OriGene Technologies, Inc.
9620 Medical Center Drive, Ste 200
Rockville, MD 20850, US
Phone: +1-888-267-4436
https://www.origene.com
techsupport@origene.com
EU: info-de@origene.com
CN: techsupport@origene.cn

Product datasheet for SC109066

CHKL (CHKB) (NM_152253) Human Untagged Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	CHKL (CHKB) (NM_152253) Human Untagged Clone
Tag:	Tag Free
Symbol:	CHKL
Synonyms:	CHETK; CHKL; choline/ethanolamine kinase; choline kinase-like; choline kinase beta; CKEKB; EKB
Mammalian Cell Selection:	None
Vector:	pCMV6-XL4
E. coli Selection:	Ampicillin (100 ug/mL)
Fully Sequenced ORF:	>OriGene ORF within SC109066 sequence for NM_152253 edited (data generated by NextGen Sequencing) ATGGCGGCCGAGGCGACAGCTGTGGCCGGAAGCGGGGCTGTTGGCGGCTGCCTGGCCAAA GACGGCTTGCAGCAGTCTAAGTGCCCGGACACTACCCCAAAACGGCGGCGCGCCTCGTCG CTGTCGCGTGACGCCGAGCGCCGAGCCTACCAATGGTGCCGGGAGTACTTGGGCGGGGCC TGGCGCCGAGTGCAGCCCGAGGAGCTGAGGGTTTACCCCGTGAGGTGGGAGGTCAGGGGT CAGCCTCTCCGGTGCGCGGATCGGGGTCAGGGGTCAGCCGCGGGGCCCTCAGGATGCTCC ATGTTTTCGCCCCCCTCTTGCGCCCGCGCCTGGGGCGGGGCGGGGCCGGCCTGGCCGGGA GGGGGCCGGGGCCGCGGCAGGTAG Clone variation with respect to NM_152253.1

View online »

5' Read Nucleotide Sequence:

>OriGene 5' read for NM_152253 unedited
TTGGATTATGTAACACGATCTTATATAGGCGGCCGCGCAATTCGCACCAGGNAAAAAGCC
CCCGGGCCGGGGCACGGAGAGAGCCGAGCGCCGCAGCCGTGAGCCGAATAGAGCCGGAGA
GACCCGAGTATGACCGGAGAAGCCCAGGCCGGCCGGAAGAGGAGCCGAGCGCGGCCGGAA
GGAACCGAGCCCGTCCGAAGGGAGCGGAGCGCAGCCTGGCCTGGGGCCCGGTCGAGCCCG
CGCCATGGCGGCCGAGGCGACAGCTGTGGCCGGAAGCGGGGCTGTTGGCGGCTGCCTGGC
CAAAGACGGCTTGCAGCAGTCTAAGTGCCCGGACACTACCCCAAAACGGCGGCGCGCCTC
GTCGCTGTCGCGTGACGCCGAGCGCCGAGCCTACCAATGGTGCCGGGAGTACTTGGGCGG
GGCCTGGCGCCGAGTGCAGCCCGAGGAGCTGAGGGTTTACCCCGTGAGGTGGGAGGTCAG
GGGTCAGCCTCTCCGGTGCGCGGATCGGGGTCAGGGGTCAGCCGCGGGGCCCTCAGGATG
CTCCATGTTTTCGCCCCCCTCTTGCGCCCGCGCCTGGGGCGGGGCGGGGCCGGCCTGGCC
GGGAGGGGGCCGGGGCCGCGGCAGGTAGGGCCGGCCGCGGGCTGAGCGCGCCTGGTGTGG
GTCTGCAGCGGGAGCCTCAGCAACCTGCTCTTCCGCTGCTCGCTCCCGGACCACCTGCCC
AGCGTTGGCGAGGAGCCCCGGGAGGTGCTTCTGCNGCTGTACGGAGCCATCTTGCANNGT
GAGGGGTTGTGAGCGCCGCAGCACCAGTGGCTTTAGGGCCTGTCGCTTACGCGATGCGGG
TAGTATTGGTCCCGTTGCGCAGTTGAGGACACCGAGTTCACGGTCTGAGTAACACTCATT
ACACGAAGGCTGGGGCTGTATCCCAGAGCTTTNGGAGCTGNAGGAGAGGATCACTG

Restriction Sites: NotI-NotI

ACCN: NM_152253

Insert Size: 2500 bp

OTI Disclaimer: Our molecular clone sequence data has been matched to the reference identifier above as a point of reference. Note that the complete sequence of our molecular clones may differ from the sequence published for this corresponding reference, e.g., by representing an alternative RNA splicing form or single nucleotide polymorphism (SNP).

Components: The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

Reconstitution Method:
1. Centrifuge at 5,000xg for 5min.
2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.

RefSeq: NM_152253.1, NP_689466.1

RefSeq Size: 4914 bp

RefSeq ORF: 384 bp

Locus ID: 1120

Cytogenetics: 22q13.33

Domains: Carn_acyltransf

Protein Families: Druggable Genome

Protein Pathways: Glycerophospholipid metabolism, Metabolic pathways

Gene Summary: Choline kinase (CK) and ethanolamine kinase (EK) catalyze the phosphorylation of choline/ethanolamine to phosphocholine/phosphoethanolamine. This is the first enzyme in the biosynthesis of phosphatidylcholine/phosphatidylethanolamine in all animal cells. The highly purified CKs from mammalian sources and their recombinant gene products have been shown to have EK activity also, indicating that both activities reside on the same protein. The choline kinase-like protein encoded by CHKL belongs to the choline/ethanolamine kinase family; however, its exact function is not known. Read-through transcripts are expressed from this locus that include exons from the downstream CPT1B locus. [provided by RefSeq, Jun 2009]
Transcript Variant: This variant (2) contains alternate segments in the coding region which causes a frameshift, compared to variant 1. The resulting protein (isoform b) is shorter and has a distinct C-terminus than isoform a. In addition, this variant is bicistronic, with the coding region of a carnitine palmitoyltransferase gene present in the 3' end of the transcript.