

Product datasheet for MR226496

Wrn (NM_011721) Mouse Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: Wrn (NM_011721) Mouse Tagged ORF Clone
Tag: Myc-DDK
Symbol: Wrn
Synonyms: A1846146
Mammalian Cell Selection: Neomycin
Vector: pCMV6-Entry (PS100001)
E. coli Selection: Kanamycin (25 ug/mL)
ORF Nucleotide Sequence: >MR226496 representing NM_011721
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGATCGCC**

ATGGAACCACCTTCACTACAGCGGAAATTTCCAGAATGGATGTCTATGCAGAGTCAAAGATGTGCTACAG
 AAGAAAAGGCCTGCGTTCAGAAGAGTGTCTTGAAGATAACCTCCCATTCTAGAATTCCTGGATCCAT
 TGTTTACAGTTATGAAGCTAGTGATTGCTCCTCCTGTCTGAAGACATTAGCATGCGTCTGTCTGATGCC
 GATGTGGTGGGATTTGACATGGAATGGCCGCCATATAACAAGCCAGGGAAAAGAAGCAGAGTCGCAGTGA
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CATTTATTGCCGGAACCCAACGCAAAGCAAATTAATTGCCTCAAGACCTATTTCCGACACAGCAGTTTTA
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TCTCCTTCAAGCTAATGAAGAGATGTTTCCAAGGAAAGTTCTGCTACCAAGTTCTAATCCTGTATCTCCA
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CTATATGCCAGGCTGGTGAAGCAAGGCAGAAACAGCTAATAAGATGGATGTACCTCCAGCTATTTTAG
CAACAAACAAGGTTCTGCTGGACATGGCTAAAATGAGACCGACTACTGTTGAAAACATGAAACAGATCGA
CGGTGTCTCTGAAGGCAAAGCTGCTCTGTTGGCCCTCTGTTGGAAGTCATCAACATTTCTGTCAAGTA
ACTAGTGTTCAGACAGACCTCCTTCCAGTGCCAAACCTCACAAGGAACAGGAGAAAAGTCAGGAGATGG
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CTTACACAGCATAGCTGAGAACAGGCTCCTGCCTCTCACAGCAGCCGGCATGCACTTAGCCAGGCGGTG
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AGT

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

OTI Disclaimer: Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in E. coli are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at custsupport@origene.com or by calling 301.340.3188 option 3 for pricing and delivery.

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_011721.4](#), [NP_035851.3](#)

RefSeq Size: 6383 bp

RefSeq ORF: 4206 bp

Locus ID: 22427

UniProt ID: [O09053](#)

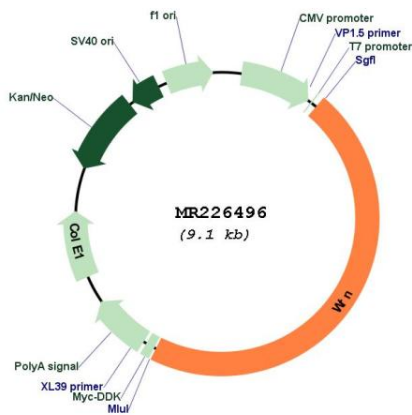
Cytogenetics: 8 20.3 cM

MW: 157.2 kDa

Gene Summary:

Multifunctional enzyme that has both magnesium and ATP-dependent DNA-helicase activity and 3'->5' exonuclease activity towards double-stranded DNA with a 5'-overhang. Has no nuclease activity towards single-stranded DNA or blunt-ended double-stranded DNA. Binds preferentially to DNA substrates containing alternate secondary structures, such as replication forks and Holliday junctions. May play an important role in the dissociation of joint DNA molecules that can arise as products of homologous recombination, at stalled replication forks or during DNA repair. Alleviates stalling of DNA polymerases at the site of DNA lesions. Important for genomic integrity. Plays a role in the formation of DNA replication focal centers; stably associates with foci elements generating binding sites for RP-A (By similarity). Plays a role in double-strand break repair after gamma-irradiation (By similarity). [UniProtKB/Swiss-Prot Function]

Product images:



Circular map for MR226496