

Rabbit Anti-FGFR1 antibody

SL0230R

Product Name FGFR1

Chinese Name 碱性成纤维细胞生长因子受体 1 (CD331) 抗体

Alias Fibroblast growth factor receptor 1; bFGF R; BFGFR; C FGR; CD 331; CD331; CD331 antigen; CEK; FGFBFR; FGFR 1; FGF Receptor 1; FLG; FLG protein; FLJ14326; FLT 2; FLT2; Fms like tyrosine kinase 2; Fms related tyrosine kinase 2; Fms related tyrosine kinase 2 Pfeiffer syndrome; H2; H3; H4; H5; HBGFR; Heparin binding growth factor receptor; Hydroxyaryl protein kinase; KAL 2; KAL2; MFR; N SAM; N sam tyrosine kinase; Protein tyrosine kinase; Tyrosylprotein kinase; Basic fibroblast growth factor receptor 1; FGFR1_HUMAN.

Research Area Tumour Cell biology immunology Growth factors and hormones

Immunogen Species Rabbit

Clonality Polyclonal

React Species Human,Mouse,Rat (predicted:Chicken,Dog,Cow)
WB=1:500-2000,IHC-P=1:100-500,IHC-F=1:100-500,IF=1:100-500 (Paraffin sections need antigen repair)

Applications not yet tested in other applications.
optimal dilutions/concentrations should be determined by the end user.

Theoretical molecular weight 88kDa

Cellular localization The nucleus cytoplasmic The cell membrane

Form Liquid

Concentration 1mg/ml

immunogen KLH conjugated synthetic peptide derived from human BFGFR: 718-822/822 <Cytoplasmic>

Lsotype IgG

Purification affinity purified by Protein A

Buffer Solution 1M TBS(pH7.4) with 1% BSA, 3% Proclin300 and 50% Glycerol.



Storage	Shipped at 4°C. Store at -20 °C for one year. Avoid repeated freeze/thaw cycles.
Attention	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
PubMed	PubMed Fibroblast growth factors (FGFs) produce mitogenic and angiogenic effects in target cells by signaling through the cellular surface tyrosine kinase receptors. There are four members of the FGF receptor family: FGFR-1 (flg), FGFR-2 (bek, KGFR), FGFR-3 and FGFR-4. Each receptor contains an extracellular ligand binding domain, a transmembrane region and a cytoplasmic kinase domain (1). Following ligand binding and dimerization, the receptors are phosphorylated at specific tyrosine residues (2). Seven tyrosine residues in the cytoplasmic tail of FGFR-1 can be phosphorylated: Tyr463, Tyr583, Tyr585, Tyr653, Tyr654, Tyr730 and Tyr766. Tyrosine 653 and 654 are important for catalytic activity of the activated FGFR and are essential for signaling (3). The other phosphorylated tyrosine residues may provide docking sites for downstream signaling components such as Crk and PLCgamma.
Product Detail	Function: Receptor for basic fibroblast growth factor. Receptor for FGF23 in the presence of KL. A shorter form of the receptor could be a receptor for FGF1 (aFGF).
	Subunit: Monomer. Homodimer after ligand binding. Interacts predominantly with FGF1 and FGF2, but can also interact with FGF3, FGF4, FGF5, FGF6, FGF8, FGF10, FGF19, FGF21, FGF22 and FGF23 (in vitro). Ligand specificity is determined by tissue-specific expression of isoforms, and differences in the third Ig-like domain are crucial for ligand specificity. Affinity for fibroblast growth factors (FGFs) is increased by heparan sulfate glycosaminoglycans that function as coreceptors. Likewise, KLB increases the affinity for FGF19, FGF21 and FGF23. Interacts (phosphorylated on Tyr-766) with PLCG1 (via SH2 domains). Interacts with FRS2A. Interacts (via C-terminus) with NEDD4 (via WW3 domain). Interacts with KL. Interacts with SHB (via SH2 domain) and GRB10. Interacts with KAL1; this interaction does not interfere with FGF2-binding to FGFR1, but prevents binding of heparin-bound FGF2. Interacts with SOX2 and SOX3
	Subcellular 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 Specificity: 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.

