

FGFR1 Antibody (internal region)

Peptide-affinity purified goat antibody Catalog # AF3667a

Specification

FGFR1 Antibody (internal region) - Product Information

Application Primary Accession Other Accession

Reactivity Predicted Host Clonality Concentration Isotype Calculated MW WB, IHC, E P11362 NP_075598.2, NP_056934.2, NP_075593.1, NP_075594.1, NP_001167534.1, NP_001167535.1, NP_001167538.1, 2260, 14182 (mouse), 79114 (rat) Human Dog Goat Polyclonal 0.5 mg/ml IgG 91868

FGFR1 Antibody (internal region) - Additional Information

Gene ID 2260

Other Names Fibroblast growth factor receptor 1, FGFR-1, 2.7.10.1, Basic fibroblast growth factor receptor 1, BFGFR, bFGF-R-1, Fms-like tyrosine kinase 2, FLT-2, N-sam, Proto-oncogene c-Fgr, CD331, FGFR1, BFGFR, CEK, FGFBR, FLG, FLT2, HBGFR

Dilution WB~~1:1000 IHC~~1:100~500 E~~N/A

Format 0.5 mg/ml in Tris saline, 0.02% sodium azide, pH7.3 with 0.5% bovine serum albumin

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

FGFR1 Antibody (internal region) is for research use only and not for use in diagnostic or therapeutic procedures.

FGFR1 Antibody (internal region) - Protein Information



Name FGFR1

Synonyms BFGFR, CEK, FGFBR, FLG, FLT2, HBGFR

Function

Tyrosine-protein kinase that acts as a cell-surface receptor for fibroblast growth factors and plays an essential role in the regulation of embryonic development, cell proliferation, differentiation and migration. Required for normal mesoderm patterning and correct axial organization during embryonic development, normal skeletogenesis and normal development of the gonadotropin-releasing hormone (GnRH) neuronal system. Phosphorylates PLCG1, FRS2, GAB1 and SHB. Ligand binding leads to the activation of several signaling cascades. Activation of PLCG1 leads to the production of the cellular signaling molecules diacylglycerol and inositol 1,4,5-trisphosphate. Phosphorylation of FRS2 triggers recruitment of GRB2, GAB1, PIK3R1 and SOS1, and mediates activation of RAS, MAPK1/ERK2, MAPK3/ERK1 and the MAP kinase signaling pathway, as well as of the AKT1 signaling pathway. Promotes phosphorylation of SHC1, STAT1 and PTPN11/SHP2. In the nucleus, enhances RPS6KA1 and CREB1 activity and contributes to the regulation of transcription. FGFR1 signaling is down-regulated by IL17RD/SEF, and by FGFR1 ubiquitination, internalization and degradation.

Cellular Location

Cell membrane; Single-pass type I membrane protein. Nucleus. Cytoplasm, cytosol. Cytoplasmic vesicle. Note=After ligand binding, both receptor and ligand are rapidly internalized. Can translocate to the nucleus after internalization, or by translocation from the endoplasmic reticulum or Golgi apparatus to the cytosol, and from there to the nucleus

Tissue Location

Detected in astrocytoma, neuroblastoma and adrenal cortex cell lines. Some isoforms are detected in foreskin fibroblast cell lines, however isoform 17, isoform 18 and isoform 19 are not detected in these cells.

FGFR1 Antibody (internal region) - Protocols

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

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

FGFR1 Antibody (internal region) - Images





AF1411a (4 μ g/ml) staining of paraffin embedded Human Small Intestine. Steamed antigen retrieval with citrate buffer pH 6, AP-staining.

| | 250kDa 150kDa 100kDa |
|---|----------------------------|
| ø | 75kDa |
| | 50kDa |
| | 37kDa |
| | 25kDa |
| | 20kDa |
| | 15kDa |
| | 10kDa |

AF1411a (0.3 μ g/ml) staining of human breast lysate (35 μ g protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

FGFR1 Antibody (internal region) - Background

This antibody is expected to recognize reported isoforms 1, 2, 10, 11 and 14. Reported variants represent identical protein: NP_075593.1, NP_001167537.1 Reported variants represent identical protein: NP_001167536.1, NP_056934.2. The immunizing peptide re

FGFR1 Antibody (internal region) - References

Frequent and focal FGFR1 amplification associates with therapeutically tractable FGFR1 dependency in squamous cell lung cancer. Weiss J, et al Sci Transl Med. 2010 Dec 15;2(62):62ra93. Erratum in: Sci Transl Med. 2011 Jan 19;3(66):66er2. PMID: 21160078