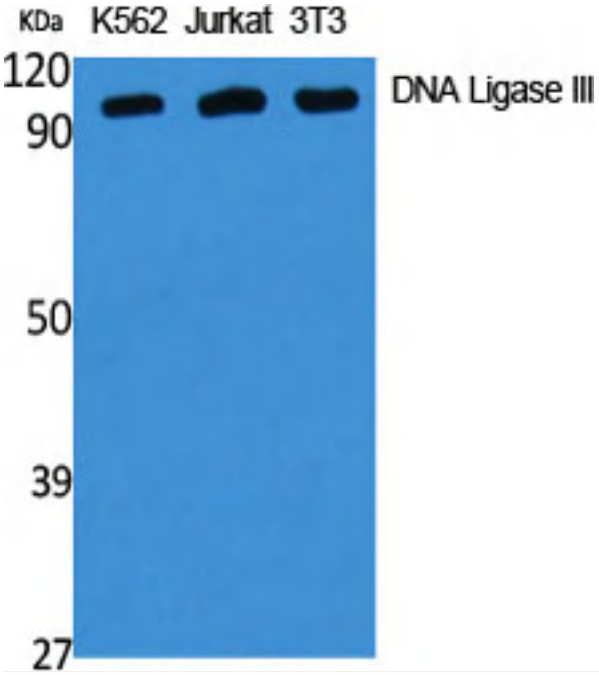
DNA Ligase III Polyclonal Antibody

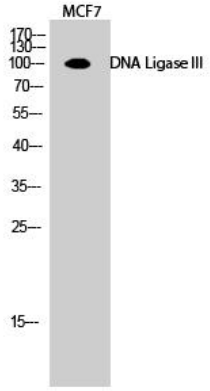
Catalog No	YP-Ab-00379
Isotype	IgG
Reactivity	Human;Mouse;Rat
Applications	WB;ELISA
Gene Name	LIG3
Protein Name	DNA ligase 3
Immunogen	Synthesized peptide derived from DNA Ligase III . at AA range: 110-190
Specificity	DNA Ligase III Polyclonal Antibody detects endogenous levels of DNA Ligase III protein.
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source	Polyclonal, Rabbit,IgG
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Dilution	Western Blot: 1/500 - 1/2000. ELISA: 1/10000. Not yet tested in other applications.
Concentration	1 mg/ml
Purity	≥90%
Storage Stability	-20°C/1 year
Synonyms	LIG3; DNA ligase 3; DNA ligase III; Polydeoxyribonucleotide synthase [ATP] 3
Observed Band	100kD
Cell Pathway	[Isoform 1]: Mitochondrion . Contains an N-terminal mitochondrial transit peptide. .; [Isoform 2]: Mitochondrion . Contains an N-terminal mitochondrial transit peptide. .; [Isoform 3]: Nucleus . Lacks the N-terminal mitochondrial transit peptide. .; [Isoform 4]: Nucleus . Lacks the N-terminal mitochondrial transit peptide. .
Tissue Specificity	Testis, thymus, prostate and heart.
Function	catalytic activity:ATP + (deoxyribonucleotide)(n) + (deoxyribonucleotide)(m) = AMP + diphosphate + (deoxyribonucleotide)(n+m).,cofactor:Magnesium.,function:Interacts with DNA-repair protein XRCC1 and can correct defective DNA strand-break repair and sister chromatid exchange following treatment with ionizing radiation and alkylating agents.,online information:DNA ligase entry,similarity:Belongs to the ATP-dependent DNA ligase family.,similarity:Contains 1 BRCT domain.,similarity:Contains 1 PARP-type zinc finger.,tissue specificity:Testis, thymus, prostate and heart.,
Background	This gene is a member of the DNA ligase family. Each member of this family encodes a protein that catalyzes the joining of DNA ends but they each have a distinct role in DNA metabolism. The protein encoded by this gene is involved in

	excision repair and is located in both the mitochondria and nucleus, with translation initiation from the upstream start codon allowing for transport to the mitochondria and translation initiation from a downstream start codon allowing for transport to the nucleus. Additionally, alternate transcriptional splice variants, encoding different isoforms, have been characterized. [provided by RefSeq, Jul 2008],
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



Western Blot analysis of various cells using DNA Ligase III Polyclonal Antibody diluted at 1:1000 cells nucleus extracted by Minute TM Cytoplasmic and Nuclear Fractionation kit (SC-003,Inventbiotech,MN,USA).



Western Blot analysis of MCF7 cells using DNA Ligase III Polyclonal Antibody diluted at 1:1000 cells nucleus extracted by Minute TM Cytoplasmic and Nuclear Fractionation kit (SC-003,Inventbiotech,MN,USA).