Post-translational modifications:

Binding of FGF1 and heparin promotes autophosphorylation on tyrosine residues and activation of the receptor.

DISEASE:

Defects in FGFR1 are a cause of Pfeiffer syndrome (PS) ; also known as acrocephalosyndactyly type V (ACS5). PS is characterized by craniosynostosis (premature fusion of the skull sutures) with deviation and enlargement of the thumbs and great toes, brachymesophalangy, with phalangeal ankylosis and a varying degree of soft tissue syndactyly.

Defects in FGFR1 are a cause of idiopathic hypogonadotropic hypogonadism (IHH) [MIM:146110]. IHH is defined as a deficiency of the pituitary secretion of follicle-stimulating hormone and luteinizing hormone, which results in the impairment of pubertal maturation and of reproductive function.

Similarity:

Belongs to the protein kinase superfamily. Tyr protein kinase family. Fibroblast growth factor receptor subfamily.

Contains 3 Ig-like C2-type (immunoglobulin-like) domains.

Contains 1 protein kinase domain.

SWISS:

P11362

Gene ID:

2260

Database links:

[Entrez Gene: 2260](#) Human

[Entrez Gene: 14182](#) Mouse

[Entrez Gene: 79114](#) Rat

[Omim: 136350](#) Human

[SwissProt: P11362](#) Human

[SwissProt: P16092](#) Mouse

[SwissProt: Q04589](#) Rat

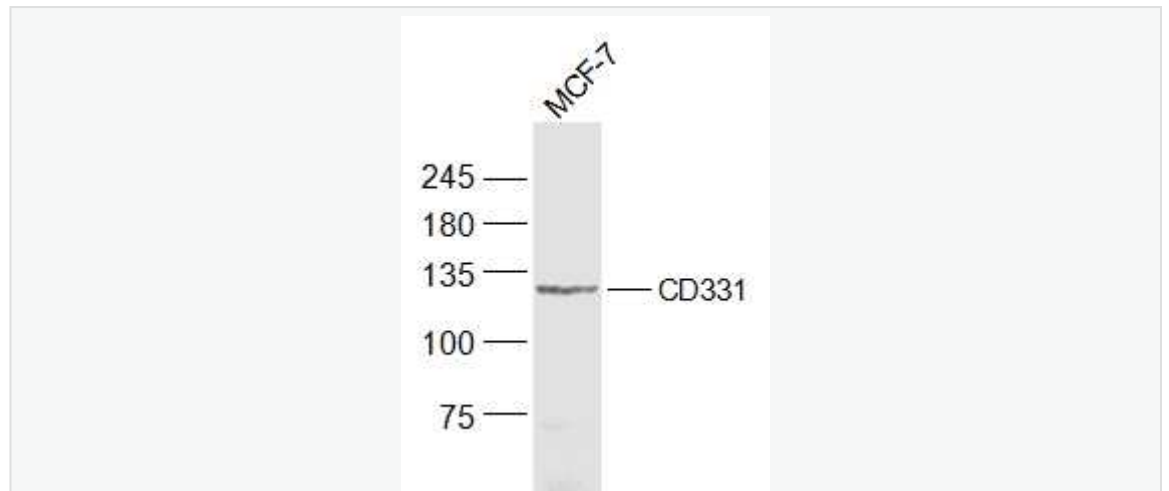
[Unigene: 264887](#) Human

[Unigene: 265716](#) Mouse

[Unigene: 207203](#) Rat

[Unigene: 9797](#) Rat

碱性成纤维细胞生长因子(bFGF)是一种多功能的生长因子,具有促进细胞有丝分裂和诱导新血管形成作用,和其受体(FGFR1)碱性成纤维细胞生长因子受体结合之后,在人体各组织中具有广泛的生物学活性和生理病理作用.越来越多的研究表明 Tumour 细胞中 bFGF-R1 过度表达对 Tumour 发生发展具有重要意义。



