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 RC209251

SnoN (SKIL) (NM_005414) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	SnoN (SKIL) (NM_005414) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	SnoN
Synonyms:	SNO; SnoA; SnoI; SnoN
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)

ORF Nucleotide Sequence:

>RC209251 representing NM_005414
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCCGCGATCGCC

ATGGAAAACCTCCAGACAAATTTCTCCTTGGTTCAGGGCTCAACTAAAAAACTGAATGGGATGGGAGATG
ATGGCAGCCCCCCAGCGAAAAAAATGATAACGGACATTCATGTAAATGGAAAAACGATAAACAAGGTGCC
AACAGTTAAGAAGGAACACTTGGATGACTATGGAGAAGCACCAGTGGAAACTGATGGAGAGCATGTTAAG
CGAACCTGTACTTCTGTTCCTGAAACTTTGCATTTAAATCCCAGTTTGAAACACACATTGGCACAATTCC
ATTTAAGTAGTCAGAGCTCGCTGGGTGGACCAGCAGCATTTTCTGCTCGGCATTCCCAAGAAAGCATGTC
GCCTACTGTATTTCTGCCTCTTCCATCACCTCAGGTTCTTCCTGGCCCATTGCTCATCCCTTCAGATAGC
TCCACAGAACTCACTCAGACTGTGTTGGAAGGGGAATCTATTTCTTGTTTTCAAGTTGGAGGAGAAAAGA
GACTCTGTTTGCCCCAAGTCTTAAATTCTGTTCTCCGAGAATTTACACTCCAGCAAATAAATACAGTGTG
TGATGAACTGTACATATATTGTTCAAGGTGTACTTCAGACCAGCTTCATATCTTAAAGGTACTGGGCATA
CTTCCATTCAATGCCCCATCCTGTGGGCTGATTACATTAACTGATGCACAAAGATTATGTAATGCTTTAT
TGCGGCCACGAACTTTTCCTCAAAATGGTAGCGTACTTCCTGCTAAAAGCTCATTGGCCCAGTTAAAGGA
AACTGGCAGTGCCTTTGAAGTTGAGCATGAATGCCTAGGCAAATGTCAGGGTTTATTTGCACCCCAGTTT
TATGTTCAGCCTGATGCTCCGTGTATTCAATGTCTGGAGTGTTGTGGAATGTTTGCACCCCAGACGTTTG
TGATGCATTCTCACAGATCACCTGACAAAAGAACTTGCCACTGGGGCTTTGAATCAGCTAAATGGCATTG
CTATCTTCATGTGAACCAAAAATACTTAGGAACACCTGAAGAAAAGAAACTGAAGATAATTTTAGAAGAA
ATGAAGGAGAAGTTTAGCATGAGAAGTGGAAAGAGAAATCAATCCAAGACAGATGCACCATCAGGAATGG
AATTACAGTCATGGTATCCTGTTATAAAGCAGGAAGGTGACCATGTTTCTCAGACACATTCATTTTTACA
CCCCAGCTACTACTTATACATGTGTGATAAAGTGGTTGCCCCAAATGTGTCACTTACTTCTGCTGTATCC
CAGTCTAAAGAGCTCACAAAGACAGAGGCAAGTAAGTCCATATCAAGACAGTCAGAGAAGGCTCACAGTA
GTGGTAAACTTCAAAAAACAGTGTCTTATCCAGATGTCTCACTTGAGGAACAGGAGAAAATGGATTTAAA
AACAAGTAGAGAATTATGTAGCCGTTTAGATGCATCAATCTCAAATAATTCTACAAGTAAAAGGAAATCT
GAGTCTGCCACTTGCAACTTAGTCAGAGACATAAACAAAGTGGGAATTGGCCTTGTTGCTGCCGCTTCAT
CTCCGCTTCTTGTGAAAGATGTCATTTGTGAGGATGATAAGGGAAAAATCATGGAAGAAGTAATGAGAAC
TTATTTAAAACAACAGGAAAAACTAAACTTGATTTTGCAAAAGAAGCAACAACTTCAGATGGAAGTAAAA
ATGTTGAGTAGTTCAAAATCTATGAAGGAACTCACTGAAGAACAGCAGAATTTACAGAAAGAGCTTGAAT
CTTTGCAGAATGAACATGCTCAAAGAATGGAAGAATTTTATGTTGAACAGAAAGACTTAGAGAAAAAATT
GGAGCAGATAATGAAGCAAAAATGTACCTGTGACTCAAATTTAGAAAAAGACAAAGAGGCTGAATATGCA
GGACAGTTGGCAGAACTGAGGCAGAGATTGGACCATGCTGAGGCCGATAGGCAAGAACTCCAAGATGAAC
TCAGACAGGAACGGGAAGCAAGACAGAAGTTAGAGATGATGATAAAAGAGCTAAAGCTGCAAATTCTGAA
ATCATCAAAGACTGCTAAAGAA

ACGCGTACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence:

>RC209251 representing NM_005414
Red=Cloning site Green=Tags(s)

