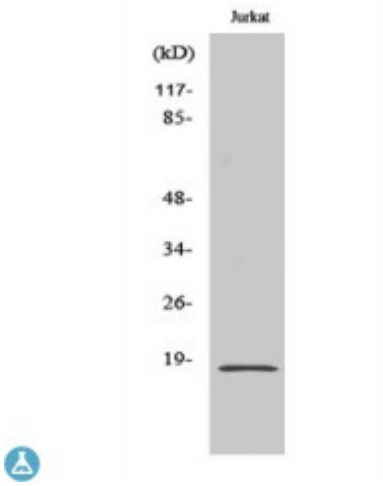
Anti-SOD1 antibody



Description	Rabbit polyclonal to SOD1.

Model	STJ95729
Host	Rabbit
Reactivity	Human, Mouse, Rat
Applications	ELISA, WB
Immunogen	Synthesized peptide derived from human SOD-1.
Immunogen Region	Internal
Gene ID	6647
Gene Symbol	SOD1
Dilution range	WB 1:500-1:2000ELISA 1:10000
Specificity	SOD-1 Polyclonal Antibody detects endogenous levels of SOD-1 protein.
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Note	For Research Use Only (RUO).
Protein Name	Superoxide dismutase Cu-Zn Superoxide dismutase 1 hSod1
Molecular Weight	18 kDa
Clonality	Polyclonal
Conjugation	Unconjugated
Isotype	IgG

Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Concentration	1 mg/ml
Storage Instruction	Store at -20°C, and avoid repeat freeze-thaw cycles.
Database Links	HGNC:11179OMIM:105400
Alternative Names	Superoxide dismutase Cu-Zn Superoxide dismutase 1 hSod1
Function	Destroys radicals which are normally produced within the cells and which are toxic to biological systems.
Cellular Localization	Cytoplasm Mitochondrion Nucleus. Predominantly cytoplasmic. the pathogenic variants ALS1 Arg-86 and Ala-94 gradually aggregates and accumulates in mitochondria.
Post-translational Modifications	Unlike wild-type protein, the pathogenic variants ALS1 Arg-38, Arg-47, Arg-86 and Ala-94 are polyubiquitinated by RNF19A leading to their proteasomal degradation. The pathogenic variants ALS1 Arg-86 and Ala-94 are ubiquitinated by MARCH5 leading to their proteasomal degradation. The ditryptophan cross-link at Trp-33 is responsible for the non-disulfide-linked homodimerization. Such modification might only occur in extreme conditions and additional experimental evidence is required. Palmitoylation helps nuclear targeting and decreases catalytic activity. Succinylation, adjacent to copper catalytic site, probably inhibits activity. Desuccinylation by SIRT5 enhances activity.