Product Picture

Sample:

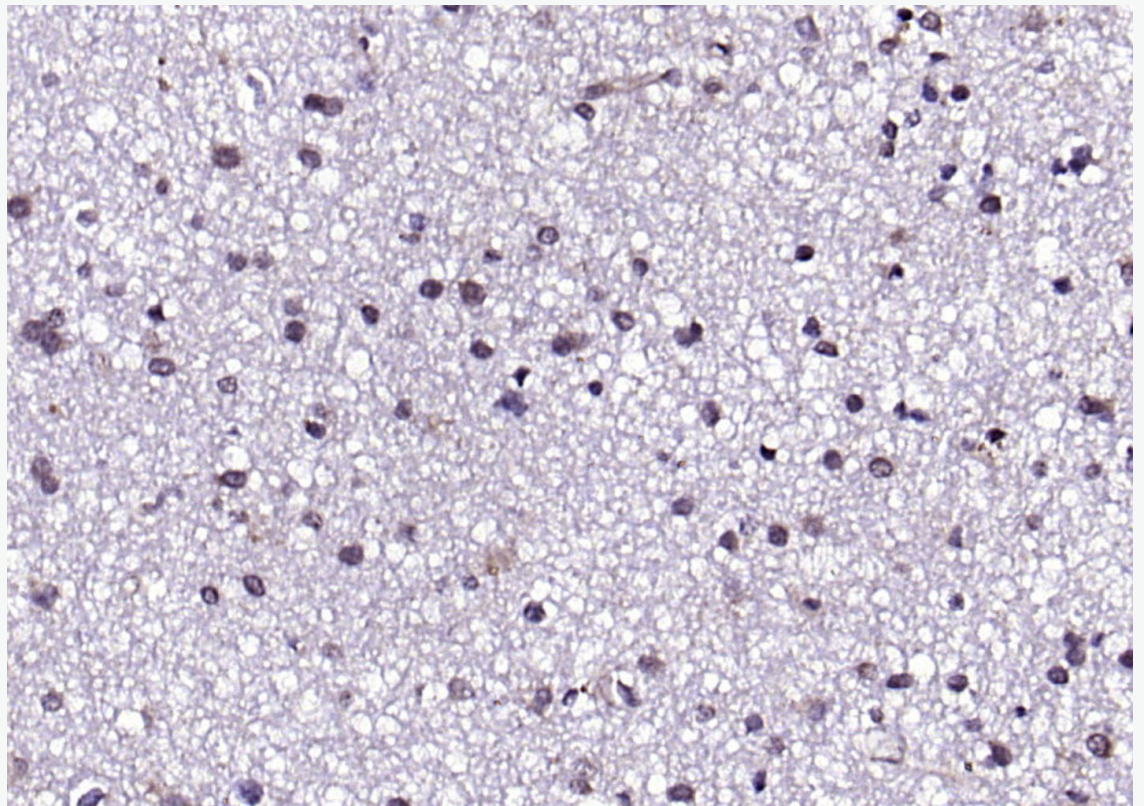
MCF-7(Human) Cell Lysate at 30 ug

Primary: Anti-CD331 (SL0230R) at 1/500 dilution

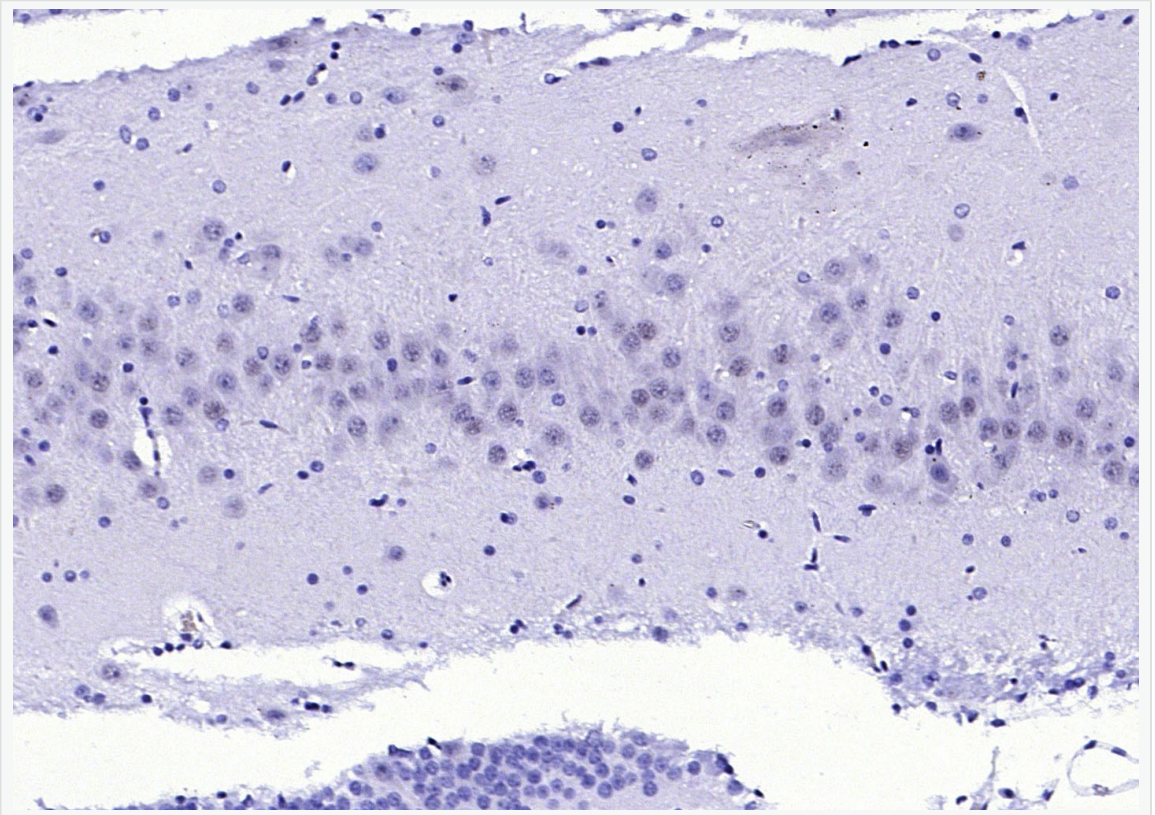
Secondary: IRDye800CW Goat Anti-Rabbit IgG at 1/20000 dilution

