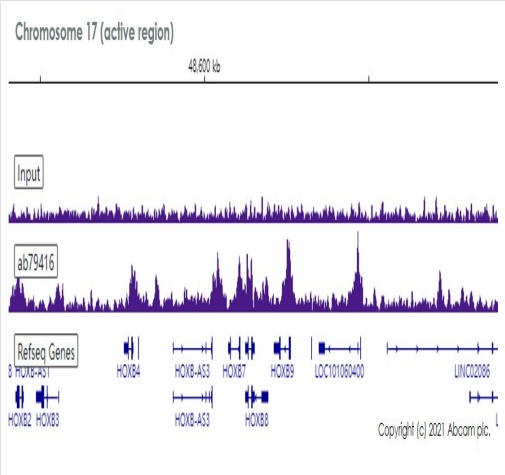
Application	Abreviews	Notes
Flow Cyt (Intra)		Use at an assay dependent concentration. **ab172730** - Rabbit monoclonal IgG, is suitable for use as an isotype control with this antibody.
IHC-P		Use at an assay dependent concentration. Perform heat mediated antigen retrieval before commencing with IHC staining protocol.
IP		Use at an assay dependent concentration.
WB		Use at an assay dependent concentration. Detects a band of approximately 48 kDa (predicted molecular weight: 48 kDa).
ChIP-sequencing		Use at an assay dependent concentration.
ICC/IF		Use at an assay dependent concentration.

Target

Function Core histone-binding subunit that may target chromatin assembly factors, chromatin remodeling factors and histone deacetylases to their histone substrates in a manner that is regulated by nucleosomal DNA. Component of several complexes which regulate chromatin metabolism. These include the chromatin assembly factor 1 (CAF-1) complex, which is required for chromatin assembly following DNA replication and DNA repair; the core histone deacetylase (HDAC) complex, which promotes histone deacetylation and consequent transcriptional repression; the nucleosome remodeling and histone deacetylase complex (the NuRD complex), which promotes

	transcriptional repression by histone deacetylation and nucleosome remodeling; the PRC2/EED-EZH2 complex, which promotes repression of homeotic genes during development; and the NURF (nucleosome remodeling factor) complex.
Sequence similarities	Belongs to the WD repeat RBAP46/RBAP48/MSI1 family. Contains 6 WD repeats.
Cellular localization	Nucleus.

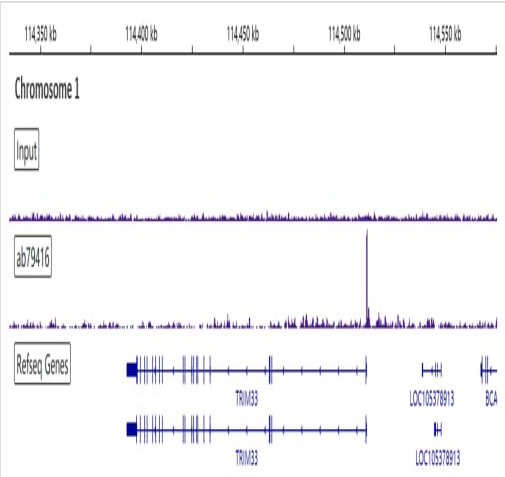
Images



ChIP-sequencing - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

Chromatin was prepared from HeLa cells. Cells were fixed with 1% formaldehyde for 10 minutes. ChIP was performed with 10^7 HeLa cells and 8 µg of **ab79416** [EPR3411]. ChIP DNA was sequenced on the Illumina NovaSeq 6000 to a depth of 30 million reads.

Additional screenshots of mapped reads can be downloaded **here**.



ChIP-sequencing - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

Chromatin was prepared from HeLa cells. Cells were fixed with 1% formaldehyde for 10 minutes. ChIP was performed with 30 µg of chromatin and 4 µg of **ab79416**. ChIP DNA was sequenced on the Illumina NextSeq 500 to a depth of 30 million reads. ChIP-Seq validation performed by Active Motif, Carlsbad, CA.

Additional screenshots of mapped reads can be downloaded **here**.

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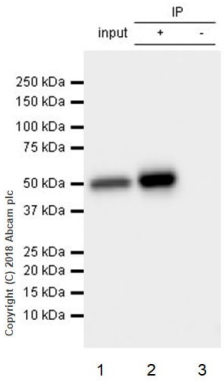
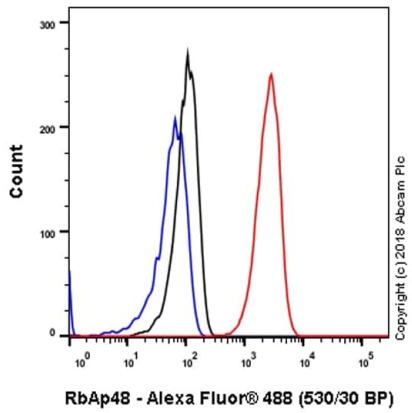


Immunoprecipitation - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

ab79416 (purified) at 1:20 dilution (2µg) immunoprecipitating RBBP4 in HeLa whole cell lysate.
Lane 1 (input): HeLa (Human cervix adenocarcinoma epithelial cell) whole cell lysate 10µg
Lane 2 (+): **ab79416** & HeLa whole cell lysate
Lane 3 (-): Rabbit monoclonal IgG (**ab172730**) instead of **ab79416** in HeLa whole cell lysate
For western blotting, VeriBlot for IP Detection Reagent (HRP) (**ab131366**) was used for detection at 1:1000 dilution.
Blocking and diluting buffer: 5% NFDM/TBST.

