

Product datasheet for TP762539

OriGene Technologies, Inc.

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MLH1 (NM_000249) Human Recombinant Protein

Product data:

Product Type: Recombinant Proteins

Description: Purified recombinant protein of Human mutL homolog 1, colon cancer, nonpolyposis type 2

(E. coli) (MLH1), transcript variant 1, 50ug

Species: Human Expression Host: E. coli

Expression cDNA Clone

or AA Sequence:

A DNA sequence encoding the region full length of MLH1

Tag: N-GST and C-HIS

Predicted MW: 84.6 kDa

Concentration: $>0.05 \mu g/\mu L$ as determined by microplate BCA method

Purity: > 80% as determined by SDS-PAGE and Coomassie blue staining

Buffer: 50mM Tris, pH8.0, 8M Urea

Storage: Store at -80°C after receiving vials.

Stability: Stable for at least 1 year from receipt of products under proper storage and handling

conditions. Avoid repeated freeze-thaw cycles.

RefSeq: NP 000240

 Locus ID:
 4292

 UniProt ID:
 P40692

 RefSeq Size:
 2662

 Cytogenetics:
 3p22.2

 RefSeq ORF:
 2268

Synonyms: COCA2; FCC2; hMLH1; HNPCC; HNPCC2; MMRCS1





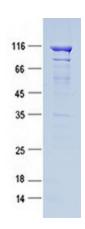
Summary:

The protein encoded by this gene can heterodimerize with mismatch repair endonuclease PMS2 to form MutL alpha, part of the DNA mismatch repair system. When MutL alpha is bound by MutS beta and some accessory proteins, the PMS2 subunit of MutL alpha introduces a single-strand break near DNA mismatches, providing an entry point for exonuclease degradation. The encoded protein is also involved in DNA damage signaling and can heterodimerize with DNA mismatch repair protein MLH3 to form MutL gamma, which is involved in meiosis. This gene was identified as a locus frequently mutated in hereditary nonpolyposis colon cancer (HNPCC). [provided by RefSeq, Aug 2017]

Protein Families: Druggable Genome

Protein Pathways: Colorectal cancer, Endometrial cancer, Mismatch repair, Pathways in cancer

Product images:



Coomassie blue staining of purified MLH1 protein (Cat #TP762539). The protein was produced from E.coli.