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TIE Antibody (N-term)

Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP7685a

Product Information

Application	WB, IHC-P, E
Primary Accession	P35590
Reactivity	Human, Mouse
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB1522
Calculated MW	125090
Antigen Region	12-42

Additional Information

Gene ID	7075
Other Names	Tyrosine-protein kinase receptor Tie-1, TIE1, TIE
Target/Specificity	This TIE antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 12-42 amino acids from the N-terminal region of human TIE.
Dilution	WB~~1:1000 IHC-P~~1:100~500 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.05% (V/V) Proclin 300. 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	TIE Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	TIE1
Synonyms	TIE
Function	Transmembrane tyrosine-protein kinase that may modulate TEK/TIE2 activity and contribute to the regulation of angiogenesis.

Cellular Location	Cell membrane; Single-pass type I membrane protein
Tissue Location	Specifically expressed in developing vascular endothelial cells.

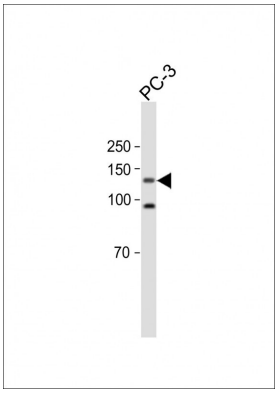
Background

Protein kinases are enzymes that transfer a phosphate group from a phosphate donor, generally the g phosphate of ATP, onto an acceptor amino acid in a substrate protein. By this basic mechanism, protein kinases mediate most of the signal transduction in eukaryotic cells, regulating cellular metabolism, transcription, cell cycle progression, cytoskeletal rearrangement and cell movement, apoptosis, and differentiation. With more than 500 gene products, the protein kinase family is one of the largest families of proteins in eukaryotes. The family has been classified in 8 major groups based on sequence comparison of their tyrosine (PTK) or serine/threonine (STK) kinase catalytic domains. The tyrosine kinase (TK) group is mainly involved in the regulation of cell-cell interactions such as differentiation, adhesion, motility and death. There are currently about 90 TK genes sequenced, 58 are of receptor protein TK (e.g. EGFR, EPH, FGFR, PDGFR, TRK, and VEGFR families), and 32 of cytosolic TK (e.g. ABL, FAK, JAK, and SRC families).

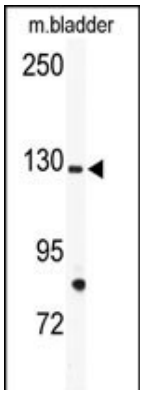
References

Verstovsek, S., et al., Cancer 94(5):1517-1521 (2002).
Tsiamis, A.C., et al., Microvasc. Res. 63(2):149-158 (2002).
Sato, T.N., et al., Nature 376(6535):70-74 (1995).
Partanen, J., et al., Mol. Cell. Biol. 12(4):1698-1707 (1992).

Images

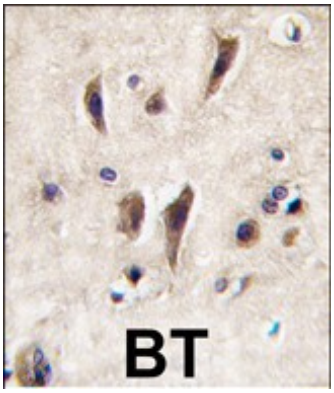


All lanes: Anti-TIE Antibody (N-term) at 1:1000 dilution + PC-3 whole cell lysate Lysates/proteins at 20 µg per lane. Secondary: Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (ASP1615) at 1/15000 dilution. Observed band size: 135 KDa Blocking/Dilution buffer: 5% NFDM/TBST.



Western blot analysis of anti-TIE Antibody (N-term)(Cat.#AP7685a) in mouse bladder tissue lysates (35ug/lane). TIE(arrow) was detected using the purified Pab.

Formalin-fixed and paraffin-embedded human brain tissue reacted with TIE antibody (N-term), which was peroxidase-conjugated to the secondary antibody, followed by DAB staining. This data demonstrates the use



of this antibody for immunohistochemistry; clinical relevance has not been evaluated.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.