Predicted band size: 88 kD

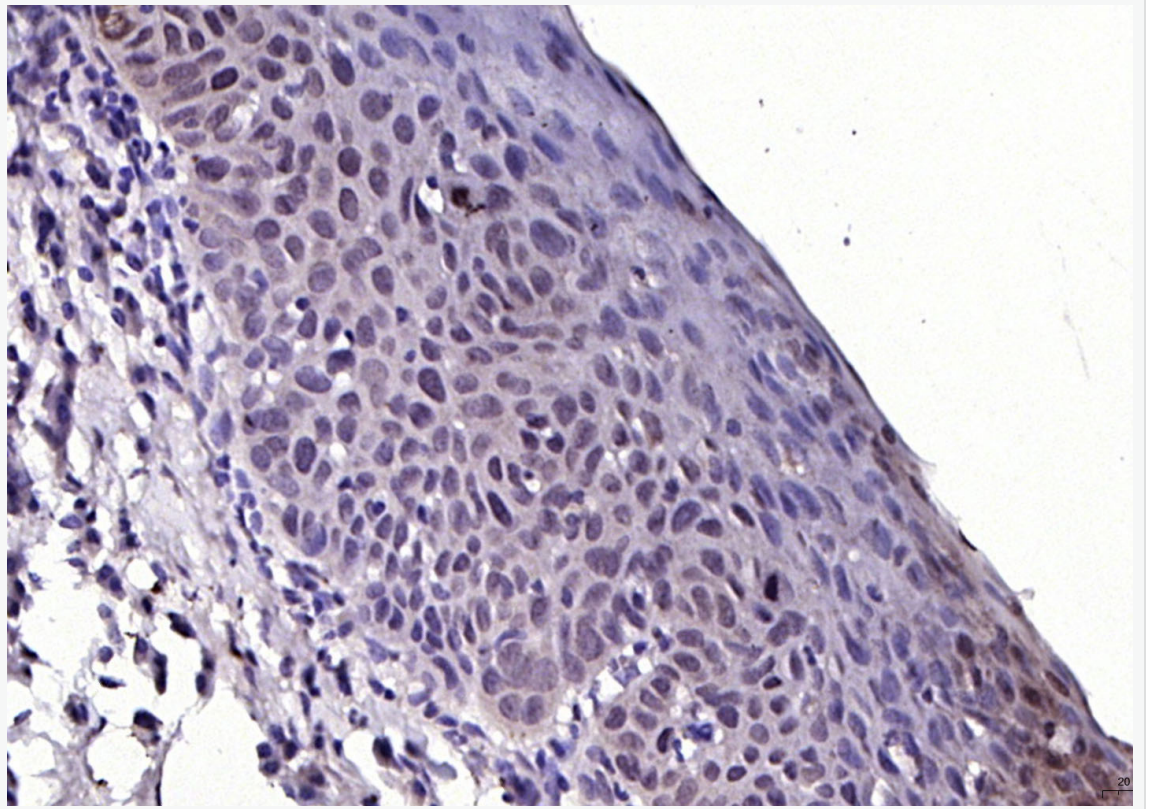
Observed band size: 130 kD



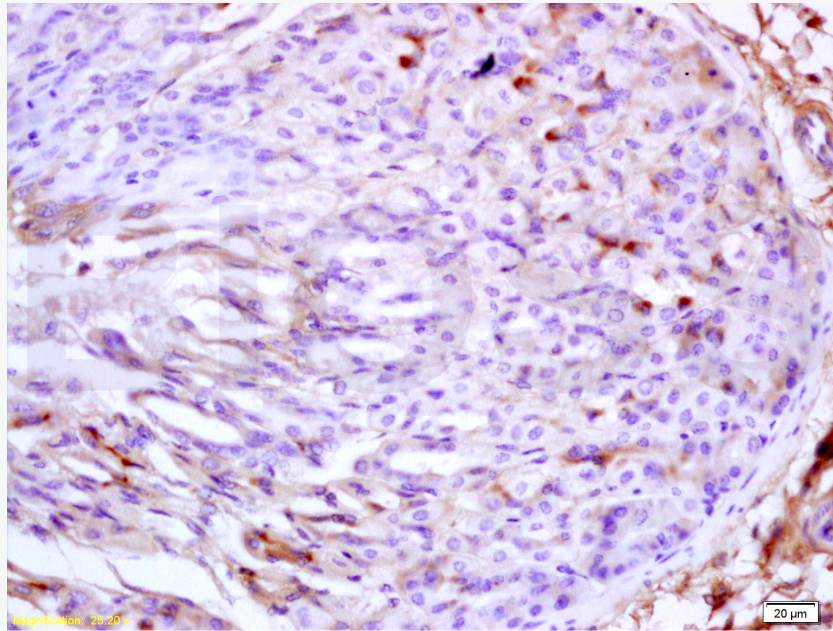
Paraformaldehyde-fixed, paraffin embedded (human meningioma); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (FGFR1) Polyclonal Antibody, Unconjugated (SL0230R) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructions and DAB staining.



Paraformaldehyde-fixed, paraffin embedded (rat brain); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (FGFR1) Polyclonal Antibody, Unconjugated (SL0230R) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructions and DAB staining.



