

# RAI3 Antibody (C-term)

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP6239a

## **Specification**

# RAI3 Antibody (C-term) - Product Information

**Application** WB,E **Primary Accession 08NFI5** NP 003970 Other Accession Reactivity Human Host **Rabbit** Clonality **Polyclonal** Isotype Rabbit IgG Calculated MW 40251 Antigen Region 328-357

# RAI3 Antibody (C-term) - Additional Information

#### **Gene ID 9052**

#### **Other Names**

Retinoic acid-induced protein 3, G-protein coupled receptor family C group 5 member A, Orphan G-protein-coupling receptor PEIG-1, Retinoic acid-induced gene 1 protein, RAIG-1, GPRC5A, GPCR5A, RAI3, RAIG1

## Target/Specificity

This RAI3 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 328-357 amino acids from the C-terminal region of human RAI3.

#### **Dilution**

WB~~1:1000

E~~Use at an assay dependent concentration.

## **Format**

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation followed by dialysis against PBS.

# **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**

RAI3 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

## RAI3 Antibody (C-term) - Protein Information

# Name GPRC5A



# Synonyms GPCR5A, RAI3, RAIG1

**Function** Orphan receptor. Could be involved in modulating differentiation and maintaining homeostasis of epithelial cells. This retinoic acid-inducible GPCR provide evidence for a possible interaction between retinoid and G-protein signaling pathways. Functions as a negative modulator of EGFR signaling (By similarity). May act as a lung tumor suppressor (PubMed: 18000218).

#### **Cellular Location**

Cell membrane; Multi-pass membrane protein. Cytoplasmic vesicle membrane; Multi-pass membrane protein. Note=Localized in perinuclear vesicles, probably Golgi- associated vesicles.

#### **Tissue Location**

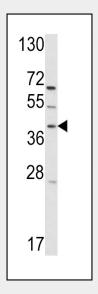
Expressed at high level in fetal and adult lung tissues but repressed in most human lung cancers (PubMed:18000218, PubMed:9857033). Constitutively expressed in fetal kidney and adult placenta, kidney, prostate, testis, ovary, small intestine, colon, stomach, and spinal cord at low to moderate levels. Not detectable in fetal heart, brain, and liver and adult heart, brain, liver, skeletal muscle, pancreas, spleen, thymus, and peripheral leukocytes. According to PubMed:10783259, expressed at low but detectable level in pancreas and heart.

# RAI3 Antibody (C-term) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

## RAI3 Antibody (C-term) - Images



Western blot analysis of hRai3-W343 (Cat. #AP6239a) in T47D cell line lysates (35ug/lane). RAI3 (arrow) was detected using the purified Pab.

#### RAI3 Antibody (C-term) - Background





Tel: 858.875.1900 Fax: 858.875.1999

Retinoic acid plays a critical role in development, cellular growth, and differentiation. The specific function for the protein from this retinoic acid-induced gene has not yet been determined; however, it may play a role in embryonic development and epithelial cell differentiation. Rai3 is a member of the type 3 G protein-coupling receptor family, characterized by the signature 7-transmembrane domain motif. It may also be involved in interaction between retinoid acid and G protein signalling pathways.

# RAI3 Antibody (C-term) - References

Robbins, M.J., et al., Genomics 67(1):8-18 (2000). Cheng, Y., et al., J. Biol. Chem. 273(52):35008-35015 (1998). Cafferata, E.G., et al., Cell. Mol. Biol. (Noisy-le-grand) 42(5):797-804 (1996).