

EIF4EBP1 / 4EBP1 Antibody (C-Terminus)

Rabbit Polyclonal Antibody Catalog # ALS11455

Specification

EIF4EBP1 / 4EBP1 Antibody (C-Terminus) - Product Information

Application ICC
Primary Accession 013541

Reactivity Human, Mouse

Host Rabbit
Clonality Polyclonal
Calculated MW 13kDa KDa

EIF4EBP1 / 4EBP1 Antibody (C-Terminus) - Additional Information

Gene ID 1978

Other Names

Eukaryotic translation initiation factor 4E-binding protein 1, 4E-BP1, eIF4E-binding protein 1, Phosphorylated heat- and acid-stable protein regulated by insulin 1, PHAS-I, EIF4EBP1

Target/Specificity

14 amino acid peptide from near the carboxy-terminus of human 4E-BP1

Reconstitution & Storage

Short term 4°C, long term aliquot and store at -20°C, avoid freeze thaw cycles. Store undiluted.

Precautions

EIF4EBP1 / 4EBP1 Antibody (C-Terminus) is for research use only and not for use in diagnostic or therapeutic procedures.

EIF4EBP1 / 4EBP1 Antibody (C-Terminus) - Protein Information

Name EIF4EBP1

Function

Repressor of translation initiation that regulates EIF4E activity by preventing its assembly into the eIF4F complex: hypophosphorylated form competes with EIF4G1/EIF4G3 and strongly binds to EIF4E, leading to repress translation. In contrast, hyperphosphorylated form dissociates from EIF4E, allowing interaction between EIF4G1/EIF4G3 and EIF4E, leading to initiation of translation. Mediates the regulation of protein translation by hormones, growth factors and other stimuli that signal through the MAP kinase and mTORC1 pathways.

Cellular Location

Cytoplasm. Nucleus. Note=Localization to the nucleus is unaffected by phosphorylation status. $\{ECO:0000250|UniProtKB:Q60876\}$

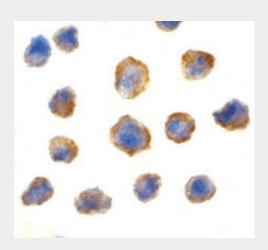


EIF4EBP1 / 4EBP1 Antibody (C-Terminus) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

EIF4EBP1 / 4EBP1 Antibody (C-Terminus) - Images



Immunocytochemistry of 4E-BP1 in 3T3 cells with 4E-BP1 antibody at 2 ug/ml.

EIF4EBP1 / 4EBP1 Antibody (C-Terminus) - Background

Regulates eIF4E activity by preventing its assembly into the eIF4F complex: hypophosphorylated form competes with EIF4G1/EIF4G3 and strongly binds to EIF4E, leading to repress translation. Mediates the regulation of protein translation by hormones, growth factors and other stimuli that signal through the MAP kinase and mTORC1 pathways.

EIF4EBP1 / 4EBP1 Antibody (C-Terminus) - References

Pause A., et al. Nature 371:762-767(1994). Ito M., et al. Submitted (JUN-2000) to the EMBL/GenBank/DDBJ databases. Kalnine N., et al. Submitted (MAY-2003) to the EMBL/GenBank/DDBJ databases. Ebert L., et al. Submitted (JUN-2004) to the EMBL/GenBank/DDBJ databases. Ota T., et al. Nat. Genet. 36:40-45(2004).