Paraformaldehyde-fixed, paraffin embedded (human laryngeal carcinoma); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (FGFR1) Polyclonal Antibody, Unconjugated (SL0230R) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructions and DAB staining.



bs-0230R Anti-BFGFR Polyclonal Antibody

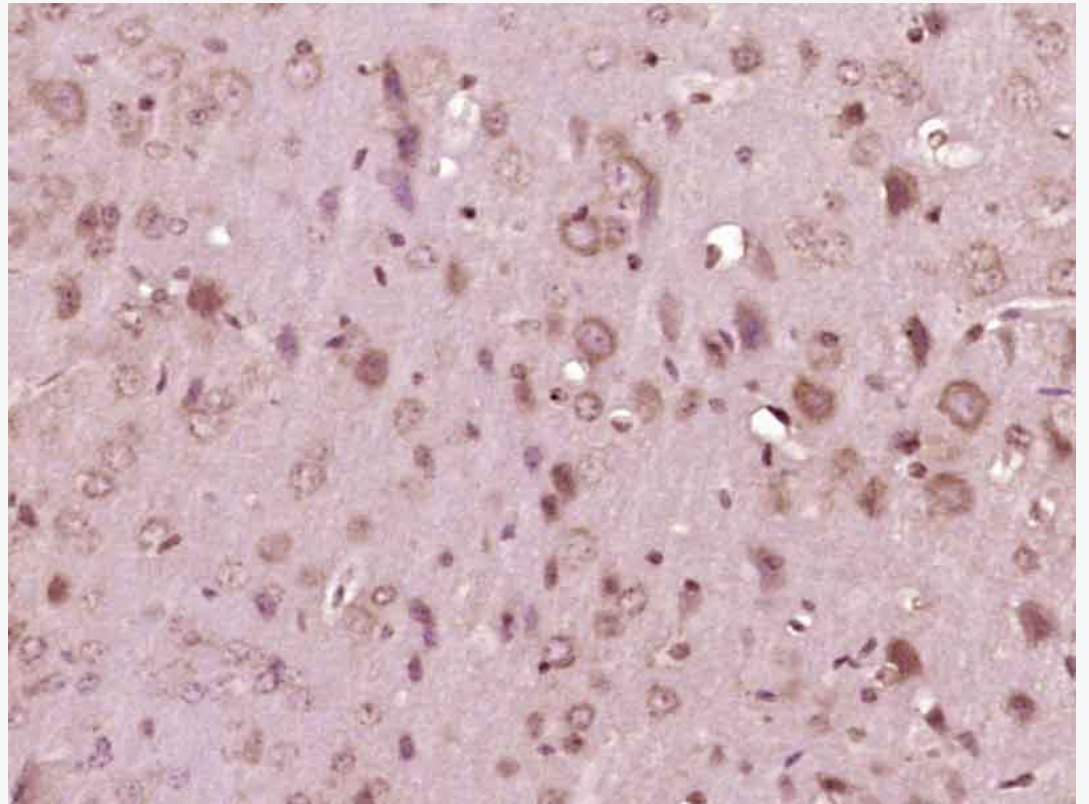
Tissue/cell: rat small intestine tissue;4% Paraformaldehyde-fixed and paraffin-embedded

Antigen retrieval: citrate buffer (0.01M, pH 6.0), Boiling bathing for 15min

Block endogenous peroxidase by 3% Hydrogen peroxide for 30min

Blocking buffer (normal goat serum) at 37°C for 20 min

Incubation: Anti-BFGFR Polyclonal Antibody, Unconjugated(bs-0230R) 1:200, overnight at 4°C, followed by conjugation to the secondary antibody and DAB staining



Paraformaldehyde-fixed, paraffin embedded (Mouse brain); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (FGFR1) Polyclonal Antibody, Unconjugated (SL0230R) at 1:400 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructions and DAB staining.