



# ACHA4 Monoclonal Antibody

<b>Catalog No</b>	YP-mAb-05843
<b>Isotype</b>	IgG
<b>Reactivity</b>	Human;Rat;Mouse
<b>Applications</b>	WB
<b>Gene Name</b>	CHRNA4 NACRA4
<b>Protein Name</b>	Neuronal acetylcholine receptor subunit alpha-4
<b>Immunogen</b>	Synthesized peptide derived from human protein . at AA range: 300-380
<b>Specificity</b>	ACHA4 Monoclonal Antibody detects endogenous levels of protein.
<b>Formulation</b>	Liquid in PBS containing 50% glycerol, and 0.02% sodium azide.
<b>Source</b>	Monoclonal, Mouse,IgG
<b>Purification</b>	The antibody was affinity-purified from mouse antiserum by affinity-chromatography using epitope-specific immunogen.
<b>Dilution</b>	WB 1:500-1:2000
<b>Concentration</b>	1 mg/ml
<b>Purity</b>	≥90%
<b>Storage Stability</b>	-20°C/1 year
<b>Synonyms</b>	
<b>Observed Band</b>	68kD
<b>Cell Pathway</b>	Cell junction, synapse, postsynaptic cell membrane; Multi-pass membrane protein. Cell membrane; Multi-pass membrane protein. Cell membrane ; Lipid-anchor .
<b>Tissue Specificity</b>	Brain,Hippocampus,PCR rescued clones,
<b>Function</b>	disease:Defects in CHRNA4 are the cause of nocturnal frontal lobe epilepsy type 1 (ENFL1) [MIM:600513]; also symbolized ADNFLE. ENFL1 is an autosomal dominant epilepsy characterized by nocturnal seizures with hyperkinetic automatisms and poorly organized stereotyped movements.,function:After binding acetylcholine, the AChR responds by an extensive change in conformation that affects all subunits and leads to opening of an ion-conducting channel across the plasma membrane.,similarity:Belongs to the ligand-gated ionic channel (TC 1.A.9) family.,subunit:Neuronal AChR is composed of two different types of subunits: alpha and beta. Alpha-4 subunit can be combined to beta-2 or beta-4 to give rise to functional receptors. Interacts with RIC3; which is required for proper folding and assembly.,
<b>Background</b>	This gene encodes a nicotinic acetylcholine receptor, which belongs to a superfamily of ligand-gated ion channels that play a role in fast signal transmission at synapses. These pentameric receptors can bind acetylcholine,



which causes an extensive change in conformation that leads to the opening of an ion-conducting channel across the plasma membrane. This protein is an integral membrane receptor subunit that can interact with either nAChR beta-2 or nAChR beta-4 to form a functional receptor. Mutations in this gene cause nocturnal frontal lobe epilepsy type 1. Polymorphisms in this gene that provide protection against nicotine addiction have been described. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Feb 2012],

**matters needing attention**

Avoid repeated freezing and thawing!

**Usage suggestions**

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

## Products Images