

Rabbit Anti-Insulin antibody

SL0855R

Product Name	Insulin
Chinese Name	胰岛素抗体
Alias	ILPR; INS; Insulin A chain; Insulin B chain; Insulin A chain; Insulin precursor; IRDN; Proinsulin; Proinsulin precursor; IDDM2; INS_HUMAN; MODY10.
Research Area	Tumour Cardiovascular Cell biology Neurobiology Signal transduction Growth factors and hormones Diabetes Endocrinopathy The new supersedes the old
Immunogen Species	Rabbit
Clonality	Polyclonal
React Species	Human,Mouse,Rat
Applications	WB=1:500-2000,IHC-P=1:100-500,IHC-F=1:100-500,IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Theoretical molecular weight	5.8/12kDa
Cellular localization	Secretory protein
Form	Liquid
Concentration immunogen	1mg/ml Recombinant human insulin
Lsotype	IgG
Purification	affinity purified by Protein A
Buffer Solution	1M TBS(pH7.4) with 1% BSA, 3% Proclin300 and 50% Glycerol.
Storage	Shipped at 4°C. Store at -20 °C for one year. Avoid repeated freeze/thaw cycles.
Attention	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
PubMed	PubMed

Insulin is a pancreatic hormone that regulates glucose and is involved in the synthesis of protein and fat. It increases cell permeability to monosaccharides, amino acids and fatty acids. It accelerates glycolysis, the pentose phosphate cycle, and glycogen synthesis in liver. Heterodimer of a B chain and an A chain linked by two disulfide bonds. Belongs to the insulin family. The insulin-like growth factors, IGF-I and IGF-II (also designated somatomedin C and multiplication stimulating activator, respectively), share approximately 76% sequence identity and are 50% related to pro-insulin. IGF-I and IGF-II are nonglycosylated, single chain proteins of 70 and 76 amino acids in length, respectively. IGF-I functions as an autocrine regulator of growth in various, whereas the function of IGF-II is less well defined.

Function:

Insulin decreases blood glucose concentration. It increases cell permeability to monosaccharides, amino acids and fatty acids. It accelerates glycolysis, the pentose phosphate cycle, and glycogen synthesis in liver.

Subunit:

Heterodimer of a B chain and an A chain linked by two disulfide bonds.

Subcellular Location:

Secreted.

Product Detail

DISEASE:

Hyperproinsulinemia, familial (FHPRI) [MIM:176730]: An autosomal dominant condition characterized by elevated levels of serum proinsulin-like material. Note=The disease is caused by mutations affecting the gene represented in this entry.

Diabetes mellitus, insulin-dependent, 2 (IDDM2) [MIM:125852]: A multifactorial disorder of glucose homeostasis that is characterized by susceptibility to ketoacidosis in the absence of insulin therapy. Clinical features are polydipsia, polyphagia and polyuria which result from hyperglycemia-induced osmotic diuresis and secondary thirst. These derangements result in long-term complications that affect the eyes, kidneys, nerves, and blood vessels. Note=The disease is caused by mutations affecting the gene represented in this entry.

Diabetes mellitus, permanent neonatal (PNDM) [MIM:606176]: A rare form of diabetes distinct from childhood-onset autoimmune diabetes mellitus type 1. It is characterized by insulin-requiring hyperglycemia that is diagnosed within the first months of life. Permanent neonatal diabetes requires lifelong therapy. Note=The disease is caused by mutations affecting the gene represented in this entry.

Maturity-onset diabetes of the young 10 (MODY10) [MIM:613370]: A form of diabetes that is characterized by an autosomal dominant mode of

inheritance, onset in childhood or early adulthood (usually before 25 years of age), a primary defect in insulin secretion and frequent insulin-independence at the beginning of the disease. Note=The disease is caused by mutations affecting the gene represented in this entry.

Similarity:

Belongs to the insulin family.

SWISS:

P01308

Gene ID:

3630

Database links:

[Entrez Gene: 3630](#) Human

[Entrez Gene: 280829](#) Cow

[Entrez Gene: 16333](#) Mouse

[Entrez Gene: 16334](#) Mouse

[Entrez Gene: 24505](#) Rat

[Entrez Gene: 397415](#) Pig

[SwissProt: P01308](#) Human

[SwissProt: P01325](#) Mouse

[SwissProt: P01322](#) Rat

[SwissProt: P01315](#) Pig

胰岛素 (Insulin) 胰岛素抗体是胰岛细胞分泌得一种激素，可以减低血糖浓度。此抗体和人胰岛素反应，并与大多数哺乳类动物的胰岛素有 React Species，主要用于胰岛细胞瘤的功能性研究。