

Datasheet for ABIN6699959 **IRS1 Protein (GST tag)**



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Overview

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| Quantity: | 20 µg |
| Target: | IRS1 |
| Origin: | Human |
| Source: | Escherichia coli (E. coli) |
| Protein Type: | Recombinant |
| Purification tag / Conjugate: | This IRS1 protein is labelled with GST tag. |
| Application: | Western Blotting (WB) |

Product Details

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| Purpose: | IRS1 recombinant protein-GST fusion protein |
| Purification: | Recombinant human IRS1 (1-355) was expressed in E. coli cells using an N-Terminal Glutathione-S-Transferase fusion protein. The purity was determined to be >90% by densitometry. |
| Purity: | >90% |

Target Details

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| Target: | IRS1 |
| Alternative Name: | IRS1 (IRS1 Products) |
| Background: | Synonyms: Insulin Receptor Substrate 1, HIRS-1 Background: IRS1 is the substrate for the insulin tyrosine kinase receptor and is found in a variety of insulin-responsive cells and tissues. IRS1 protein has no intrinsic enzymatic activity |

Target Details

but acts as a docking protein, via the SH2 domains, for mediating the insulin downstream signaling events. IRS1 has been shown to associate with the 14-3-3 family of proteins and this could play a role in the regulation of insulin sensitivity by interrupting the association between the insulin receptor and IRS1 (1). IRS1 may be associated with colorectal cancer and diet and related factors may affect the risk by modifying plasma insulin levels. Thus, the inter-individual variation in insulin signaling mediated by IRS1 may play a plausible role in the development of colorectal cancer (2). IRS1 Protein is ideal for investigators involved in Signaling Reagents, Protein Substrates, AKT/PKB Pathway, Cancer, Cellular Stress, and ERK/MAPK Pathway research.

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| NCBI Accession: | NM_005544 |
| Pathways: | Fc-epsilon Receptor Signaling Pathway , EGFR Signaling Pathway , Neurotrophin Signaling Pathway , Positive Regulation of Peptide Hormone Secretion , Hormone Transport , Negative Regulation of Hormone Secretion , Response to Growth Hormone Stimulus , Carbohydrate Homeostasis , Regulation of Carbohydrate Metabolic Process |

Application Details

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| Application Notes: | Western_Blot_Dilution: User Optimized Other: Kinase Assay-User Optimized Application_Note: IRS1 Protein is suitable for use in Western Blot and Kinase Assay. Expect a band approximately ~65 kDa on specific lysates or tissues. Specific conditions for reactivity should be optimized by the end user. |
| Restrictions: | For Research Use only |
| Handling | |
| Format: | Liquid |
| Concentration: | 0.2 µg/µL |
| Buffer: | IRS1 Protein is stored in 50 mM Tris-HCl, pH 7.5, 150 mM NaCl, 10 mM glutathione, 0.1 mM EDTA, 0.25 mM DTT, 0.1 mM PMSF, 25 % glycerol. |
| Storage: | -80 °C |
| Storage Comment: | Store product at -70°C. For optimal storage, aliquot target into smaller quantities after centrifugation and store at recommended temperature. For most favorable performance, avoid repeated handling and multiple freeze/thaw cycles. |

Handling

Expiry Date: 12 months