

NFAT1 Antibody

Rabbit mAb Catalog # AP91209

## Specification

# NFAT1 Antibody - Product Information

ApplicationWBPrimary Accession013469ClonalityMonoclonalOther NamesClopasmic 2; NF ATp; NF-ATc2; NF-ATp; NFAT 1; NFAT1-D; NFATc2; NFATp;

Isotype	Rabbit IgG
Host	Rabbit
Calculated MW	100146 Da

# NFAT1 Antibody - Additional Information

Dilution Purification Immunogen	WB~~1:1000 Affinity-chromatography A synthesized peptide derived from human NFAT1
Description	Plays a role in the inducible expression of cytokine genes in T-cells, especially in the induction of the IL-2, IL-3, IL-4, TNF-alpha or GM-CSF.
Storage Condition and Buffer	Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term. Avoid freeze / thaw cycle.

### NFAT1 Antibody - Protein Information

Name NFATC2

Synonyms NFAT1, NFATP

### Function

Plays a role in the inducible expression of cytokine genes in T-cells, especially in the induction of the IL-2, IL-3, IL-4, TNF-alpha or GM-CSF (PubMed:<a

href="http://www.uniprot.org/citations/15790681" target="\_blank">15790681</a>). Promotes invasive migration through the activation of GPC6 expression and WNT5A signaling pathway (PubMed:<a href="http://www.uniprot.org/citations/21871017" target="\_blank">21871017</a>). Is involved in the negative regulation of chondrogenesis (PubMed:<a

href="http://www.uniprot.org/citations/35789258" target="\_blank">35789258</a>). Recruited by AKAP5 to ORAI1 pore- forming subunit of CRAC channels in Ca(2+) signaling microdomains where store-operated Ca(2+) influx is coupled to calmodulin and calcineurin signaling and activation of NFAT-dependent transcriptional responses.



### **Cellular Location**

Cytoplasm. Nucleus. Note=Cytoplasmic for the phosphorylated form and nuclear after activation that is controlled by calcineurin-mediated dephosphorylation. Rapid nuclear exit of NFATC is thought to be one mechanism by which cells distinguish between sustained and transient calcium signals. The subcellular localization of NFATC plays a key role in the regulation of gene transcription

#### **Tissue Location**

Expressed in thymus, spleen, heart, testis, brain, placenta, muscle and pancreas. Isoform 1 is highly expressed in the small intestine, heart, testis, prostate, thymus, placenta and thyroid Isoform 3 is highly expressed in stomach, uterus, placenta, trachea and thyroid.

#### **NFAT1 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>

### **NFAT1 Antibody - Images**



Western blot analysis of NFAT1 expression in Ramos cell lysate.