

Anti-SATB2 Rabbit Monoclonal Antibody

Catalog # ABO13587

Product Information

Application	WB, IHC, IF, ICC
Primary Accession	Q9UPW6
Host	Rabbit
Isotype	Rabbit IgG
Reactivity	Rat, Human, Mouse
Clonality	Monoclonal
Format	Liquid
Description	Anti-SATB2 Rabbit Monoclonal Antibody . Tested in WB, IHC, ICC/IF applications. This antibody reacts with Human, Mouse, Rat.

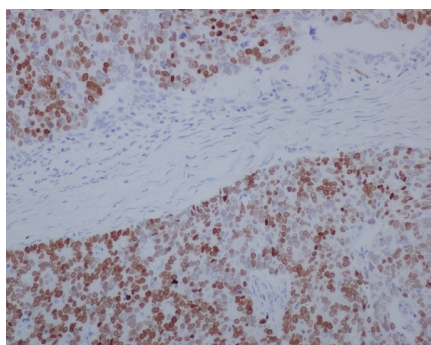
Additional Information

Gene ID	23314
Other Names	DNA-binding protein SATB2, Special AT-rich sequence-binding protein 2, SATB2, KIAA1034
Calculated MW	82555
Application Details	WB 1:500-1:2000 IHC 1:50-1:200 ICC/IF 1:50-1:200
Subcellular Localization	Nucleus matrix.
Tissue Specificity	High expression in adult brain, moderate expression in fetal brain, and weak expression in adult liver, kidney, and spinal cord and in select brain regions, including amygdala, corpus callosum, caudate nucleus, and hippocampus..
Source	Eukaryota
Contents	Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol, 0.4-0.5mg/ml BSA.
Clone Names	Clone: ADI-19
Immunogen	A synthesized peptide derived from human SATB2
Purification	Affinity-chromatography
Storage	Store at -20°C for one year. For short term storage and frequent use, store at 4°C for up to one month. Avoid repeated freeze-thaw cycles.

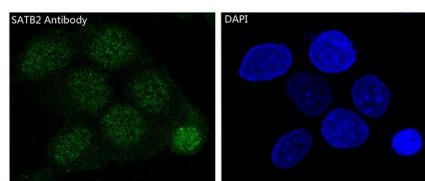
Protein Information

Name	SATB2
Synonyms	KIAA1034
Function	Binds to DNA, at nuclear matrix- or scaffold-associated regions. Thought to recognize the sugar-phosphate structure of double- stranded DNA. Transcription factor controlling nuclear gene expression, by binding to matrix attachment regions (MARs) of DNA and inducing a local chromatin-loop remodeling. Acts as a docking site for several chromatin remodeling enzymes and also by recruiting corepressors (HDACs) or coactivators (HATs) directly to promoters and enhancers. Required for the initiation of the upper-layer neurons (UL1) specific genetic program and for the inactivation of deep-layer neurons (DL) and UL2 specific genes, probably by modulating BCL11B expression. Repressor of Ctif2 and regulatory determinant of corticocortical connections in the developing cerebral cortex. May play an important role in palate formation. Acts as a molecular node in a transcriptional network regulating skeletal development and osteoblast differentiation.
Cellular Location	Nucleus matrix {ECO:0000255 PROSITE- ProRule:PRU00108, ECO:0000255 PROSITE-ProRule:PRU00374, ECO:0000269 PubMed:14701874}
Tissue Location	High expression in adult brain, moderate expression in fetal brain, and weak expression in adult liver, kidney, and spinal cord and in select brain regions, including amygdala, corpus callosum, caudate nucleus, and hippocampus.

Images



Immunohistochemical analysis of paraffin-embedded human stomach cancer, using SATB2 Antibody.



Immunofluorescent analysis of SH-SY5Y cells, using SATB2 Antibody.

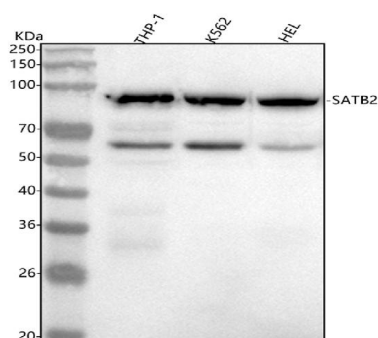


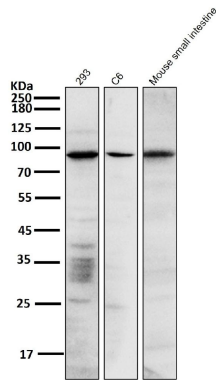
Figure 1. Western blot analysis of SATB2 using anti-SATB2 antibody (M02588).

Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel) / 90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 30 ug of sample under reducing conditions.

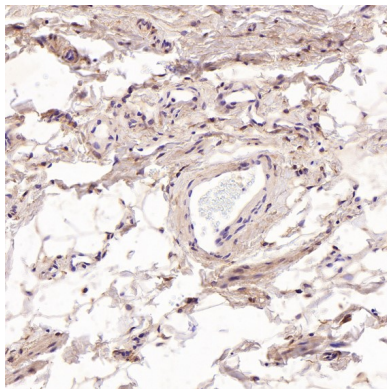
Lane 1: human THP-1 whole cell lysates,
Lane 2: human K562 whole cell lysates,
Lane 3: human HEL whole cell lysates.

After electrophoresis, proteins were transferred to a nitrocellulose membrane at 150 mA for 50-90 minutes. Blocked the membrane with 5% non-fat milk/TBS for 1.5

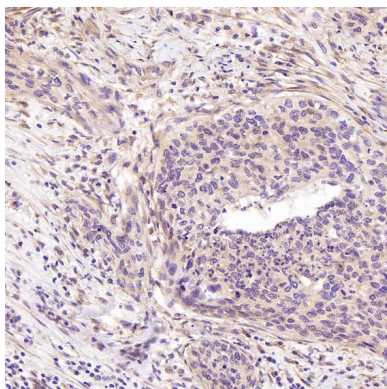
hour at RT. The membrane was incubated with rabbit anti-SATB2 antigen affinity purified monoclonal antibody (Catalog # M02588) at 1:500 overnight at 4°C, then washed with TBS-0.1%Tween 3 times with 5 minutes each and probed with a goat anti-rabbit IgG-HRP secondary antibody at a dilution of 1:1000 for 1.5 hour at RT. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit (Catalog # EK1002) with Tanon 5200 system. A specific band was detected for SATB2 at approximately 83 kDa. The expected band size for SATB2 is at 83 kDa.



All lanes use the Antibody at 1:2K dilution for 1 hour at room temperature.

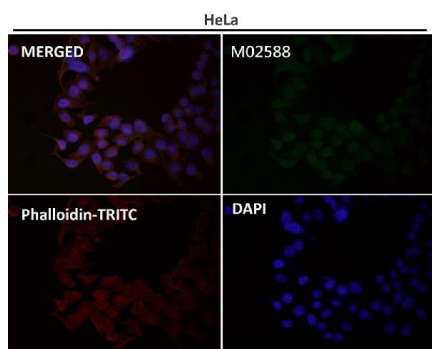


Immunohistochemical analysis of paraffin-embedded Human testis cancer, using the Antibody at 1:100 dilution.



Immunohistochemical analysis of paraffin-embedded Human cervical cancer, using the Antibody at 1:100 dilution.

Immunofluorescent analysis using the Antibody at 1:50 dilution.



Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.