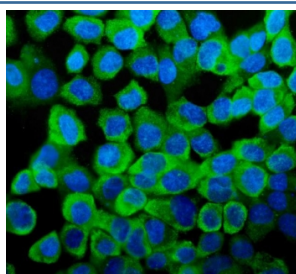


YB1 Antibody / Y box binding protein 1 (R32164)

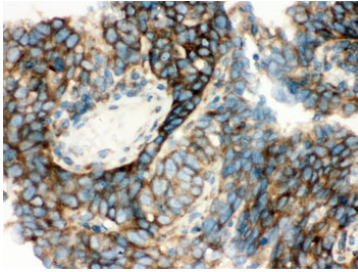
Catalog No.	Formulation	Size
R32164	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

Bulk quote request

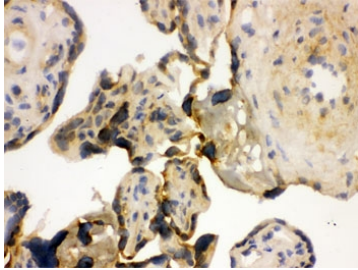
Availability	1-3 business days
Species Reactivity	Human, Mouse, Rat
Format	Antigen affinity purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit IgG
Purity	Antigen affinity
Buffer	Lyophilized from 1X PBS with 2% Trehalose
UniProt	P67809
Localization	Nuclear and cytoplasmic
Applications	Western Blot : 0.5-1ug/ml Immunohistochemistry (FFPE) : 1-2ug/ml Immunofluorescence (FFPE) : 5ug/ml Flow Cytometry : 1-3ug/million cells
Limitations	This YB1 antibody is available for research use only.



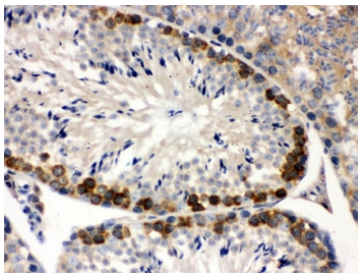
Immunofluorescent staining of FFPE human A431 cells with YB1 antibody (green) and DAPI nuclear stain (blue). HIER: steam section in pH6 citrate buffer for 20 min.



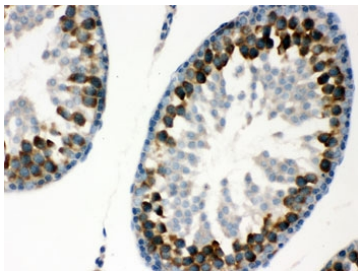
IHC testing of FFPE human lung cancer tissue with YB1 antibody. HIER: Boil the paraffin sections in pH 6, 10mM citrate buffer for 20 minutes and allow to cool prior to staining.



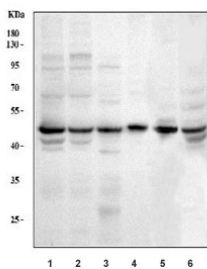
IHC testing of frozen human placenta with YB1 antibody.



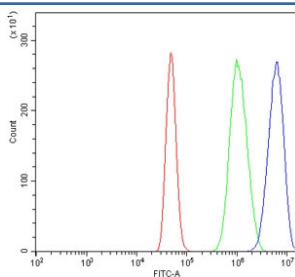
IHC testing of FFPE mouse testis with YB1 antibody. HIER: Boil the paraffin sections in pH 6, 10mM citrate buffer for 20 minutes and allow to cool prior to staining.



IHC testing of FFPE rat testis with YB1 antibody. HIER: Boil the paraffin sections in pH 6, 10mM citrate buffer for 20 minutes and allow to cool prior to staining.



Western blot testing of 1) human HeLa, 2) human MCF7, 3) human Jurkat, 4) human T-47D, 5) rat spleen and 6) mouse RAW264.7 cell lysate with YB1 antibody. Expected molecular weight: 39~50 kDa depending on glycosylation level.



Flow cytometry testing of human A431 cells with YB1 antibody at 1ug/million cells (blocked with goat sera); Red=cells alone, Green=isotype control, Blue= YB1 antibody.

Description

YBX1 (Y box binding protein 1), commonly referred to as YB-1 by researchers, is a human protein. YB1 binding has an absolute requirement for the CCAAT box and relative specificity for the Y box. It has a molecular mass of 35,414 and contains 18% basic residues and putative nuclear localization signals. The YBX1 gene is mapped on 1p34.2. Ybx1 was highly expressed in mouse erythroid myeloid lymphoid clone-1 (EML), a hematopoietic precursor cell line, but that it was downregulated in myeloid progenitors and in Gmcsf-treated EML cells during myeloid differentiation. Ybx1 was expressed at high levels in myeloid leukemic cells at different developmental stages. Knockdown of YBX1 in a human leukemic cell line inhibited proliferation ability, induced apoptosis, and induced megakaryocytic differentiation in response to arsenic trioxide treatment. YBX1 is downregulated during myeloid differentiation and aberrant YBX1 expression in leukemic cells may contribute to leukemia development by blocking differentiation.

Application Notes

Optimal dilution of the YB1 antibody should be determined by the researcher.

Immunogen

Amino acids ENPKPQDGKETKAADPPAENSSAPEAEQ of human YB1 were used as the immunogen for the YB1 antibody.

Storage

After reconstitution, the YB1 antibody can be stored for up to one month at 4°C. For long-term, aliquot and store at -20°C. Avoid repeated freezing and thawing.