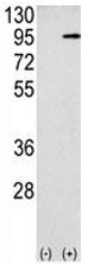
APP Antibody / Amyloid beta (F49576)

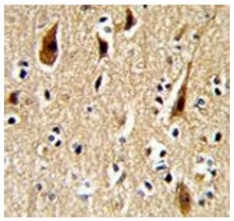
Catalog No.	Formulation	Size
F49576-0.4ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.4 ml
F49576-0.08ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.08 ml

Bulk quote request

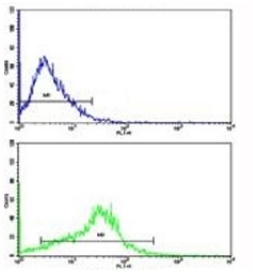
Availability	1-3 business days
Species Reactivity	Human, Mouse
Predicted Reactivity	Primate
Format	Purified
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit Ig
Purity	Purified
UniProt	P05067
Applications	Western Blot : 1:1000 IHC (Paraffin) : 1:10-1:50 Flow Cytometry : 1:10-1:50
Limitations	This APP antibody is available for research use only.



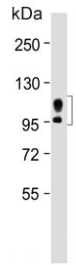
Western blot analysis APP antibody and 293 cell lysate (2 ug/lane) either nontransfected (Lane 1) or transiently transfected with the APP gene (2). Predicted molecular weight 79~120 kDa depending on glycosylation level.



IHC analysis of FFPE human brain with APP antibody



Flow cytometric analysis of HepG2 cells using APP antibody (bottom histogram) compared to a negative control (top histogram). FITC-conjugated goat-anti-rabbit secondary Ab was used for the analysis.



Western blot testing of mouse brain tissue lysate with APP antibody. Predicted molecular weight 79~120 kDa depending on glycosylation level.

Description

Functions as a cell surface receptor and performs physiological functions on the surface of neurons relevant to neurite growth, neuronal adhesion and axonogenesis. Involved in cell mobility and transcription regulation through protein-protein interactions. Can promote transcription activation through binding to APBB1-KAT5 and inhibits Notch signaling through interaction with Numb. Couples to apoptosis-inducing pathways such as those mediated by G(O) and JIP. Inhibits G(o) alpha ATPase activity (By similarity). Acts as a kinesin I membrane receptor, mediating the axonal transport of beta-secretase and presenilin 1. Involved in copper homeostasis/oxidative stress through copper ion reduction. In vitro, copper-metallated APP induces neuronal death directly or is potentiated through Cu2+-mediated low-density lipoprotein oxidation. Can regulate neurite outgrowth through binding to components of the extracellular matrix such as heparin and collagen I and IV. The splice isoforms that contain the BPTI domain possess protease inhibitor activity. Induces a AGER-dependent pathway that involves activation of p38 MAPK, resulting in internalization of amyloid-beta peptide and leading to mitochondrial dysfunction in cultured cortical neurons. [UniProt]

Application Notes

Titration of the APP antibody may be required due to differences in protocols and secondary/substrate sensitivity.

Immunogen

A portion of amino acids 29-61 from the human Amyloid beta protein was used as the immunogen for this APP antibody.

Storage

Aliquot the APP antibody and store frozen at -20oC or colder. Avoid repeated freeze-thaw cycles.