

Anti-Tryptophan Hydroxylase (Ser19) Antibody

Our Anti-Tryptophan Hydroxylase (Ser19) rabbit polyclonal phosphospecific primary antibody from Phos

Catalog # AN1593

Product Information

Application	WB
Primary Accession	Q8CGU9
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Calculated MW	55621

Additional Information

Gene ID	317675
Other Names	MGC138871 antibody, ADHD7 antibody, FLJ37295 antibody, MGC138872 antibody, Neuronal tryptophan hydroxylase antibody, NTPH antibody, TPH 2 antibody, Tph2 antibody, TPH2 antibody, TPH2_HUMAN antibody, Tryptophan 5-hydroxylase 2 antibody, Tryptophan 5-monooxygenase 2 antibody, Tryptophan hydroxylase 2 antibody
Target/Specificity	<p>Tryptophan hydroxylase (TPH) catalyzes the 5-hydroxylation of tryptophan, which is the first step in the biosynthesis of indoleamines (serotonin and melatonin) (Martinez et al., 2001). In mammals, serotonin biosynthesis occurs predominantly in neurons which originate in the Raphe nuclei of the brain, and melatonin synthesis takes place within the pineal gland. Although TPH catalyzes the same reaction within the Raphe nuclei and the pineal gland, TPH activity is rate-limiting for serotonin but not melatonin biosynthesis. Serotonin functions mainly as a neurotransmitter, whereas melatonin is the principal hormone secreted by the pineal gland. The activity of TPH is enhanced by phosphorylation by cAMP-dependent protein kinase (PKA) and Ca²⁺/calmodulin kinase II (CaM K II) (Jiang et al., 2000; Johansen et al., 1996). CaM K II phosphorylates Ser-19 which lies within the regulatory domain of TPH2 (McKinney et al., 2005).</p>
Dilution	WB~~1:1000
Format	Antigen Affinity Purified from Pooled Serum
Storage	Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.
Precautions	Anti-Tryptophan Hydroxylase (Ser19) Antibody is for research use only and not for use in diagnostic or therapeutic procedures.
Shipping	Blue Ice

Background

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