

PMS-2 (Clone EP51) Rabbit Monoclonal Antibody

Specificity: Human. Others not known

Immunogen: A synthetic peptide corresponding to residues in human PMS2 aa 1-100

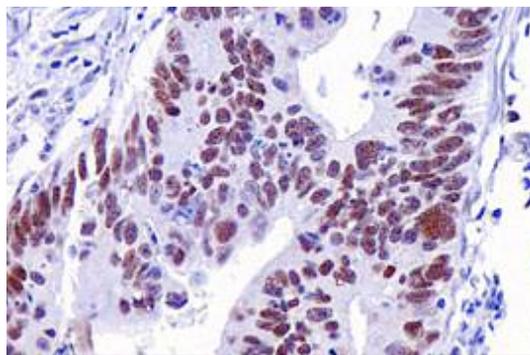
Ig Class: Rabbit IgG

Storage: Store vial at 4°C. When stored at 2-8°C, this antibody is stable for 24 months

Staining procedures: Use formalin-fixed and paraffin-embedded sections. *Retrieval conditions:* Pretreatment of deparaffinized tissue with heat-induced epitope retrieval is recommended. *Detection methods:* Polymer anti-mouse/rabbit Ig detection system. *Working dilution:* 1:20; *Positive Control:* Colon. *Cellular Localization:* Nuclear. *Intended Use:* In vitro diagnosis (IVD).

Description: Microsatellite instability (MSI) is characterized by genome-wide alterations in short, repetitive DNA sequences. It is caused by defects in the nucleotide mismatch repair (MMR) system. Biologically, defective MMR results in a general increase in the mutation rate and the development of a “mutator phenotype.” In colorectal cancer (CRC), high-level MSI was first described in tumors from patients with hereditary non-polyposis colorectal cancer (HNPCC). In about 70% of cases, the HNPCC syndrome develops as a result of an inherited germline mutation of one allele, followed by a somatic mutation of the other allele in one of several mismatch repair genes: hMSH2, hMLH1, hPMS1, hPMS2, hMSH6, and hMLH3. Ninety-five percent of the mutations occur in hMSH2 or hMLH1. Most colorectal carcinomas are thought to be of the chromosomal unstable (CIN) or microsatellite stable (MSS) genotype. However, approximately 15% are thought to be of the MSI genotype, of which the HNPCC cases represent less than one-third. The MSS and MSI tumors also seem to differ in clinicopathologic features. The MSI tumors are more often located in the proximal colon and may be synchronous. The patients with MSI-type colorectal carcinomas are generally thought to have a better prognosis than patients with MSS-type colorectal carcinomas.

Supplied As: Culture supernatant in 0.2% BSA and 15mM sodium azide.



Formalin-fixed, paraffin-embedded human colon adenocarcinoma stained with anti-PMS-2 antibody using peroxidase-conjugate and DAB chromogen. Note nuclear staining of tumor cells

Cat. #Z2270 (1.0 ml)