

INSIG2 antibody - N-terminal region
Rabbit Polyclonal Antibody
Catalog # AI11690**Specification**

INSIG2 antibody - N-terminal region - Product Information

Application	WB
Primary Accession	O9Y5U4
Other Accession	NM_016133 , NP_057217
Reactivity	Human, Mouse, Rat, Rabbit, Pig, Goat, Sheep, Horse, Bovine, Dog
Predicted Host	Mouse, Rabbit, Pig, Goat, Bovine
Clonality	Rabbit
Calculated MW	Polyclonal 25kDa KDa

INSIG2 antibody - N-terminal region - Additional Information**Gene ID** 51141

Alias Symbol	MGC26273
Other Names	
Insulin-induced gene 2 protein, INSIG-2, INSIG2	

Format

Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.

Reconstitution & Storage

Add 50 ul of distilled water. Final anti-INSIG2 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.

Precautions

INSIG2 antibody - N-terminal region is for research use only and not for use in diagnostic or therapeutic procedures.

INSIG2 antibody - N-terminal region - Protein Information**Name** INSIG2 {ECO:0000303|PubMed:12242332, ECO:0000312|HGNC:HGNC:20452}**Function**

Oxysterol-binding protein that mediates feedback control of cholesterol synthesis by controlling both endoplasmic reticulum to Golgi transport of SCAP and degradation of HMGCR (PubMed:12242332, PubMed:16606821, PubMed:32322062). Acts as a negative regulator of cholesterol biosynthesis by mediating the retention of the SCAP-SREBP complex in the endoplasmic reticulum, thereby blocking the processing of sterol regulatory element-binding proteins (SREBPs) SREBF1/SREBP1 and SREBF2/SREBP2 (PubMed:32322062). Binds oxysterol, including 22- hydroxycholesterol, 24-hydroxycholesterol, 25-hydroxycholesterol and 27-hydroxycholesterol, regulating interaction with SCAP and retention of the SCAP-SREBP complex in the endoplasmic reticulum (PubMed:26160948, PubMed:17428920, PubMed:32322062). In presence of oxysterol, interacts with SCAP, retaining the SCAP-SREBP complex in the endoplasmic reticulum, thereby preventing SCAP from escorting SREBF1/SREBP1 and SREBF2/SREBP2 to the Golgi (PubMed:32322062). Sterol deprivation or phosphorylation by PCK1 reduce oxysterol-binding, disrupting the interaction between INSIG2 and SCAP, thereby promoting Golgi transport of the SCAP-SREBP complex, followed by processing and nuclear translocation of SREBF1/SREBP1 and SREBF2/SREBP2 (PubMed:32322062). Also regulates cholesterol synthesis by regulating degradation of HMGCR: initiates the sterol-mediated ubiquitin-mediated endoplasmic reticulum-associated degradation (ERAD) of HMGCR via recruitment of the reductase to the ubiquitin ligase RNF139 (PubMed:16606821, PubMed:22143767).

Cellular Location

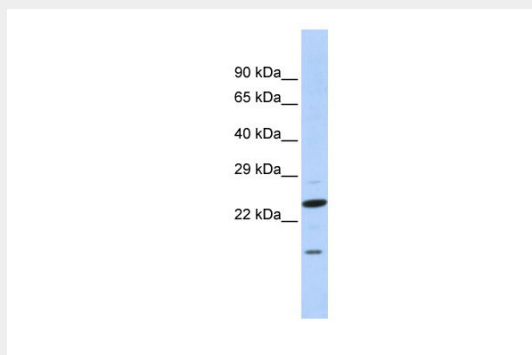
Endoplasmic reticulum membrane; Multi-pass membrane protein

INSIG2 antibody - N-terminal region - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

INSIG2 antibody - N-terminal region - Images



WB Suggested Anti-INSIG2 Antibody Titration: 0.2-1 µg/ml

ELISA Titer: 1:62500

Positive Control: Human brain

INSIG2 antibody - N-terminal region - References

Li,C.G., (2008) Int. J. Cancer 123 (2), 273-282 Reconstitution and Storage:For short term use, store at 2-8C up to 1 week. For long term storage, store at -20C in small aliquots to prevent freeze-thaw cycles.Publications:Yu, Z. et al. Rapamycin and Dietary Restriction Induce Metabolically Distinctive Changes in Mouse Liver. J. Gerontol. A. Biol. Sci. Med. Sci. glu053- (2014).
doi:10.1093/gerona/glu053 WB, Bovine, H, Goat, Rabbit, Sheep, Human, Pig, Mouse, Dog,
Rat24755936