Mouse anti IRS-1 Monoclonal Antibody

Alternative Name(s): nan

Order Information

- **Description:** IRS-1
- **Catalogue:** 605-940
- **Lot:** See label
- **Size:** 100ug/200ul
- **Host:** Mouse
- **Clone:** 529Q21
- **Application:** IHC(P), WB
- **Reactivity:** Hu

ANTIGEN PREPARATION

A synthetic peptide of human IRS-1

BACKGROUND

Insulin Receptor Substrate-1 (IRS-1), 165 kDa cytoplasmic docking protein, is one of the major endogenous substrates of the insulin receptor kinase. IRS-1 contains multiple tyrosine phosphorylation motifs that serve as docking sites for SH2 domain containing proteins, which mediate the metabolic and growth promoting functions of insulin. IRS-1 also contains over 30 potential serine/threonine phosphorylation sites. Ser312 of IRS-1 is phosphorylated by JNK and IKK and Ser789 is phosphorylated by SIK-2, a member of AMPK family. The phosphorylation of Tyr612 and Ser636/639 is mediated by the PKC and mTOR pathways, respectively and phosphorylation at Ser1101 is mediated by PKC, resulting in an inhibition of insulin signaling in the cell, suggesting a potential mechanism for insulin resistance in some models of obesity. Mutations in IRS1 gene are associated with type II diabetes and susceptibility to insulin resistance.

PURIFICATION

The mouse IgG is purified by Protein A-Affinity Chromatography according to Isotyping

FORMULATION

This affinity purified antibody is supplied in sterile Phosphatebuffered saline (pH7.2) containing antibody stabilizer

SPECIFICITY

This antibody recognizes human IRS-1 protein. The other species are not tested.

STORAGE

The antibodies are stable for 24 months from date of receipt when stored at –20oC to –70oC. The antibodies can be stored at 2oC-8oC for three month without detectable loss of activity. Avoid repeated freezing-thawing cycles.

APPLICATIONS/SUGGESTED WORKING DILUTIONS*

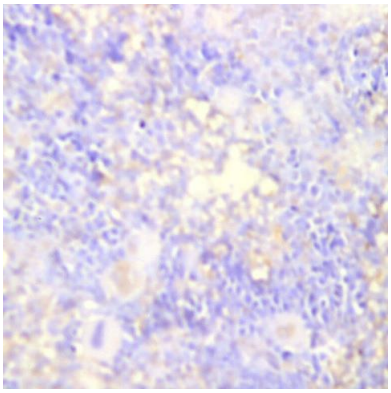
- Western Blot: 0.1-1 µg/ml
- ELISA: 0.01-0.1 µg/ml
- Immunoprecipitation: 2-5 µg/ml
- IHC: 2-10 µg/ml
- Flow cytometry: Not tested
- Molecular Weight: 132.0
- Positive Control: Kidney Tissue
- Cellular Location: Cell Membrane

AbboMax, Inc 2528 Qume Drive, Suite 8, San Jose, California 95131, USA
1 408-573-1898 (Tel). 1 408-573-1858 (Fax). www.abbomax.com info@abbomax.com

*Optimal dilutions should be determined by researchers for the specific applications.

AbboMax, Inc 2528 Qume Drive, Suite 8, San Jose, California 95131, USA
1 408-573-1898 (Tel). 1 408-573-1858 (Fax). www.abbomax.com info@abbomax.com

DATA ATTACHMENTS



Immunohistochemistry: Human pancreatic tissue (FFPE) stained with Mouse anti- IRS1 (Cat# 605-940) at 1:200 for 10 min @ RT. Staining of formalin-fixed tissue requires boiling tissue sections in 10 mM Citrate Buffer, pH 6.0 for 10 min followed by cooling at RT for 20 min.

REFERENCES

AbboMax, Inc 2528 Qume Drive, Suite 8, San Jose, California 95131, USA
1 408-573-1898 (Tel). 1 408-573-1858 (Fax). www.abbomax.com info@abbomax.com