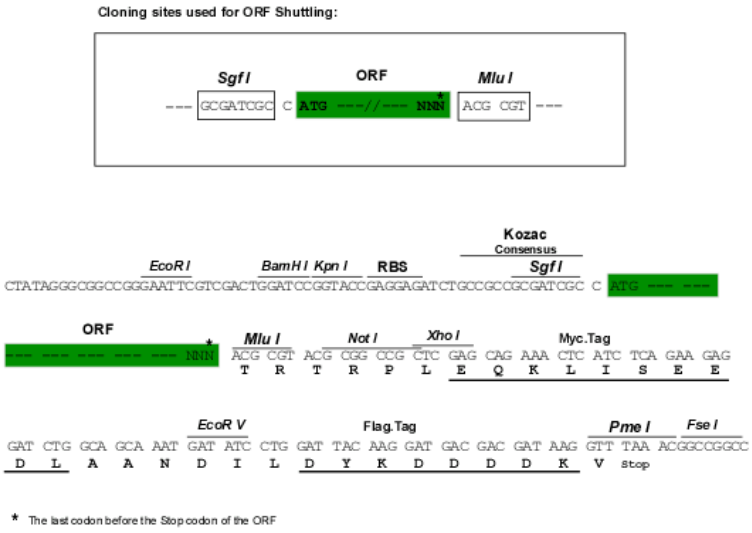
MENLQTNFSLVQGSTKKLNGMGDDGSPPAKKMITDIHVNGKTINKVPTVKKEHLDDYGEAPVETDGEHVK
RTCTSVPETLHLNPSLKHTLAQFHLSSQSSLGGPAAFSARHSQESMSPTVFLPLPSPQVLPGPLLIPSDS
STELTQTVLEGESISCFQVGGEKRLCLPQVLNSVLREFTLQQINTVCDELYIYCSRCTSDQLHILKVLGI
LPFNAPSCGLITLTDAQRLCNALLRPRTFPQNGSVLPAKSSLAQLKETGSAFEVEHECLGKCQGLFAPQF
YVQPDAPCIQCLECCGMFAPQTFVMHSHRSPDKRTCHWGFESAKWHCYLHVNQKYLGTPEEKKLKIILEE
MKEKFSMRSGKRNQSKTDAPSGMELQSWYPVIKQEGDHVSQTHSFLHPSYYLYMCDKVVAPNVSLTSAVS
QSKELTKTEASKSISRQSEKAHSSGKLQKTVSYPDVSLEEQEKMDLKTSRELCSRLDASISNNSTSKRKS
ESATCNLVRDINKVGIGLVAAASSPLLVKDVICEDDKGKIMEEVMRTYLKQQEKLNLILQKKQQLQMEVK
MLSSSKSMKELTEEQQNLQKELESLQNEHAQRMEEFYVEQKDLEKKLEQIMKQKCTCDSNLEKDKEAEYA
GQLAELRQRLDHAEADRQELQDELRQEREARQKLEMMIKELKLQILKSSKTAKE

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Chromatograms: https://cdn.origene.com/chromatograms/mg2598_d01.zip

Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN: NM_005414

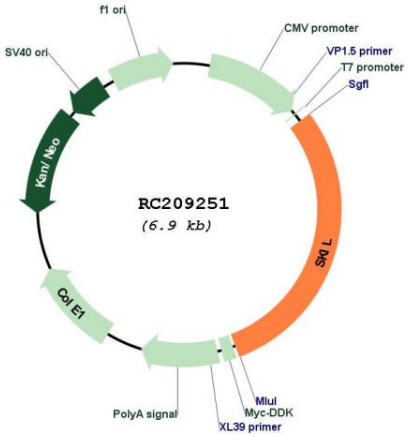
ORF Size: 2052 bp

OTI Disclaimer: The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. More info

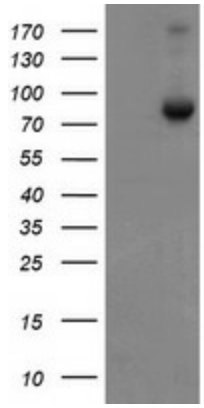
OTI Annotation: This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

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_005414.2, NP_005405.1
RefSeq Size:	3111 bp
RefSeq ORF:	2055 bp
Locus ID:	6498
UniProt ID:	P12757
Cytogenetics:	3q26.2
Domains:	Ski_Sno
Protein Families:	Druggable Genome, Transcription Factors
MW:	76.8 kDa
Gene Summary:	The protein encoded by this gene is a component of the SMAD pathway, which regulates cell growth and differentiation through transforming growth factor-beta (TGFB). In the absence of ligand, the encoded protein binds to the promoter region of TGFB-responsive genes and recruits a nuclear repressor complex. TGFB signaling causes SMAD3 to enter the nucleus and degrade this protein, allowing these genes to be activated. Four transcript variants encoding three different isoforms have been found for this gene. [provided by RefSeq, Oct 2011]

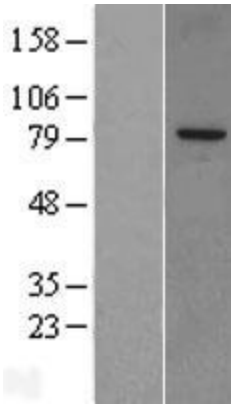
Product images:



Circular map for RC209251



HEK293T cells were transfected with the pCMV6-ENTRY control (Cat# [PS100001], Left lane) or pCMV6-ENTRY SKIL (Cat# RC209251, Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-SKIL(Cat# [TA800171]). Positive lysates [LY417307] (100ug) and [LC417307] (20ug) can be purchased separately from OriGene.



Western blot validation of overexpression lysate (Cat# [LY417307]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from un-transfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC209251 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).