

Product datasheet for **RN201484**

Sptlc1 (NM_001108406) Rat Untagged Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Sptlc1 (NM_001108406) Rat Untagged Clone
Tag:	Tag Free
Symbol:	Sptlc1
Synonyms:	Lcb1; RGD1306617; Spt1
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Cell Selection:	Neomycin



[View online »](#)

Fully Sequenced ORF: >RN201484 representing NM_001108406
 Red=Cloning site Blue=ORF Orange=Stop codon

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGGATCGCC**

ATGGCGACGGTGGCGGAGCAGTGGGTGCTGGTGGAGATGGTGCAGCGCTGTACGAGGCTCCAGCATAACC
 ATCTAATTCTGGAAGGAATCCTCATACTTTGGATAATCAGACTCGTTTTCTCTAAAACCTACAAGTTGCA
 GGAGCGTTCTGACCTTACAGCCAAGGAAAAGGAAGAACTGATTGAAGAATGGCAGCCAGAGCCCTCGTC
 CCCCCGGTCTCCAGGAACCATCCTGCTCTCAACTACAACATCGTCTCCGGCCCTCCAACCATAACATCG
 TGGTGAACGGAAGAGTGTGTCAACTTTCCTCCTTTAATTTCTCGGGTTGCTGGCAACCTCGGGT
 TAAGGCTCGCGCTTTTGCATCATTAAAGAAGTACGGCGTGGGTACCTGTGGTCCCAGAGGGTTTTATGGC
 ACATTTGATGTCCATCTGGATTTGGAAGAGCGCTGGCAAAGTTTATGAAGACCGAAGAAGCTATCATT
 ACTCCTATGGCTTCTCCACCATAGCCAGTGCATTCTGCGTACTCTAAGAGAGGGGACATTGTTTTTGT
 GGACAGTGCAGCCTGCTTTGCTATCCAGAAAGGACTACAGGCATCACGCAGTGACATTAAGTTATCAAG
 CACAATGACGTAGCTGACCTGGAGCGACTGCTAAAAGAACAAGAGATTGAAGATCAAAGAATCCTCGAA
 AGGCCCGTGTGACTCGGCGATTATCGTCGCGGAAGGATTGTATATGAACACTGGAACCATCTGCCCTCT
 TCCAGAACTGGTGAAGTTAAAGTATAAATACAAAGCAAGGATCTTCTGGAGGAGAGCCTGTCTGGGA
 GTCCTTGGGGAGCATGGGCGAGGAGTACCCGAGCACTATGGGATCAGTATTGACGACATCGACCTTATCA
 GTGCTAACATGGAGAATGCGCTCGCTTCTGTTGGGGGCTTCTGCTGTGGCCGCTCTTTCGTGGTTGACCA
 TCAGCGGCTCTCTGGCCAAGGATACTGCTTTTCAGCTTCACTGCCCCCTGCTAGCCGCTGCCGCCATT
 GAGGCCCTCAACATCATGGAGGAGAACCAGGGATTTTTCAGTTTTAAAGAAAAAGTCCAGACCATCC
 ACAAGTCCCTACAAGGGTTTCCGGTTTAAAAGTGGTGGGGAGTCCCTTTGCCAGCGCTTCAACCTCCA
 GCTGGAAGAGAGCACGGGCTCTCGGAGAGAGATATGAAGCTGCTTCAGGAGATTGTAGACAATGCATG
 AATAAGGGCATCGCATTGACTCAGGCACGCTACTTGGACAAAGAGAAGTGCCTTCTCCTCCAAGCA
 TCAGGGTTGTGGTACCCTGGAGCAGACAGCAAGAGCTGCAGAGGGTGCAGCCACCATCAGGGAGGC
 GGCCAGGCTGTGCTTTT**GTAG**

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
 ACAAGGATGACGACGATAAGGTTTAA

- Restriction Sites:** SgfI-MluI
- ACCN:** NM_001108406
- Insert Size:** 1422 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_001108406.1](#), [NP_001101876.1](#)

RefSeq Size: 3034 bp

RefSeq ORF: 1422 bp

Locus ID: 361213

UniProt ID: [D4A2H2](#)

Cytogenetics: 17p14

Gene Summary: Serine palmitoyltransferase (SPT). The heterodimer formed with SPTLC2 or SPTLC3 constitutes the catalytic core. The composition of the serine palmitoyltransferase (SPT) complex determines the substrate preference. The SPTLC1-SPTLC2-SPTSSA complex shows a strong preference for C16-CoA substrate, while the SPTLC1-SPTLC3-SPTSSA isozyme uses both C14-CoA and C16-CoA as substrates, with a slight preference for C14-CoA. The SPTLC1-SPTLC2-SPTSSB complex shows a strong preference for C18-CoA substrate, while the SPTLC1-SPTLC3-SPTSSB isozyme displays an ability to use a broader range of acyl-CoAs, without apparent preference (By similarity). Required for adipocyte cell viability and metabolic homeostasis (By similarity).[UniProtKB/Swiss-Prot Function]