SunLong Biotech Co.,LTD
Tel: 0086-571-56623320 Fax:0086-571-56623318
E-mail:sales@sunlongbiotech.com
www.sunlongbiotech.com

[Primary Antibody]

Rabbit Anti-Ferritin Light Chain antibody

Catalog Number: SL6403R

FOR RESEARCH USE ONLY

[DATASHEET]

Host:	Rabbit
Isotype:	IgG
Clonality:	Polyclonal
Target:	Ferritin Light Chain
Immunogen:	KLH conjugated synthetic peptide derived from human Ferritin Light Chain: 101-175/175
Purification:	affinity purified by Protein A
Concentration:	1mg/ml
Storage:	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol. Shipped at 4℃. Store at -20 °C for one year. Avoid repeated freeze/thaw cycles.
Applications:	IHC-P=1:100-500 IHC-F=1:100-500 IF=1:100-500 ELISA=1:5000-10000 （Paraffin sections need antigen repair） not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Reactivity:	(predicted:Human,Mouse,Rat,Dog,Pig,Cow,Horse)
Predicted MW.:	19-21kDa
Subcellular Location:	cytoplasmic Extracellular matrix Secretory protein
Background:	This gene encodes the light subunit of the ferritin protein. Ferritin is the major intracellular iron storage protein in prokaryotes and eukaryotes. It is composed of 24 subunits of the heavy and light ferritin chains. Variation in ferritin subunit composition may affect the rates of iron uptake and release in different tissues. A major function of ferritin is the storage of iron in a soluble and nontoxic state. Defects in this light chain ferritin gene are associated with several neurodegenerative diseases and hyperferritinemia-cataract syndrome. This gene has multiple pseudogenes. [provided by RefSeq, Jul 2008]. **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

Important Note: This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.

	iron to cells. Mediates iron uptake in capsule cells of the developing kidney. **Subunit:** Oligomer of 24 subunits. There are two types of subunits: L (light) chain and H (heavy) chain. The major chain can be light or heavy, depending on the species and tissue type. The functional molecule forms a roughly spherical shell with a diameter of 12 nm and contains a central cavity into which the insoluble mineral iron core is deposited. Iron enters the spherical protein shell through pores that are formed between subunits. Mutations leading to truncation or the addition of extra residues at the C-terminus interfere with normal pore formation and with iron accumulation. DISEASE: Defects in FTL are the cause of hereditary hyperferritinemia-cataract syndrome (HHCS) [MIM:600886]. It is an autosomal dominant disease characterized by early-onset bilateral cataract. Affected patients have elevated level of circulating ferritin. HHCS is caused by mutations in the iron responsive element (IRE) of the FTL gene. Defects in FTL are the cause of neurodegeneration with brain iron accumulation type 3 (NBIA3) [MIM:606159]; also known as adult-onset basal ganglia disease. It is a movement disorder with heterogeneous presentations starting in the fourth to sixth decade. It is characterized by a variety of neurological signs including parkinsonism, ataxia, corticospinal signs, mild nonprogressive cognitive deficit and episodic psychosis. It is linked with decreased serum ferritin levels. **Similarity:** Belongs to the ferritin family. Contains 1 ferritin-like diiron domain. **Database links:** **Entrez Gene:** 2512 Human **Entrez Gene:** 14325 Mouse **Entrez Gene:** 29292 Rat Omim: 134790 Human **SwissProt:** P02792 Human **SwissProt:** P29391 Mouse **SwissProt:** P02793 Rat **Unigene:** 433670 Human **Unigene:** 713706 Human **Unigene:** 30357 Mouse **Unigene:** 431913 Mouse **Unigene:** 1905 Rat

Important Note: This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.