



Magic™ Anti-MPO monoclonal antibody (DMAB-L21030)

This product is for research use only and is not intended for diagnostic use.

PRODUCT INFORMATION

Product Overview	Hybridoma clones have been derived from hybridization of Sp2/0 myeloma cells with spleen cells of Balb/c mice immunized with purified human MPO.
Antigen Description	Myeloperoxidase (MPO), most abundantly present in neutrophils and monocytes, is a green hemoprotein having peroxidase activity. It catalyzes the reaction of hydrogen peroxide and halide ions to form cytotoxic acids and other intermediates; and plays an important role in the oxygen-dependent killing of tumor cells and microorganisms. MPO deficiency is a hereditary deficiency of the enzyme, which predisposes to immune deficiency. There are considerable interests in the development of therapeutic MPO inhibitors. Our Amplite Myeloperoxidase Assay Kit provides a quick and sensitive method for the measurement of myeloperoxidase in solution and in cell lysates. It can be performed in a convenient 96-well or 384-well microtiter-plate format and easily adapted to automation without a separation step. The kit uses our Amplite Red substrate which enables a dual recordable mode. The signal can be easily read by either a fluorescence microplate reader at Ex/Em = 540/590 nm or an absorbance microplate reader at ~576 nm. With the Amplite Myeloperoxidase Assay Kit, we have detected as little as 5 ng/mL myeloperoxidase in a 100 L reaction volume. The kit can be automated for high throughput screenings of MPO inhibitors.
Specificity	MPO
Isotype	IgG1
Source/Host	Mouse
Species Reactivity	Human
Purification	Chromatography on protein A Sepharose
Conjugate	Unconjugated

Applications	Western blotting Best pairs for sandwich immunoassay (capture-detection):? DMAB-L21029 - DMAB-L21030
Buffer	PBS, pH 7.4, 0.1 % sodium azide (NaN?)
Preservative	0.1% Sodium Azide
Storage	4°C

GENE INFORMATION

Gene Name	MPO myeloperoxidase [Homo sapiens]
Official Symbol	MPO
Synonyms	MPO; AFBP; IBP1; PP12; IGF-BP25; hIGFBP-1; IGFBP1; insulin-like growth factor-binding protein 1; IBP-1; IGFBP-1; OTTHUMP00000159561; OTTHUMP00000207990; OTTHUMP00000214348; binding protein-25; binding protein-26; binding protein-28; placental protein 12; IGF-binding protein 1; amniotic fluid binding protein; growth hormone independent-binding protein; alpha-pregnancy-associated endometrial globulin
Entrez Gene ID	4353
Protein Refseq	NP_000241
UniProt ID	P05164
Chromosome Location	17q23.1
Pathway	C-MYB transcription factor network, organism-specific biosystem; Folate Metabolism, organism-specific biosystem; IL23-mediated signaling events, organism-specific biosystem; Phagosome, organism-specific biosystem; Phagosome, conserved biosystem; Selenium Pathway, organism-specific biosystem; amb2 Integrin signaling, organism-specific biosystem
Function	chromatin bindingchromatin binding; heme binding; heparin binding; metal ion binding; oxidoreductase activity; peroxidase activity