

Product datasheet for **SC117235**

FANCG (NM_004629) Human Untagged Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	FANCG (NM_004629) Human Untagged Clone
Tag:	Tag Free
Symbol:	FANCG
Synonyms:	FAG; XRCC9
Mammalian Cell Selection:	None
Vector:	<u>pCMV6-XL4</u>
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

Fully Sequenced ORF: >OriGene ORF within SC117235 sequence for NM_004629 edited (data generated by NextGen Sequencing)

```
ATGTCCCAGCCAGACCTCTGTGGGCTCCAGCTGCCTGGACCTGTGGAGGGAAAAGAAT
GACCGGCTCGTTCGACAGGCCAAGGTGGCTCAGAACTCCGGTCTGACTCTGAGGCGACAG
CAGTTGGCTCAGGATGCACTGGAAGGGCTCAGAGGGCTCCTCCATAGTCTGCAAGGGCTC
CCTGCAGCTGTTCTGTCTTCCCTTGGAGCTGACTGTCACTGCAACTCATTATCCTG
AGGGCAAGCTTGGCCCAGGGTTTACAGAGGATCAGGCCAGGATATCCAGCGGAGCCTA
GAGAGAGTGTGGAGACACAGGAGCAGCAGGGGCCAGGTTGGAACAGGGGCTCAGGGAG
CTGTGGGACTCTGTCTTCTGTGCTTCTGCCTTCTGCCGAGCTGCTGTCTGCCCTGCAC
CGCCTGGTTGGCCTGCAGGCTGCCCTCTGGTTGAGTGCTGACCGTCTTGGGGACCTGGCC
TTGTTACTAGAGACCCTGAATGGCAGCCAGAGTGGAGCCTCTAAGGATCTGCTGTACTT
CTGAAAATTGGAGTCCCCCAGCTGAGGAATTAGATGCTCCATTGACCCTGCAGGATGCC
CAGGGATTGAAGGATGCTCTCTGACAGCATTTCCTACCGCAAGGTCTCCAGGAGCTG
ATCACAGGGAACCCAGACAAGGCACTAAGCAGCCTTCATGAAGCGGCCTCAGGCCTGTGT
CCACGGCTGTGTTGGTCCAGGTGTACACAGCACTGGGGTCTGTACCGTAAGATGGGA
AATCCACAGAGAGCACTGTTGACTTGGTTGCAGCCCTGAAAGAGGGATCAGCCTGGGGT
CCTCCACTTCTGGAGGCCTCTAGGCTCTATCAGCAACTGGGGACACAACAGCAGAGCTG
GAGAGTCTGGAGCTGCTAGTTGAGGCCTTGAATGTCCCATGCAGTTCCAAAGCCCCGAG
TTTCTCATTGAGGTAGAATTACTACTGCCACCCTGACCTAGCCTCACCCTTCATTGT
GGCACTCAGAGCCAGACCAAGCACAATACTAGCAAGCAGGTGCCTACAGACGGGGAGGGCA
GGAGACGCTGCAGAGCATTACTTGGACCTGCTGGCCCTGTTGCTGGATAGCTCGGAGCCA
AGGTTCTCCCCACCCCTCCCTCCAGGGCCCTGTATGCCTGAGGTGTTTTTGGAGGCA
GCGGTAGCACTGATCCAGGCAGGCAGAGCCCAAGATGCCTTGACTCTATGTGAGGAGTTG
CTCAGCCGCACATCATCTCTGCTACCCAAGATGTCCCGGCTGTGGGAAGATGCCAGAAAA
GGAACCAAGGAAGTCCATACTGCCACTCTGGGTCTCTGCCACCACCTGCTTCAGGGC
CAGGCCTGGGTTCAACTGGGTGCCCAAAAAGTGGCAATTAGTGAATTTAGCAGGTGCCTC
GAGCTGCTCTCCGGGCCACACCTGAGGAAAAAGAAACAAGGGGCAGCTTCAACTGTGAG
CAGGGATGTAAGTCAGATGCGGCACTGCAGCAGCTTCGGGCAGCCGCCCTAATTAGTCGT
GGACTGGAATGGGTAGCCAGCGGCCAGGATACCAAAGCCTTACAGGACTCCTCCTCAGT
GTGCAGATGTGCCAGGTAATCGAGACACTTACTTTACCTGCTTCAGACTCTGAAGAGG
CTAGATCGGAGGGATGAGGCCACTGCACCTCTGGTGGAGGCTGGAGGCCAAACTAAGGGG
TCACATGAAGATGCTCTGTGGTCTCTCCCCTGTACCTAGAAAGCTATTTGAGCTGGATC
CGTCCCTCTGATCGTGACGCCTTCTTGAAGAATTTGGGACATCTCTGCCAAAGTCTTGT
GACCTGTAG
```

Clone variation with respect to NM_004629.1

5' Read Nucleotide Sequence:

