

# **Anti-Ferritin Light Chain FTL Monoclonal Antibody**

Catalog # ABO14415

# **Specification**

# Anti-Ferritin Light Chain FTL Monoclonal Antibody - Product Information

Application WB, IHC, IP, FC

Primary Accession
Host
Rabbit
Isotype
Rabbit IgG

Reactivity Rat, Human, Mouse

Clonality Monoclonal Format Liquid

**Description** 

Anti-Ferritin Light Chain FTL Monoclonal Antibody . Tested in WB, IHC, IP, Flow Cytometry applications. This antibody reacts with Human, Mouse, Rat.

# Anti-Ferritin Light Chain FTL Monoclonal Antibody - Additional Information

**Gene ID 2512** 

**Other Names** 

Ferritin light chain, Ferritin L subunit, FTL

**Calculated MW** 

20 kDa KDa

**Application Details** 

WB 1:1000-1:5000<br>IHC 1:50-1:200<br>IP 1:50<br>FC 1:100

### **Contents**

Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol, 0.4-0.5mg/ml BSA.

#### **Immunogen**

A synthesized peptide derived from human Ferritin Light Chain

**Purification** 

Affinity-chromatography

Storage Store at -20°C for one year. For short term

storage and frequent use, store at 4°C for

up to one month. Avoid repeated

freeze-thaw cycles.

# **Anti-Ferritin Light Chain FTL Monoclonal Antibody - Protein Information**

Name FTL



#### **Function**

Stores iron in a soluble, non-toxic, readily available form. Important for iron homeostasis. Iron is taken up in the ferrous form and deposited as ferric hydroxides after oxidation. Also plays a role in delivery of iron to cells. Mediates iron uptake in capsule cells of the developing kidney (By similarity). Delivery to lysosomes by the cargo receptor NCOA4 for autophagic degradation and release or iron (PubMed:<a href="http://www.uniprot.org/citations/24695223" target="blank">24695223</a>).

# **Cellular Location**

Cytoplasmic vesicle, autophagosome. Cytoplasm {ECO:0000250|UniProtKB:P29391}. Autolysosome {ECO:0000250|UniProtKB:P29391}

## **Anti-Ferritin Light Chain FTL Monoclonal Antibody - Protocols**

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

# **Anti-Ferritin Light Chain FTL Monoclonal Antibody - Images**

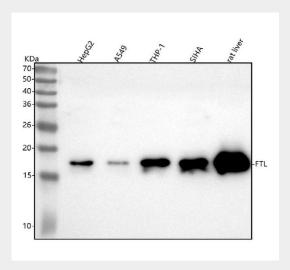


Figure 1. Western blot analysis of Ferritin Light Chain using anti-Ferritin Light Chain antibody (M01956-1).

Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel) / 90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 30 ug of sample under reducing conditions.

Lane 1: human HepG2 whole cell lysates,

Lane 2: human A549 whole cell lysates,

Lane 3: human THP-1 whole cell lysates,

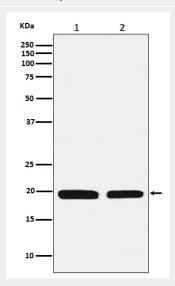
Lane 4: human SiHa whole cell lysates,

Lane 5: rat liver tissue lysates.

After electrophoresis, proteins were transferred to a nitrocellulose membrane at 150 mA for 50-90



minutes. Blocked the membrane with 5% non-fat milk/TBS for 1.5 hour at RT. The membrane was incubated with rabbit anti-Ferritin Light Chain antigen affinity purified monoclonal antibody (Catalog # M01956-1) at 1:1000 overnight at 4°C, then washed with TBS-0.1%Tween 3 times with 5 minutes each and probed with a goat anti-rabbit IgG-HRP secondary antibody at a dilution of 1:500 for 1.5 hour at RT. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit (Catalog # EK1002) with Tanon 5200 system. A specific band was detected for Ferritin Light Chain at approximately 20 kDa. The expected band size for Ferritin Light Chain is at 20 kDa.



Western blot analysis of Ferritin Light Chain expression in (1) HepG2 cell lysate; (2) Mouse liver lysate.

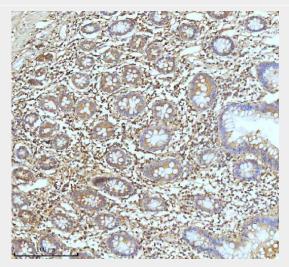


Figure 2. IHC analysis of Ferritin Light Chain using anti-Ferritin Light Chain antibody (M01956-1). Ferritin Light Chain was detected in a paraffin-embedded section of human colon tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 1:50 rabbit anti-Ferritin Light Chain Antibody (M01956-1) overnight at 4°C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit (Catalog # SV0002) with DAB as the chromogen.



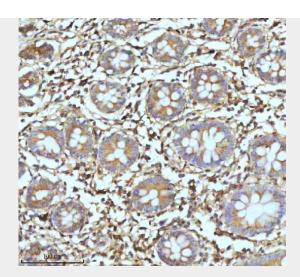


Figure 3. IHC analysis of Ferritin Light Chain using anti-Ferritin Light Chain antibody (M01956-1). Ferritin Light Chain was detected in a paraffin-embedded section of human colon tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 1:50 rabbit anti-Ferritin Light Chain Antibody (M01956-1) overnight at 4°C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit (Catalog # SV0002) with DAB as the chromogen.

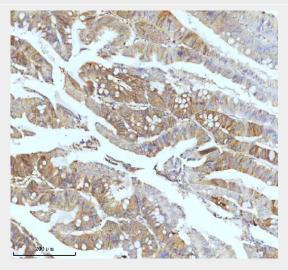


Figure 4. IHC analysis of Ferritin Light Chain using anti-Ferritin Light Chain antibody (M01956-1). Ferritin Light Chain was detected in a paraffin-embedded section of human colon tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 1:50 rabbit anti-Ferritin Light Chain Antibody (M01956-1) overnight at 4°C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit (Catalog # SV0002) with DAB as the chromogen.



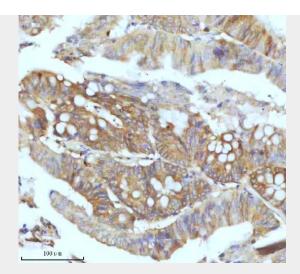


Figure 5. IHC analysis of Ferritin Light Chain using anti-Ferritin Light Chain antibody (M01956-1). Ferritin Light Chain was detected in a paraffin-embedded section of human colon tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 1:50 rabbit anti-Ferritin Light Chain Antibody (M01956-1) overnight at 4°C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit (Catalog # SV0002) with DAB as the chromogen.