

## beta II Tubulin Antibody

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP22337a

## Specification

# beta II Tubulin Antibody - Product Information

Application Primary Accession Other Accession Reactivity Predicted Host Clonality Isotype Calculated MW WB, IF, FC,E <u>O7TMM9</u> <u>O13885</u>, <u>O4R5B3</u>, <u>P85108</u> Human, Mouse, Rat Monkey Rabbit polyclonal Rabbit IgG 49907

# beta II Tubulin Antibody - Additional Information

Gene ID 22151

**Other Names** Tubulin beta-2A chain, Tubb2a, Tubb2

### Target/Specificity

This beta II Tubulin antibody is generated from a rabbit immunized with a KLH conjugated synthetic peptide between 194-225 amino acids from the mouse region of mouse beta II Tubulin.

Dilution WB~~1:2000 IF~~1:25 FC~~1:25 E~~Use at an assay dependent concentration.

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

#### Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

#### Precautions

beta II Tubulin Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

# beta II Tubulin Antibody - Protein Information

Name Tubb2a



## Synonyms Tubb2

**Function** Tubulin is the major constituent of microtubules, a cylinder consisting of laterally associated linear protofilaments composed of alpha- and beta-tubulin heterodimers. Microtubules grow by the addition of GTP-tubulin dimers to the microtubule end, where a stabilizing cap forms. Below the cap, tubulin dimers are in GDP-bound state, owing to GTPase activity of alpha-tubulin.

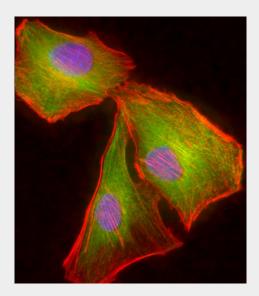
**Cellular Location** Cytoplasm, cytoskeleton.

## beta II Tubulin Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

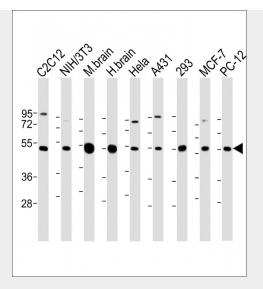
- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

## beta II Tubulin Antibody - Images

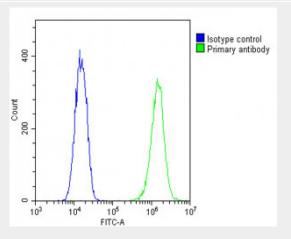


Immunofluorescent analysis of 4% paraformaldehyde-fixed, 0.1% Triton X-100 permeabilized C2C12 (mouse myoblast cell line) cells labeling beta II Tubulin with AP22337a at 1/25 dilution, followed by Dylight® 488-conjugated goat anti-rabbit IgG (1583138) secondary antibody at 1/200 dilution (green). Immunofluorescence image showing cytoskeleton staining on C2C12 cell line. Cytoplasmic actin is detected with Dylight® 554 Phalloidin (OI17558410) at 1/100 dilution (red). The nuclear counter stain is DAPI (blue).





All lanes : Anti-beta II Tubulin Antibody at 1:2000 dilution Lane 1: C2C12 whole cell lysate Lane 2: NIH/3T3 whole cell lysate Lane 3: Mouse brain lysate Lane 4: Human brain lysate Lane 5: Hela whole cell lysate Lane 6: A431 whole cell lysate Lane 7: 293 whole cell lysate Lane 8: MCF-7 whole cell lysate Lane 9: PC-12 whole cell lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 50 kDa Blocking/Dilution buffer: 5% NFDM/TBST.



Overlay histogram showing C2C12 cells stained with AP22337a(green line). The cells were fixed with 2% paraformaldehyde and then permeabilized with 90% methanol for 10 min. The cells were then incubated in 2% bovine serum albumin to block non-specific protein-protein interactions followed by the antibody (1:25 dilution) for 60 min at 37°C. The secondary antibody used was Goat-Anti-Rabbit IgG, DyLight® 488 Conjugated Highly Cross-Adsorbed at 1/200 dilution for 40 min at Room temperature. Isotype control antibody (blue line) was rabbit IgG1 (1 $\mu$ g/1x10^6 cells) used under the same conditions. Acquisition of >10, 000 events was performed.

## beta II Tubulin Antibody - Background

Tubulin is the major constituent of microtubules. It binds two moles of GTP, one at an exchangeable site on the beta chain and one at a non-exchangeable site on the alpha chain (By similarity).

### beta II Tubulin Antibody - References

Carninci P., et al. Science 309:1559-1563(2005). Lubec G., et al. Submitted (JAN-2009) to UniProtKB.



Janke C., et al. Science 308:1758-1762(2005). Rogowski K., et al. Cell 137:1076-1087(2009). Yoshida K., et al. Biochem. Biophys. Res. Commun. 389:506-511(2009).