EphB4 (E601) polyclonal antibody

Catalog: BS2018 Host: Rabbit Reactivity: Human,Rat,Mouse

BackGround:

The Eph receptors are the largest known family of receptor tyrosine kinases (RTKs). They can be divided into two groups based on sequence similarity and on their preference for a subset of ligands: EphA receptors bind to a glycosylphosphatidylinositol-anchored ephrin A ligand; EphB receptors bind to ephrin B proteins that have a transmembrane and cytoplasmic domain. Research studies have shown that Eph receptors and ligands may be involved in many diseases including cancer. Both ephrin A and B ligands have dual functions. As RTK ligands, ephrins stimulate the kinase activity of Eph receptors and activate signaling pathways in receptor-expressing cells. The ephrin extracellular domain is sufficient for this function as long as it is clustered. The second function of ephrins has been described as "reverse signaling", whereby the cytoplasmic domain becomes tyrosine phosphorylated, allowing interactions with other proteins that may activate signaling pathways in the ligand-expressing cells. Various stimuli can induce tyrosine phosphorylation of ephrin B, including binding to EphB receptors, activation of Src kinase, and stimulation by PDGF and FGF. Tyr324 and Tyr327 have been identified as major phosphorylation sites of ephrin B1 in vivo.

The ephrin receptor B4 (EphB4) is normally expressed on venous endothelial cells, while arterial endothelial cells express its ligand, EphrinB2. Together, EphB4 and EphrinB2 play an important roll in vasculature development and maintenance. Research studies show that various cancers, including breast, colorectal, esophageal, and pancreatic cancers, express EphB4. However, as EphB4 has been shown to have both tumor suppressive and promoting properties, its role in tumorigenesis and tumor progression remains uncertain.

Product:

Rabbit IgG, 1mg/ml in PBS with 0.02% sodium azide, 50% glycerol, pH7.2.

Molecular Weight:

~ 115 kDa

Swiss-Prot:

P54760

Purification&Purity:

The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen and the purity is > 95% (by SDS-PAGE).

Applications:

WB: 1:500~1:1000

IHC: 1:50~1:200

IF: 1:50~1:200

IP: 1:50~1:200

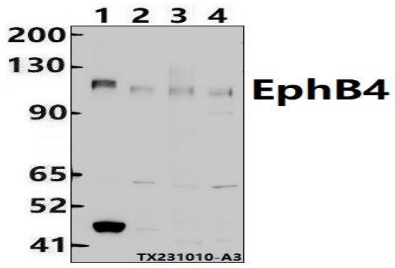
Storage&Stability:

Store at 4℃ short term. Aliquot and store at -20℃ long term. Avoid freeze-thaw cycles.

Specificity:

EphB4 (E601) polyclonal antibody detects endogenous levels of EphB4 protein.

DATA:



Western blot (WB) analysis of EphB4 (E601) polyclonal antibody at 1:500 dilution

Lane1:MCF-7 whole cell lysate(30ug)

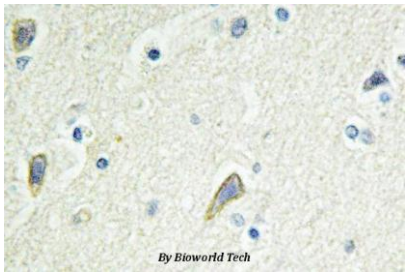
Lane2:HepG2 whole cell lysate(30ug)

Lane3:3T3-L1 whole cell lysate(30ug)

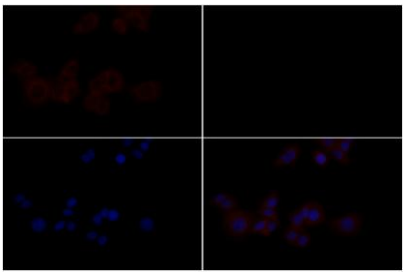
Lane4:PC12 whole cell lysate(30ug)

Bioworld Technology, Inc.
Add: 1660 South Highway 100, Suite 500 St. Louis Park, MN 55416,USA.
Email: info@bioworlde.com
Tel: 6123263284
Fax: 6122933841

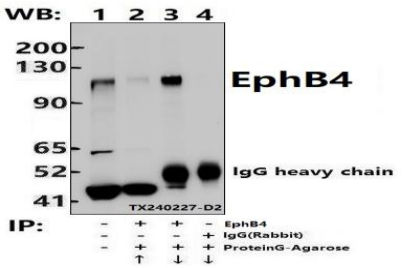
Bioworld technology, co. Ltd.
Add: No 9, weidi road Qixia District Nanjing, 210046, P. R. China.
Email: info@biogot.com
Tel: 0086-025-68037686
Fax: 0086-025-68035151



Immunohistochemistry (IHC) analyzes of EphB4 (E601) pAb in paraf-fin-embedded human brain tissue.



Immunofluorescence analysis of MCF-7 cells using EphB4 (E601) pAb at dilution of 1:200 (40x lens).



Immunoprecipitation of MCF-7 cell lysates using EphB4 pAb (Se-pharose Bead Conjugate)#BD0048 (lane 2 and lane 3) and Nonspecific IgG Control (Sepharose Bead Conjugate)#BD0048 (lane 4) .Lane 1 is 30% input. The western blot was probed using EphB4 pAb.

Note:

For research use only, not for use in diagnostic procedure.

Bioworld Technology, Inc.
Add: 1660 South Highway 100, Suite 500 St. Louis Park, MN 55416,USA.
Email: info@bioworlde.com
Tel: 6123263284
Fax: 6122933841

Bioworld technology, co. Ltd.
Add: No 9, weidi road Qixia District Nanjing, 210046, P. R. China.
Email: info@biogot.com
Tel: 0086-025-68037686
Fax: 0086-025-68035151