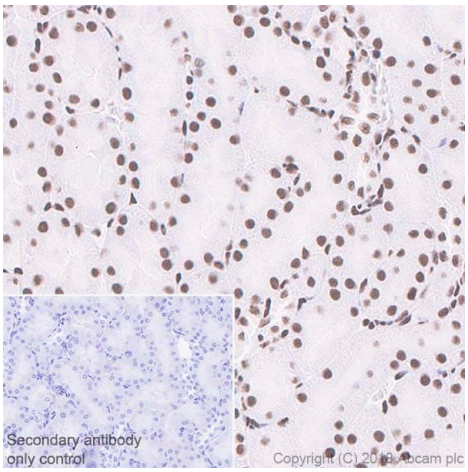
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).



Flow Cytometry (Intracellular) - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

Intracellular Flow Cytometry analysis of MCF7 (Human breast adenocarcinoma epithelial cell) cells labeling RBBP4 with purified **ab79416** at 1/20 dilution (10µg/ml) (red). Cells were fixed with 4% Paraformaldehyde. A Goat anti rabbit IgG (Alexa Fluor® 488) secondary antibody was used at 1/2000 dilution. Isotype control - Rabbit monoclonal IgG (Black). Unlabeled control - Cell without incubation with primary antibody and secondary antibody (Blue).

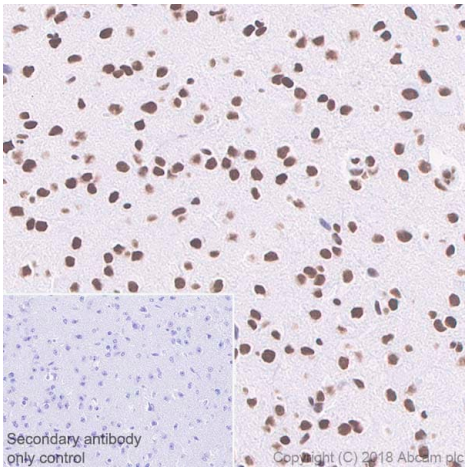
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Rat pancreas tissue sections labeling RBBP4 with Purified **ab79416** at 1:8000 dilution (0.014 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0) ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody.Hematoxylinwas used as a counterstain.

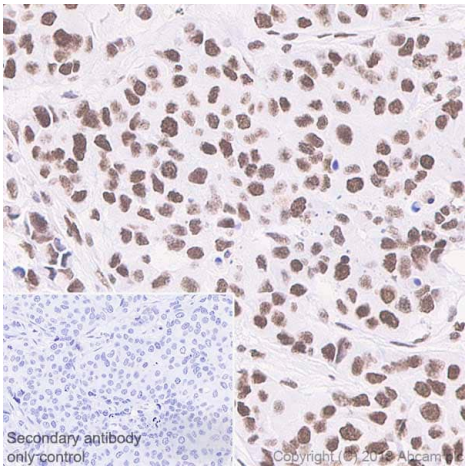
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Mouse cerebrum tissue sections labeling RBBP4 with Purified **ab79416** at 1:8000 dilution (0.014 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0) ImmunoHistoProbe one step HRP Polymer (ready to use)was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylinwas used as a counterstain.

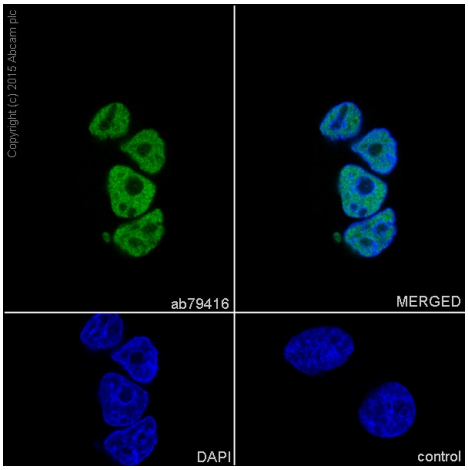
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Human breast cancer tissue sections labeling RBBP4 with Purified **ab79416** at 1:8000 dilution (0.014 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0) ImmunoHistoProbe one step HRP Polymer (ready to use)was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylinwas used as a counterstain.

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).

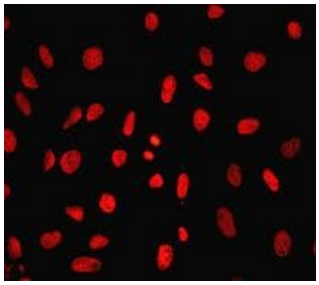


Immunocytochemistry/ Immunofluorescence - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

ab79416 staining RBBP4 in MCF-7 (human breast carcinoma) cells by ICC (Immunocytochemistry). Cells were fixed with 4% Paraformaldehyde and permeabilized with 0.1% tritonX-100. Samples were incubated with primary antibody at a dilution of 1/500. A goat anti rabbit IgG (Alexa Fluor® 488) (**ab150077**) was used as the secondary antibody at a dilution of 1/1000. DAPI was used as a nuclear counterstain.

Negative control 1: PBS only.

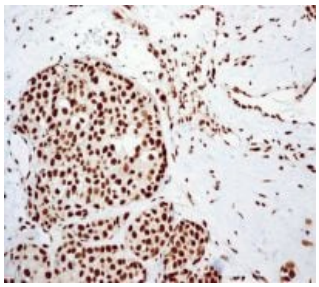
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).



Immunocytochemistry/ Immunofluorescence - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

Immunocytochemical staining of RBBP4 in HeLa cells using unpurified **ab79416** at 1/100 dilution.

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

ab79416, at 1/100 dilution, staining RBBP4 in human breast carcinoma tissue by Immunohistochemistry.

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab79416**).

Heat mediated antigen retrieval was performed before commencing with IHC staining protocol.

Anti-RBBP4 antibody [EPR3411] - ChIP Grade - BSA and Azide free (ab236047)

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