

Anti-MGMT Antibody

Catalog # AP95946

Product Information

Application	WB, IHC, FC, IF/IC
Primary Accession	P16455
Reactivity	Human
Host	Mouse
Clonality	Monoclonal
Calculated MW	21646

Additional Information

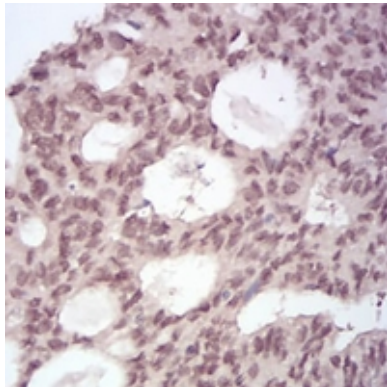
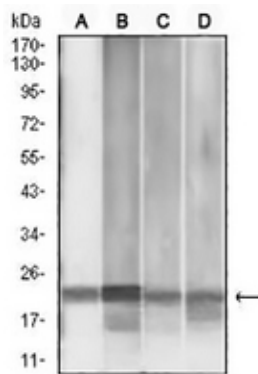
Gene ID	4255
Other Names	Methylated-DNA--protein-cysteine methyltransferase; 6-O-methylguanine-DNA methyltransferase; MGMT; O-6-methylguanine-DNA-alkyltransferase
Target/Specificity	Recombinant fusion protein of human MGMT expressed in E. Coli
Dilution	WB~~WB (1/500 - 1/1000) IHC~~1:100~500 FC~~FC (1/100 - 1/200) IF/IC~~N/A
Format	Mouse IgG1. Liquid in PBS, pH 7.3, 30% glycerol, and 0.01% sodium azide.
Storage	Store at -20 °C.Stable for 12 months from date of receipt

Protein Information

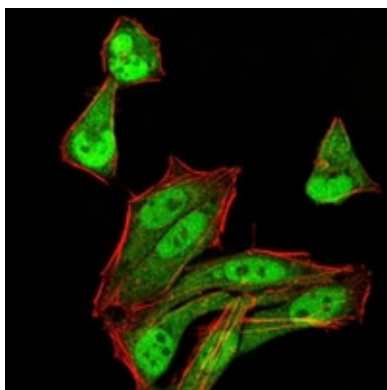
Name	MGMT
Function	Involved in the cellular defense against the biological effects of O6-methylguanine (O6-MeG) and O4-methylthymine (O4-MeT) in DNA. Repairs the methylated nucleobase in DNA by stoichiometrically transferring the methyl group to a cysteine residue in the enzyme. This is a suicide reaction: the enzyme is irreversibly inactivated.
Cellular Location	Nucleus.

Images

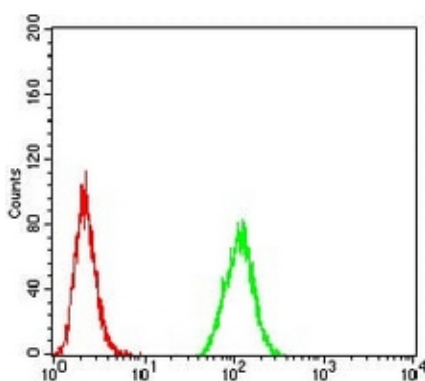
Western blot analysis of MGMT expression in MCF7 (A), Jurkat (B), HepG2 (C), PC3 (D) whole cell lysates.
(Predicted band size: 22 kD; Observed band size: 22 kD)



Immunohistochemical analysis of MGMT staining in human rectum cancer formalin fixed paraffin embedded tissue section. The section was pre-treated using heat mediated antigen retrieval with sodium citrate buffer (pH 6.0). The section was then incubated with the antibody at room temperature and detected using an HRP conjugated compact polymer system. DAB was used as the chromogen. The section was then counterstained with haematoxylin and mounted with DPX.



Immunofluorescent analysis of MGMT staining in HeLa cells. Formalin-fixed cells were permeabilized with 0.1% Triton X-100 in TBS for 5-10 minutes and blocked with 3% BSA-PBS for 30 minutes at room temperature. Cells were probed with the primary antibody in 3% BSA-PBS and incubated overnight at 4 °C in a humidified chamber. Cells were washed with PBST and incubated with an AF488-conjugated secondary antibody (green) in PBS at room temperature in the dark. Phalloidin - AF594 was used to stain Actin filaments (red). DAPI was used to stain the cell nuclei (blue).



Flow cytometric analysis of HeLa cells using Anti-MGMT Antibody (green) and negative control (red).

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.