SANTA CRUZ BIOTECHNOLOGY, INC.

MLH1 (yL-18): sc-27472



BACKGROUND

Yeast MLH1 protein is required for mismatch repair in mitosis and meiosis, postmeiotic segregation and spore viability. MLH1 forms a complex with Pms1 and Msh2 to repair mismatched DNA. Germline mutations in the human homolog DNA mismatch repair (MMR) genes MSH2 and MLH1 are responsible for the majority of hereditary non-polyposis colorectal cancer (HNPCC), an autosomal-dominant early-onset cancer syndrome. MLH1-PMS1 binds short DNA substrates with low affinity and with a slight preference for single-stranded DNA and binds longer duplex DNA molecules with a higher affinity.

REFERENCES

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- Pavlov, Y.I., et al. 2003. Evidence for preferential mismatch repair of lagging strand DNA replication errors in yeast. Curr. Biol. 13: 744-748.
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SOURCE

MLH1 (yL-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the N-terminus of MLH1 of *Saccharomyces cerevisiae* origin.

PRODUCT

Each vial contains 200 μg lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-27472 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

RESEARCH USE

For research use only, not for use in diagnostic procedures.

APPLICATIONS

MLH1 (yL-18) is recommended for detection of MLH1 of *Saccharomyces cerevisiae* origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Molecular Weight of MLH1: 85 kDa.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker[™] compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker[™] Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048.

STORAGE

Store at 4° C, **D0 NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.