

Product datasheet for **SC338112**

TRPM7 (NM_001301212) Human Untagged Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	TRPM7 (NM_001301212) Human Untagged Clone
Tag:	Tag Free
Symbol:	TRPM7
Synonyms:	ALSPDC; CHAK; CHAK1; LTrpC-7; LTRPC7; TRP-PLIK
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Fully Sequenced ORF:	>NCBI ORF sequence for NM_001301212, the custom clone sequence may differ by one or more nucleotides

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ATGTCCCAGAAATCCTGGATAGAAAGCACTTTGACCAAGAGGGAATGTGTATATATTATACCAAGTTCCA
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TAATAGTCTTGGTGGAAATAATCGGAGGTCTGGCCGAAATACCTCCAGCAGCACTCCTCAGTTGCCAAAG
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 TTTTCTGCTGTATTGCCATTACAGCAGGACAGTGGTTTGTGTGGAAAGATGTATGACTGGAGAATTTAG
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AGCCACTGGACTTACGAATATACAAGAGGGGAGTTACTGGTACTTGATTTGCAAGGTGTTGGTGAAAATT
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ATCTTCAGCCTGGAAATCCACCAAAGAATCAGAATCACTAATTCTGTTCTGTCTGATGTTATAA
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Restriction Sites:	Sgfl-Mlul
ACCN:	NM_001301212
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_001301212.1 , NP_001288141.1
RefSeq Size:	10409 bp
RefSeq ORF:	5595 bp
Locus ID:	54822
UniProt ID:	Q96QT4
Cytogenetics:	15q21.2
Protein Families:	Druggable Genome, Ion Channels: Transient receptor potential, Protein Kinase, Transmembrane

Gene Summary:

This gene belongs to the melastatin subfamily of transient receptor potential family of ion channels. The protein encoded by this gene is both an ion channel and a serine/threonine protein kinase. The kinase activity is essential for the ion channel function, which serves to increase intracellular calcium levels and to help regulate magnesium ion homeostasis. The encoded protein is involved in cytoskeletal organization, cell adhesion, cell migration and organogenesis. Defects in this gene are a cause of amyotrophic lateral sclerosis-parkinsonism/dementia complex of Guam. The gene may also be associated with defects of cardiac function. [provided by RefSeq, Aug 2017]

Transcript Variant: This variant (2) uses an alternate in-frame splice site in the 3' coding region, compared to variant 1, resulting in an isoform (b) that is 1 aa shorter than isoform a. Sequence Note: This RefSeq record was created from transcript and genomic sequence data to make the sequence consistent with the reference genome assembly. The genomic coordinates used for the transcript record were based on transcript alignments.