>OriGene 5' read for NM_004629 unedited
CACATTTTGTAAACGACTCACTTATAGGGCGGCCGATTTCGGCACGAGGTCCGCGAGA
GCCGAGCGGGCCGACCCGCCGGCGTGCAGTGCCTCCAGTCAGACACGACCCCGGCTTCT
AGCCCCGCTAAGCCTGTTTGGGGTTGCTGACTCGTTTCTCCCGAGTTTCCCGGGGAA
CTAACTTTCAAGAGGACCAACCGCAGCCAGAGCTTCGACAGCCCGCCAACAGAGGC
GAGGTTGAGAGCCCGCGGGCCGCGGGGAGAGAGCGTCCCATCTGTCTGAAAGCCTGG
GCGGTGGATTGGGACCCGAGAGAAGCAGGGAGCTCGCGGGGTGCAGAAGTCCCCAG
GCCCTCCCGCTGGGGTTGGGAGCTTGGCAGGCCAGCTTACCCTTCTAAGTCCGCT
TCTGGTCTCCGGGCCAGCCTCGGCCACCATGTCCCGCCAGACCCTCTGTGGGTCCA
GCTGCCTGGACCTGTGGAGGGAAAAGAATGACCGGCTCGTTCGACAGGCCAAGGTGGCTC
AGAACTCCGGTCTGACTCTGAGGCGACAGCAGTTGGCTCAGGATGCACTGGAAGGGCTCA
GAGGGCTCTCCATAGTCTGCAAGGGCTCCCTGCAGCTGTTTCTGTTTCTCCCTGGAGC
TGACTGTACCTGCAACTCATTATCCTGAGGGCAAGCTTGGCCANGGTTTACAGAGG
ATCAGGCCAGGATATCCAGCGGAGCCTANAGAGAGTGTGGAGACACAGGAGCAGCAGG
GGCCCCAGTGGAACAGGNGCTCAGGNAGCTGTGGGACTCTGTCTTCGTGCTTNNCTGCT
TTCTGCGNAGCTGCTGTCTGCCTCCCCNCCTTGTGGCTGCAGCTGCCTCNGNNTT
GGATGCTGACCGNCTTGGGGACCTGGCCCTGNTACTANAAACCTGAATGCAGCCCNAG
TGAGCTCCTTAGGAAATCGCTGGTACT

3' Read Nucleotide Sequence:

>OriGene 3' read for NM_004629 unedited
NTTGCTCTGGACCCGCGCCGAATCTAGGATCGAGTTTTTTTTTTTTTTTTTTAAATAT
GAAATTTTACTCGACAACAGAAAAGGAGAAACAGGAAAAGGTGCCTCGAGCAAAGTCAA
TGACTTGGTGGTGGCAGAGATTGTTTCTCCAAAACGAGAATGGTAGTAAGTGGCAAA
TTTCACAGGCCTACCACCAATCTCACCAGTCCAGGAATTATAGGAATGGTACATTCC
TAATGATGGTGAAGCAGAAAGCCCTCCCCACAGAGAGACAGCCACTGGGGACCCAGCTC
AAGCTCTTCAAAACGTGGCAGCTACAGGTACAAAGACTTTGGCAGAGATGTCGAAATTC
TTCAAGGAAGGCGTCACGATCAGAGGGACGGATCCAGCTCAAATAGCTTTCTAGGTACAG
GGGAGAGACCACAGAGCATCTTCATGTGACCCCTTAGTTGGGCTCCAGCCTCCACCA
AGTGTCTCGATTACCTGGGCACATCTGCACACTGAGGAGGAAGTCTGTAAGGCTTTGGT
ATCCTGGCCGCTGGCTACCCATTCCAGTCCACGACTAATTANGGCGGCTGCCCGAAGCT
GCTGCAGNGCCGATCTGACTTACATNCCTGCTCACAGTTGAAAGCTGCCCTTGGTCTT
TTNTCTCCAGTGTGGCCGAAGAGCAACTCGAGGCACCTGCTAAATCACTAATTGGCCCT
TTTTGGGACCCAGTTGAAACCCAGCCTTGCCTGTAGCACGGGGTTGGNCAAAAACC
AAAAATGGGCGAAAGGGGAGTCCCTTGGTCCCTTTTTGGGCATTTCCCACGCCGGAC
ATTTTTGGGTACAAAAAAGATGGGCCGTTGACACACCCTCCCTAAGTAAAGCATT

Restriction Sites:

NotI-NotI

ACCN:

NM_004629

Insert Size:

2550 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_004629.1](#), [NP_004620.1](#)

RefSeq Size: 2649 bp

RefSeq ORF: 1869 bp

Locus ID: 2189

UniProt ID: [O15287](#)

Cytogenetics: 9p13.3

Domains: TPR

Protein Families: Druggable Genome

Gene Summary: The Fanconi anemia complementation group (FANC) currently includes FANCA, FANCB, FANCC, FANCD1 (also called BRCA2), FANCD2, FANCE, FANCF, FANCG, FANCI, FANCI (also called BRIP1), FANCL, FANCM and FANCN (also called PALB2). The previously defined group FANCH is the same as FANCA. Fanconi anemia is a genetically heterogeneous recessive disorder characterized by cytogenetic instability, hypersensitivity to DNA crosslinking agents, increased chromosomal breakage, and defective DNA repair. The members of the Fanconi anemia complementation group do not share sequence similarity; they are related by their assembly into a common nuclear protein complex. This gene encodes the protein for complementation group G. [provided by RefSeq, Jul 2008]