

## Product datasheet for **MC225320**

### Acacb (NM\_133904) Mouse Untagged Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	Acacb (NM_133904) Mouse Untagged Clone
Tag:	Tag Free
Symbol:	Acacb
Synonyms:	Acc2; Accb; AI597064; AW743042
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Cell Selection:	Neomycin
Fully Sequenced ORF:	>MC225320 representing NM_133904 Red=Cloning site Blue=ORF Orange=Stop codon

TTTTGTAATACGACTCACTATAGGGCGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**CGATCGCC**

ATGGTCTTGCTTCTTTCTGACTTGCCTGGTTTTCTCCTGCCTGACCTTTCTGGCTAAAAATCTGGG  
GGAAGATGACAGACTCGAAGCCGCTCACCAACAGTAAGGTGGAAGCCAATCTCCTTTCAAGCGAGGAGTC  
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AGAGGCGCACCAGAAGATCATTGAGGAGGCTCCGGCCACCATCGCCGCGCCTGCCGTGTTTGGTTTCAT  
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 CCATCAAAGTCTGGTCCAAGAACATCCAGAGGTATCATGGACTGCGTGGCCTACCTGACCCAGCACCT  
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ACGCGTACGCGGCCGCTCGAGCAGAAAACCTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT  
 ACAAGGATGACGACGATAAGGTTTAA

**Restriction Sites:**

Sgfl-Mlul

**ACCN:**

NM\_133904

**Insert Size:**

7347 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\\_133904.2](#), [NP\\_598665.2](#)

**RefSeq Size:** 8497 bp

**RefSeq ORF:** 7347 bp

**Locus ID:** 100705

**UniProt ID:** [E9Q4Z2](#)

**Cytogenetics:** 5 F

**Gene Summary:** Catalyzes the ATP-dependent carboxylation of acetyl-CoA to malonyl-CoA (By similarity). Carries out three functions: biotin carboxyl carrier protein, biotin carboxylase and carboxyltransferase (By similarity). Involved in inhibition of fatty acid and glucose oxidation and enhancement of fat storage (PubMed:11283375, PubMed:12920182, PubMed:15677334, PubMed:18487439, PubMed:22362781). May play a role in regulation of mitochondrial fatty acid oxidation through malonyl-CoA-dependent inhibition of carnitine palmitoyltransferase 1 (PubMed:10677481).[UniProtKB/Swiss-Prot Function]