

Mouse PI (Proinsulin) ELISA Kit | PI elisa kit

Mouse PI (Proinsulin) ELISA Kit

CATALOG #
AAA277242

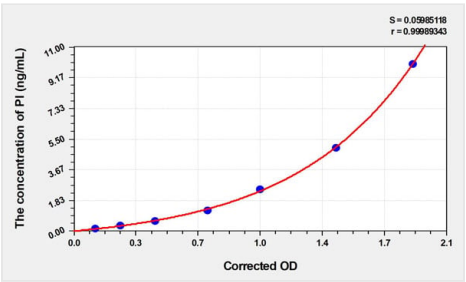
REACTIVITY
Mouse

PRODUCT SYNONYMS

PI (Proinsulin); Mouse PI (Proinsulin) ELISA Kit; INS; Pro-Insulin; Preproinsulin; PI elisa kit

PRODUCT SPECIFICATIONS

Reactivity	Mouse
Assay Type	Sandwich
Samples	serum, plasma, tissue homogenates, cell lysates, cell culture supernates and other biological fluids
Detection Range	0.16-10ng/mL
Sensitivity	0.071ng/mL
Standard	10ng/mL
Assay Length	3.5h
Precision	Intra-assay Precision (Precision within an assay): CV%<8% Three samples of known concentration were tested twenty times on one plate to assess intra-assay precision. Inter-assay Precision (Precision between assays): CV%<10% Three samples of known concentration were tested in forty separate assays to assess inter-assay precision.
Test Principle	The test principle applied in this kit is Sandwich enzyme immunoassay. The microtiter plate provided in this kit has been pre-coated with an antibody specific to Proinsulin (PI). Standards or samples are added to the appropriate microtiter plate wells then with a biotin-conjugated antibody specific to Proinsulin (PI). Next, Avidin conjugated to Horseradish Peroxidase (HRP) is added to each microplate well and incubated. After TMB substrate solution is added, only those wells that contain Proinsulin (PI), biotin-conjugated antibody and enzyme-conjugated Avidin will exhibit a change in color. The enzyme-substrate reaction is terminated by the addition of sulphuric acid solution and the color change is measured spectrophotometrically at a wavelength of 450 nm +/- 10 nm. The concentration of Proinsulin (PI) in the samples is then determined by comparing the OD of the samples to the standard curve.
Standard Curve	Matrices listed below were spiked with certain level of recombinant PI and the recovery rates were calculated by comparing the measured value to the expected amount of PI in samples. Matrix Recovery range Average serum (n=5) 78-95% 86 EDTA plasma (n=5) 84-98% 91 Heparin plasma (n=5) 85-97% 91
Recovery Rate	The linearity of the kit was assayed by testing samples spiked with appropriate concentration of PI and their serial dilutions. The results were demonstrated by the percentage of calculated concentration to the expected. Matrix 1:21:41:81:16 serum (n=5) 87-96% 86-95% 92-103% 81-90% EDTA plasma (n=5) 82-96% 85-98% 92-103% 81-95% Heparin plasma (n=5) 83-97% 82-96% 86-98% 93-101%



Standard Curve (Sample)

ADDITIONAL INFORMATION

Product Categories/Family for PI elisa kit Endocrinology; Hormone metabolism

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.

AAA Biotech | Tel: +1 (619) 604-9440 | Fax: +1 (619) 604-9441 | contact@aaabiotech.com
Online datasheet: <https://www.aaabiotech.com/mouse-elisa-kits/pi-proinsulin/277242>