

Ferritin Heavy Chain Rabbit mAb

Catalog No: #49644

Package Size: #49644-1 50ul #49644-2 100ul

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Description

Product Name	Ferritin Heavy Chain Rabbit mAb
Host Species	Recombinant Rabbit
Clonality	Monoclonal antibody
Clone No.	JM22-36
Purification	ProA affinity purified
Applications	WB, IHC, ICC
Species Reactivity	Human;Mouse;Rat
Immunogen Description	Recombinant protein
Conjugates	Unconjugated
Other Names	Apo ferritin antibody Cell proliferation inducing gene 15 protein antibody Cell proliferation-inducing gene 15 protein antibody F HC antibody Ferritin H subunit antibody Ferritin heavy chain antibody Ferritin heavy polypeptide 1 antibody FHC antibody FRIH antibody FRIH_HUMAN antibody FTH 1 antibody FTH antibody FTH1 antibody FTH1 protein antibody FTHL 6 antibody FTHL6 antibody Iron overload autosomal dominant antibody MGC104426 antibody N-terminally processed antibody OK/SW-cl.84 antibody PIG 15 antibody PIG15 antibody Placenta immunoregulatory factor antibody PLIF antibody Proliferation inducing gene 15 protein antibody Proliferation inducing protein 15 antibody
Accession No.	Swiss-Prot#:P02794
Calculated MW	21 kDa
Formulation	1*TBS (pH7.4), 1%BSA, 40%Glycerol. Preservative: 0.05% Sodium Azide.
Storage	Store at -20°C

Application Details

WB: 1:500-1:1000 IHC: 1:50-1:200 ICC: 1:50-1:200

Background

Mammalian ferritins consist of 24 subunits made up of two types of poly-peptide chains, ferritin heavy chain and ferritin light chain, which each have unique functions. Ferritin heavy chains catalyze the first step in iron storage, the oxidation of FeII, whereas ferritin light chains promote the nucleation of ferrihydrite, enabling storage of FeIII. The most prominent role of mammalian ferritins is to provide iron-buffering capacity to cells. In addition to iron buffering, heavy chain ferritin is also involved in the regulation of thymidine biosynthesis via increased expression of cytoplasmic serine hydroxymethyltransferase, which is a limiting factor in thymidylate synthesis in MCF-7 cells. Light chain ferritin is involved in cataracts by at least two mechanisms: hereditary hyperferritinemia cataract syndrome, in which light chain ferritin is overexpressed; and oxidative stress, an important factor in the development of aging-related cataracts.

References

1. Vannucci L et al. In Vivo Targeting of Cutaneous Melanoma Using an Melanoma Stimulating Hormone-Engineered Human Protein Cage with Fluorophore and Magnetic Resonance Imaging Tracers. J Biomed Nanotechnol 11:81-92 (2015).

2. Yang H et al. Upregulation of mitochondrial ferritin by proinflammatory cytokines: implications for a role in Alzheimer's disease. J Alzheimers Dis 45:797-811 (2015).

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[PMID:40724917](#)

Note: This product is for in vitro research use only and is not intended for use in humans or animals.