



Product Information Sheet

Polyclonal Anti- Amyloid precursor protein, APP

Immunogen

Lot No. 01311121-86227

Ig type rabbit IgG

Purity

sequence.

Immunogen affinity purified.

Specificity

Human, rat.

proteins.

Size 100µg/vial

Application

	Concen-	Tested	Concluded	Antigen
	tration	Species	Species	Retrieval
WB	1µg/ml	Hu, Rat	Ms	-
IHC-P	1µg/ml	Hu	-	By Heat
IHC-F	-	-	-	-
ICC	-	-	-	-

A synthetic peptide corresponding to a sequence at the N-terminal of

human APP (18-32 aa), identical to the related mouse and rat

Recommended application Western blot Immunohistochemistry(P)

No cross reactivity with other

Other applications have not been tested.

Optimal dilutions should be determined by end user.

Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na₂HPO₄, 0.05mg Thimerosal, 0.05mg NaN₃.

Reconstitution

0.2ml of distilled water will yield a concentration of 500µg/ml.

To reorder contact us at: Antagene, Inc. Toll Free: 1(866)964-2589 email: Info@antageneinc.com

Storage

At -20°C for one year. After reconstitution, at 4°C for one month. It can also be aliquotted and stored frozen at -20°C for longer time.

BACKGROUND

Amyloid precursor protein (APP) is an integral membrane protein expressed in many tissues and concentrated in the synapses of neurons. Its primary function is not known, though it has been implicated as a regulator of synapse formation, neural plasticity and iron export. APP is best known and most commonly studied as the precursor molecule whose proteolysis generates beta amyloid ($A\beta$), a 39- to 42-amino acid peptide whose amyloid fibrillar form is the primary component of amyloid plaques found in the brains of Alzheimer's disease patients. APP undergoes posttranslational proteolytic processing by alpha-, beta-, and gamma-secretases. Alpha-secretase generates soluble amyloid protein, while beta- and gamma-secretases generate APP components with amyloidogenic features. These 2 processing pathways are mutually exclusive.

REFERENCE

1.PDB 1RW6; Wang Y, Ha Y (August 2004). "The X-ray structure of an antiparallel dimer of the human amyloid precursor protein E2 domain". Mol. Cell 15 (3): 343–53.

2.Priller C, Bauer T, Mitteregger G, Krebs B, Kretzschmar HA, Herms J (July 2006). "Synapse formation and function is modulated by the amyloid precursor protein". J. Neurosci. 26 (27): 7212–21.

3.Turner PR, O'Connor K, Tate WP, Abraham WC (May 2003). "Roles of amyloid precursor protein and its fragments in regulating neural activity, plasticity and memory". Prog. Neurobiol. 70 (1): 1–32.

4.Duce JA et al. (2010). "Iron-Export Ferroxidase Activity of β - Amyloid Precursor Protein Is Inhibited by Zinc in Alzheimer's Disease". Cell 142 (6): 857–67.