

DMPK rabbit pAb**Cat#: orb765055 (Manual)**

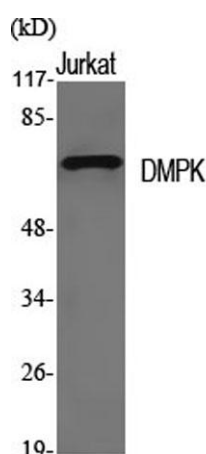
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Product Name	DMPK rabbit pAb
Host species	Rabbit
Applications	WB;ELISA
Species Cross-Reactivity	Human;Rat;Mouse;
Recommended dilutions	Western Blot: 1/500 - 1/2000. ELISA: 1/40000. Not yet tested in other applications.
Immunogen	The antiserum was produced against synthesized peptide derived from human DMPK. AA range:11-60
Specificity	DMPK Polyclonal Antibody detects endogenous levels of DMPK protein.
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide..
Storage	Store at -20°C. Avoid repeated freeze-thaw cycles.
Protein Name	Myotonin-protein kinase
Gene Name	DMPK
Cellular localization	Endoplasmic reticulum membrane ; Single-pass type IV membrane protein ; Cytoplasmic side . Nucleus outer membrane ; Single-pass type IV membrane protein ; Cytoplasmic side . Mitochondrion outer membrane ; Single-pass type IV membrane protein . Sarcoplasmic reticulum membrane . Cell membrane . Cytoplasm, cytosol . Localizes to sarcoplasmic reticulum membranes of cardiomyocytes. . ; [Isoform 1]: Mitochondrion membrane.; [Isoform 3]: Mitochondrion membrane.

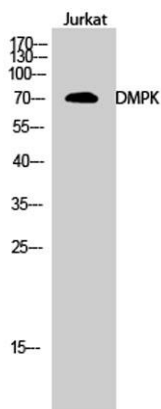
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Clonality	Polyclonal
Concentration	1 mg/ml
Observed band	70kD
Human Gene ID	1760
Human Swiss-Prot Number	Q09013
Alternative Names	DMPK; DM1PK; MDPK; Myotonin-protein kinase; MT-PK; DM-kinase; DMK; DM1 protein kinase; DMPK; Myotonic dystrophy protein kinase

Background

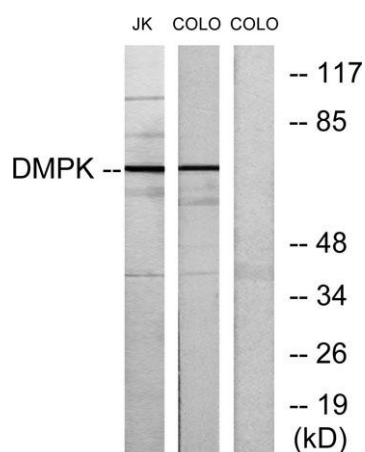
The protein encoded by this gene is a serine-threonine kinase that is closely related to other kinases that interact with members of the Rho family of small GTPases. Substrates for this enzyme include myogenin, the beta-subunit of the L-type calcium channels, and phospholemman. The 3' untranslated region of this gene contains 5-38 copies of a CTG trinucleotide repeat. Expansion of this unstable motif to 50-5,000 copies causes myotonic dystrophy type I, which increases in severity with increasing repeat element copy number. Repeat expansion is associated with condensation of local chromatin structure that disrupts the expression of genes in this region. Several alternatively spliced transcript variants of this gene have been described, but the full-length nature of some of these variants has not been determined. [provided by RefSeq, Jul 2016].



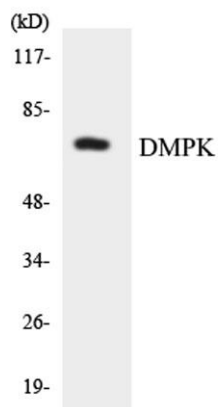
Western Blot analysis of various cells using DMPK Polyclonal Antibody



Western Blot analysis of Jurkat cells using DMPK Polyclonal Antibody



Western blot analysis of lysates from Jurkat and COLO205 cells, using DMPK Antibody. The lane on the right is blocked with the synthesized peptide.



Western blot analysis of the lysates from HT-29 cells using DMPK antibody.