

Anti-MPO Antibody
Catalog # ABO10540**Specification**

Anti-MPO Antibody - Product Information

Application	WB, IHC-P
Primary Accession	P05164
Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Polyclonal
Format	Lyophilized

Description

Rabbit IgG polyclonal antibody for Myeloperoxidase(MPO) detection. Tested with WB, IHC-P in Human;Mouse;Rat.

Reconstitution

Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-MPO Antibody - Additional Information

Gene ID 4353

Other Names

Myeloperoxidase, MPO, 1.11.2.2, Myeloperoxidase, 89 kDa myeloperoxidase, 84 kDa myeloperoxidase, Myeloperoxidase light chain, Myeloperoxidase heavy chain, MPO

Calculated MW

83869 MW KDa

Application Details

Immunohistochemistry(Paraffin-embedded Section), 0.5-1 µg/ml, Human, Rat, Mouse, By Heat

Western blot, 0.1-0.5 µg/ml, Human, Rat, Mouse

Subcellular Localization

Lysosome.

Protein Name

Myeloperoxidase(MPO)

Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na₂HPO₄, 0.05mg Thimerosal, 0.05mg NaN₃.

Immunogen

A synthetic peptide corresponding to a sequence at the C-terminus of human MPO (714-728aa KNNIFMSNSYPRDFV), different from the related mouse and rat sequences by one amino acid.

Purification

Immunogen affinity purified.

Cross Reactivity

No cross reactivity with other proteins

Storage

At -20°C for one year. After reconstitution, at 4°C for one month. It can also be aliquotted and stored frozen at -20°C for a longer time. Avoid repeated freezing and thawing.

Sequence Similarities

Belongs to the peroxidase family. XPO subfamily.

Anti-MPO Antibody - Protein Information

Name MPO ([HGNC:7218](#))

Function

Part of the host defense system of polymorphonuclear leukocytes. It is responsible for microbicidal activity against a wide range of organisms. In the stimulated PMN, MPO catalyzes the production of hypohalous acids, primarily hypochlorous acid in physiologic situations, and other toxic intermediates that greatly enhance PMN microbicidal activity (PubMed:[9922160](http://www.uniprot.org/citations/9922160)). Mediates the proteolytic cleavage of alpha-1-microglobulin to form t-alpha-1-microglobulin, which potently inhibits oxidation of low-density lipoprotein particles and limits vascular damage (PubMed:[25698971](http://www.uniprot.org/citations/25698971)).

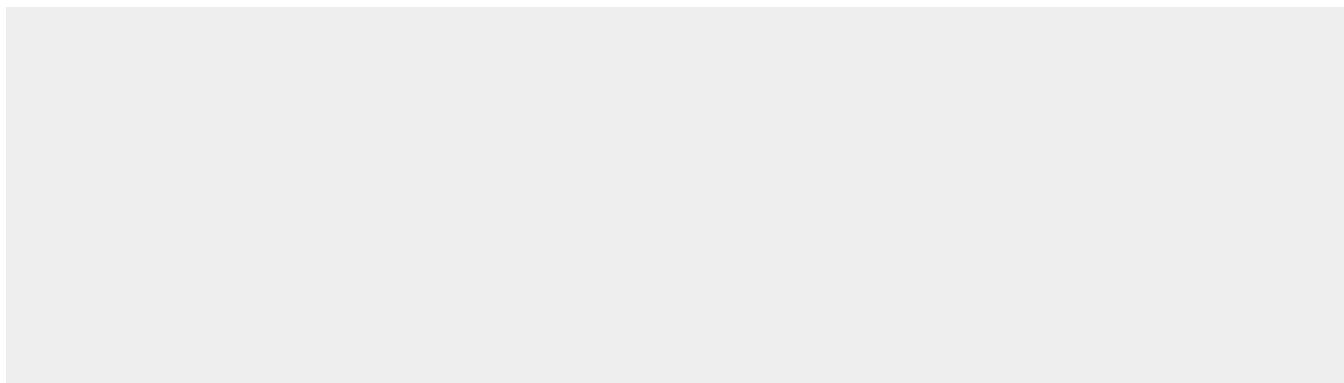
Cellular Location

Lysosome.

Anti-MPO Antibody - Protocols

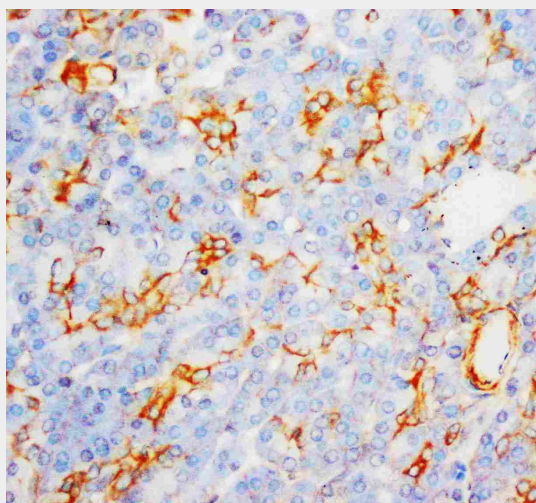
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Anti-MPO Antibody - Images



Anti-MPO antibody, ABO10540, Western blottingWB: Rat Brain Tissue Lysate



Anti-MPO antibody, ABO10540, IHC(P)IHC(P): Human Liver Cancer Tissue

Anti-MPO Antibody - Background

Myeloperoxidase(MPO) is a mammalian phagocyte hemoprotein though to primarily mediate host defense reactions. It is abundantly expressed in neutrophils and secreted during their activation. Myeloperoxidase is part of the host defense system of human polymorphonuclear leukocytes, responsible for microbicidal activity against a wide range of organisms. It is located in the nucleus as well as in the cytoplasm. Intranuclear MPO may help to protect DNA against damage resulting from oxygen radicals produced during myeloid cell maturation and function.