

Product datasheet for **SC113181**

SPHK2 (NM_020126) Human Untagged Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	SPHK2 (NM_020126) Human Untagged Clone
Tag:	Tag Free
Symbol:	SPHK2
Synonyms:	SK-2; SK 2; SPK-2; SPK 2
Mammalian Cell Selection:	None
Vector:	<u>pCMV6-XL4</u>
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

Fully Sequenced ORF: >OriGene ORF within SC113181 sequence for NM_020126 edited (data generated by NextGen Sequencing)

```

ATGAATGGACACCTTGAAGCAGAGGAGCAGCAGGACCAGAGGCCAGACCAGGAGCTGACC
GGGAGCTGGGGCCACGGGCTAGGAGCACCTGGTCAGGGCTAAGGCCATGGCCCCGCC
CCACCGCCACTGGCTGCCAGCACCCGCTCCTCCATGGCGAGTTGGCTCCTACCCAGCC
CGAGGCCACGCTTTGCCCTCACCTTACATCGCAGGCCCTGCACATACAGCGGCTGCGC
CCCAAACCTGAAGCCAGGCCCGGGTGGCCTGGTCCCCTGGCCGAGGTCTCAGGCTGC
TGCACCCTGCGAAGCCGAGCCCTCAGACTCAGCGGCCTACTTCTGCATCTACACCTAC
CCTCGGGGCCGGCGGGGCCCGGCGCAGAGCCACTCGCACCTTCCGGGCAGATGGGGCC
GCCACCTACGAAGAGAACCCTGCCGAGGCCAGCGCTGGGCCACTGCCCTCACCTGTCTG
CTCCGAGGACTGCCACTGCCCGGGATGGGGAGATCACCCCTGACCTGCTACCTCGGCCG
CCCCGGTTGCTTCTATTGGTCAATCCCTTTGGGGTGGGGCCTGGCCTGGCAGTGGTGT
AAGAACCACGTGCTTCCCATGATCTCTGAAGCTGGGCTGTCTTCAACCTCATCCAGACA
GAACGACAGAACCACGCCGGGAGCTGGTCCAGGGGCTGAGCCTGAGTGAGTGGGATGGC
ATCGTCACGGTCTCGGGAGACGGGCTGCTCCATGAGGTGCTGAACGGGCTCCTAGATCGC
CCTGACTGGGAGGAAGCTGTGAAGATGCCTGTGGGCATCCTCCCCGCGCTCGGGCAAC
GCGCTGGCCGGAGCAGTGAACCAGCACGGGGGATTTGAGCCAGCCCTGGGCCCTCGACCTG
TTGCTCAACTGCTCACTGTTGCTGTGCCGGGTGGTGGCCACCCACTGGACCTGCTCTCC
GTGACGCTGGCCTCGGGCTCCCGCTGTTTCTCCTTCTGTCTGTGGCCTGGGGCTTCGTG
TCAGATGTGGATATCCAGAGCGAGCGCTTACAGGCCTTGGGCAGTGCCCGCTTACACTG
GGCAGGTGCTGGGCCTCGCCACACTGCACACCTACCGCGGACGCCTCTCCTACCTCCCC
GCCACTGTGGAACCTGCCTCGCCACCCCTGCCATAGCCTGCCTCGTGCCAAGTCGGAG
CTGACCCTAACCCAGACCCAGCCCGCCATGGCCCACTCACCCCTGCATCGTTCTGTG
TCTGACCTGCCTTCCCCCTGCCCCAGCCTGCCCTGGCCTCTCCTGGCTCGCCAGAACC
CTGCCCATCCTGTCCCTAACGGTGGGGGCCAGAGCTGGCTGGGACTGGGGTGGGGCT
GGGGATGCTCCGCTGTCCCCGGACCCACTGCTGTCTTACCTCCTGGCTCTCCAAGGCA
GCTCTACACTCACCCGTCTCCGAAGGGGCCCGTAATCCCCCATCCTCTGGGCTCCCA
CTTCCCACCCCTGATGCCCGGTAGGGGCTCCACCTGCGGCCCGCCGACCACCTGCTG
CCTCCGCTGGGCACCCGCTGCCCCAGACTGGGTGACGCTGGAGGGGACTTTGTGCTC
ATGTTGGCCATCTCGCCAGCCACCTAGGCGCTGACCTGGTGGCAGCTCCGCATGCGCGC
TTCGACGACGGCCTGGTGCACCTGTGCTGGGTGCGTAGCGGCATCTCGCGGGCTGCGCTG
CTGCGCCTTTTCTTGCCATGGAGCGTGGTAGCCACTTACGCCTGGGCTGTCCGCAGCTG
GGTACGCCCGGGCCCGTGCCTTCCGCCTAGAGCCGCTCACACCACGGCGGTGCTCACA
GTGGACGGGGAGCAGGTGGAGTATGGGCCGCTACAGGCACAGATGCACCCTGGCATCGGT
ACACTGCTCACTGGGCCTCCTGGCTGCCCGGGCGGGAGCCCTGA

```

Clone variation with respect to NM_020126.4

5' Read Nucleotide Sequence:

>OriGene 5' read for NM_020126 unedited
 TCACATTTGTATACGACTCATATAGGCGGCCGNAATTCGGCACCAGCCGGAGACCCGG
 CCGGCCAGTGTGGAGAGCTGAAGGTCAGGCCAGGACAGTGAGACCTGACTCCTTGCTC
 CTACCAGCCTACTATGGCTTAAGACCCAGGGCCAGGGTCCCGTTGATGTAACAGAGCAGA
 GGACCAGCAGATGAATGGACACCTTGAAGCAGAGGAGCAGCAGGACCAGAGGCCAGACCA
 GGAGCTGACCCGGGAGCTGGGGCCACGGGCTAGGAGCACCCCTGGTCAGGGCTAAGGCCAT
 GGCCCCGCCCCACCCGCACTGGCTGCCAGCACCCCGCTCCTCCATGGCGAGTTTGGCTC
 CTACCCAGCCCGAGGCCACGCTTTGCCCTCACCCCTACATCGCAGGCCCTGCACATACA
 GCGGCTGCGCCCCAAACCTGAAGCCAGGCCCGGGTGGCCTGGTCCCGTTGGCCGAGGT
 CTCAGGCTGCTGCACCCTGCGAAGCCGAGCCCTCAGACTCAGCGGCCTACTTCTGCAT
 CTACACCTACCCTCGGGCCGGCGGGGCCGGCGCAGAGCCACTCGCACCTTCCGGGC
 AGATGGGGCCGCCACCTACGAAGAGAACCGTGCCGAAGCCAGCGCTGGGCCACTGCCCT
 CACCTGTCTGCTCCGAGGACTGCCACTGCCCGGGGATGGGGAGATCACCCCTGACCTGCT
 ACCTCGGCCGCCCGGTTGCTTCTATTGGTCAATCCCTTTGGGGTGGGGCCTGGCCTG
 GCAGTGGTGAAGAAACAGTGTCTCCCATGATCTCTGAAGCTGGGCTGGTCTTCAAAC
 CATCCAGACAGAACGACAGAACCAGCCGGGAGCCTGGTCANGGCTGAACCTGGATGAG
 TGGATGGCATCGTACGGTCTCGGAAACGGCTGCTCATGAGTATTGA

3' Read Nucleotide Sequence:

>OriGene 3' read for NM_020126 unedited
 AGCTTGTACGCGCCGATTCTANATCGAGTTTTTTTTTTTTTTTTTTTGGAGGAATGAA
 GCGACTGCCTTTATTGCATAGACCTTTTCAATTGCTTTTTAGATTGGGGACGGAGACGC
 GCATGAGACGAACAGGGATATGAATTTCCCGCCCCACCCGCGGGGAGAGGAACATTA
 GTGCAAACTCTAGCGCCGCCCGGGAACTGCCCTCCTGGGCTGATTGGCCAGCTAA
 ATGGAGGCACCGAGTGGATGGGGCAGGCTGCGGGCCCTGACCGGCCGACTCACTGAGG
 CCTACCCAGCCAGTACATTCCAGGTCCTGTATTGGGCGACGCGTAAAAAGACTCCGC
 CCTCAGCCATCCTGGCCGGTAGGAGCAGGTGGCAAGCGTCAGGACTGAGCCCTGCCCGG
 TAAGGGCGGCCCCAGATCAGACGCCAGGCCCGCCCTCATTGATCAGGCACTACCTCGG
 GACGAGCCATTTCTCTTAACCGTGACGACGCCACCTCCAGCATCACGTCTGGTCCC
 ATGAAAGCGAGCGCAATCCTGAGACGGGGCCAGGGCCCTGCCACCACAACCTAGCAGC
 CAGGCCACACCCNCTAGCTCAGGCTCCGCCCATTTGGAATGTANGCCCCGCCCGCGG
 GTACAAGCTTGGTTAGTTTCAAGGCTCCCGCCCCGGGCAGCCAGNAGGCCAGTGAGCAG
 TGTACCGATGCCAGGTCATCTGTGCCTGTAGCGCCATACTCCAACCTGCTCCCGTCC
 ACTGTGAGCAGCCGCGTGTGTGAGCGGCTTAGGCGGAGGGCCAGGGCCGGGGCGTATC
 CCACCTGGCGACAGCCAGGCTGGAGTGGGCTACCACGCTCCATGGCCAAAAAAGGCGC
 AGCAACGCAGCCCCGCGAGATGCCGCTACGCACCCAGCCAGGTGCACCAAGCCGTCGTCG
 AACG

Restriction Sites:

NotI-NotI

ACCN:

NM_020126

Insert Size:

2900 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:	<ol style="list-style-type: none">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_020126.3 , NP_064511.2
RefSeq Size:	3012 bp
RefSeq ORF:	1965 bp
Locus ID:	56848
UniProt ID:	Q9NRA0
Cytogenetics:	19q13.33
Domains:	DAGKc
Protein Families:	Druggable Genome
Protein Pathways:	Calcium signaling pathway, Fc gamma R-mediated phagocytosis, Metabolic pathways, Sphingolipid metabolism, VEGF signaling pathway
Gene Summary:	<p>This gene encodes one of two sphingosine kinase isozymes that catalyze the phosphorylation of sphingosine into sphingosine 1-phosphate. Sphingosine 1-phosphate mediates many cellular processes including migration, proliferation and apoptosis, and also plays a role in several types of cancer by promoting angiogenesis and tumorigenesis. The encoded protein may play a role in breast cancer proliferation and chemoresistance. Alternatively spliced transcript variants encoding multiple isoforms have been observed for this gene. [provided by RefSeq, Aug 2011]</p> <p>Transcript Variant: This variant (1) represents the longest transcript and encodes the longest isoform (a). Variants 1 and 3 both encode the same isoform (a).</p>