

# Rabbit Anti-LDL receptor antibody

# SL20714R

<b>Product Name:</b>	LDL receptor
Chinese Name:	低密度Lipoprotein受体抗体
Alias:	Low-density lipoprotein receptor precursor; LDL-R; LDL R; FH; FHC; LDL R; LDLR; Low Density Lipoprotein Receptor; Low density lipoprotein receptor familial hypercholesterolemia.
Organism Species:	Rabbit
Clonality:	Polyclonal
React Species:	Human, Mouse, Rat, Pig, Horse,
Applications:	WB=1:500-2000ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800Flow-Cyt=1μg/TestICC=1:100-500IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Molecular weight:	92kDa
Cellular localization:	cytoplasmicThe cell membrane
Form:	Lyophilized or Liquid
Concentration:	1mg/ml
immunogen:	KLH conjugated synthetic peptide derived from human LDL receptor:501-600/860 <extracellular></extracellular>
Lsotype:	IgG
Purification:	affinity purified by Protein A
Storage Buffer:	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
Storage:	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20 °C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
PubMed:	<u>PubMed</u>
Product Detail:	The low density lipoprotein receptor (LDLR) gene family consists of cell surface proteins involved in receptor-mediated endocytosis of specific ligands. Low density lipoprotein (LDL) is normally bound at the cell membrane and taken into the cell ending up in lysosomes where the protein is degraded and the cholesterol is made available for

repression of microsomal enzyme 3-hydroxy-3-methylglutaryl coenzyme A (HMG CoA) reductase, the rate-limiting step in cholesterol synthesis. At the same time, a reciprocal stimulation of cholesterol ester synthesis takes place. Mutations in this gene cause the autosomal dominant disorder, familial hypercholesterolemia.

#### **Function:**

Binds LDL, the major cholesterol-carrying lipoprotein of plasma, and transports it into cells by endocytosis. In order to be internalized, the receptor-ligand complexes must first cluster into clathrin-coated pits. In case of HIV-1 infection, functions as a receptor for extracellular Tat in neurons, mediating its internalization in uninfected cells.

## **Subunit:**

Interacts with LDLRAP1. Interacts with SNX17. Interacts with HCV E1/E2 heterodimer. Interacts with HIV-1 Tat.

#### **Subcellular Location:**

Cell membrane; Single-pass type I membrane protein. Endomembrane system; Single-pass type I membrane protein. Membrane, clathrin-coated pit; Single-pass type I membrane protein. Note=Found distributed from the plasma membrane to intracellular compartments.

## **Tissue Specificity:**

Binds LDL, the major cholesterol-carrying lipoprotein of plasma, and transports it into cells by endocytosis. In order to be internalized, the receptor-ligand complexes must first cluster into clathrin-coated pits. In case of HIV-1 infection, functions as a receptor for extracellular Tat in neurons, mediating its internalization in uninfected cells.

#### Post-translational modifications:

N- and O-glycosylated.

Ubiquitinated by MYLIP leading to degradation.

#### Similarity:

Belongs to the LDLR family.

Contains 3 EGF-like domains.

Contains 7 LDL-receptor class A domains.

Contains 6 LDL-receptor class B repeats.

#### **SWISS:**

P01130

#### Gene ID:

3949

#### Database links:

Entrez Gene: 3949Human

Entrez Gene: 16835Mouse

Entrez Gene: 300438Rat

Omim: 606945Human

SwissProt: P01130Human

SwissProt: P35951Mouse

SwissProt: P35952Rat

Unigene: 213289Human

Unigene: 728190Human

Unigene: 3213 Mouse

Unigene: 10483Rat

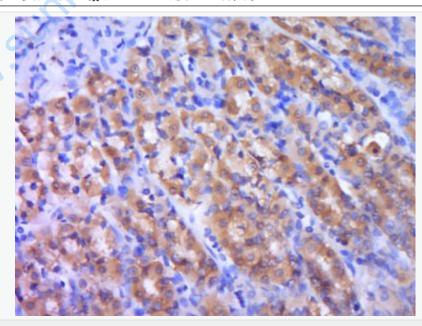
# **Important Note:**

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

# 低密度Lipoprotein受体

LDLR是一种存在于细胞表面的、可识别多种配体的Lipoprotein受体, 在体内对于富含甘油三酯的Lipoprotein代谢非常重要;

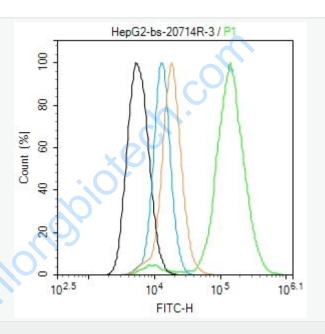
LDL R目前主要用于代谢及Tumour方面的研究。



### Picture:

Paraformaldehyde-fixed, paraffin embedded (Rat stomach); Antigen retrieval by

boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (LDL receptor) Polyclonal Antibody, Unconjugated (SL20714R) at 1:400 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructions and DAB staining.



Blank control (black line): HepG2 (black) (The cells were fixed with 2% paraformaldehyde (10 min), then permeabilized with PBST for 30 min on room temperature)

Primary Antibody (green line): Rabbit Anti-LDL receptor antibody (SL20714R);

Dilution: 1µg/10^6 cells;

Isotype Control Antibody (orange line): Rabbit IgG .

Secondary Antibody (white blue line): Goat anti-rabbit IgG-FITC; Dilution:  $1\mu g$  /test. www.sunlondbiotech.com