

# Immunotag™ LRRK2 Polyclonal Antibody

Antibody Specification	
Catalog No.	ITN1869
Product Description	Immunotag™ LRRK2 Polyclonal Antibody
Size	50 µg, 100 µg
Conjugation	HRP, Biotin, FITC, Alexa Fluor® 350, Alexa Fluor® 405, Alexa Fluor® 488, Alexa Fluor® 555, Alexa Fluor® 594, Alexa Fluor® 647
IMPORTANT NOTE	This product is custom manufactured with a lead time of 3-4 weeks. Once in production, this item cannot be cancelled from an order and is not eligible for return.
Target Protein	LRRK2
Clonality	Polyclonal
Storage/Stability	-20°C/1 year
Application	IHC-p
Recommended Dilution	IHC-p 1:50-300
Concentration	1 mg/ml
Reactive Species	Human,Mouse
Host Species	Rabbit
Immunogen	Synthesized peptide derived from part region of human protein
Specificity	LRRK2 Polyclonal Antibody detects endogenous levels of protein.
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen
Form	Liquid in PBS containing 50% glycerol, and 0.02% sodium azide.
Gene Name	LRRK2 PARK8
Accession No.	Q5S007 Q5S006
Description	leucine rich repeat kinase 2(LRRK2) Homo sapiens This gene is a member of the leucine-rich repeat kinase family and encodes a protein with an ankryin repeat region, a leucine-rich repeat (LRR) domain, a kinase domain, a DFG-like motif, a RAS domain, a GTPase domain, a MLK-like domain, and a WD40 domain. The protein is present largely in the cytoplasm but also associates with the mitochondrial outer membrane. Mutations in this gene have been associated with Parkinson disease-8. [provided by RefSeq, Jul 2008],

## Antibody Specification

Cell Pathway/ Category	Parkinson's disease,
Protein Expression	Brain,Human small intestine,Lung and heart,Testis,
Subcellular Localization	extracellular space,intracellular,cytoplasm,mitochondrion,mitochondrial outer membrane,mitochondrial inner membrane,mitochondrial matrix,lysosome,endosome,endoplasmic reticulum,Golgi apparatus,Golgi-associated vesicle,GO
Protein Function	<p>catalytic activity:ATP + a protein = ADP + a phosphoprotein.,disease:Defects in LRRK2 are the cause of Parkinson disease 8 (PARK8) [MIM:607060, 168600]. Parkinson disease (PD) is a complex, multifactorial disorder that typically manifests after the age of 50 years, although early-onset cases (before 50 years) are known. PD generally arises as a sporadic condition but is occasionally inherited as a simple mendelian trait. Although sporadic and familial PD are very similar, inherited forms of the disease usually begin at earlier ages and are associated with atypical clinical features. PD is characterized by bradykinesia, resting tremor, muscular rigidity and postural instability, as well as by a clinically significant response to treatment with levodopa. The pathology involves the loss of dopaminergic neurons in the substantia nigra and the presence of Lewy bodies (intraneuronal accumulations of aggregated proteins), in surviving neurons in various areas of the brain. PARK8 is an autosomal-dominant late-onset parkinsonism, characterized by onset from 50 to 65 years, with slow progression and relatively benign course.,function:Probable protein kinase whose role is not yet known. May play a role in the phosphorylation of proteins central to Parkinson disease. May also have GTPase activity.,similarity:Belongs to the protein kinase superfamily.,similarity:Belongs to the protein kinase superfamily. TKL Ser/Thr protein kinase family.,similarity:Contains 1 protein kinase domain.,similarity:Contains 1 Roc domain.,similarity:Contains 16 LRR (leucine-rich) repeats.,subcellular location:Localized in the cytoplasm and associated with cellular membrane structures. Associates with the mitochondrial outer membrane.,subunit:Interacts with PARK2.,tissue specificity:Expressed throughout the adult brain, but at a lower level than in heart and liver. Also expressed in placenta, lung, skeletal muscle, kidney and pancreas. In the brain, expressed in the cerebellum, cerebral cortex, medulla, spinal cord occipital pole, frontal lobe, temporal lobe and putamen. Expression is particularly high in brain dopaminergic areas.,</p>
Usage	For Research Use Only! Not for diagnostic or therapeutic procedures.