eIF3 p110 (A-20): sc-31872



The Power to Question

BACKGROUND

Translation initiation in eukaryotes necessitates the assembly of an 80S ribosomal complex containing methionyl initiator tRNA (Met-tRNAiMet), which is base paired at the initiation codon (AUG, GUG) in eligible transcripts. Eukaryotic initiation factors (elFs) are utilized in a sequence of reactions that leads to 80S ribosomal assembly and initiation of translation. Eukaryotic initiation factor-3 (elF3) is the largest family of elFs and consists of at least ten unique subunits (p170, p116, p110, p66, p48, p47, p44, p40, p36 and p35) in mammals. elF3 subunit-9 (elF3-h, elF3-p116, p116, elF3-S9, PRT1) is an 873 amino acid component of the elF3 multi-subunit complex that is involved in ribosomal 48S complex formation. Association of the elF3 complex with the 40S ribosomal subunit stabilizes elF2-GTP-Met-tRNAiMet complex association and mRNA binding, and promotes dissociation of 80S ribosomes into 40S and 60S subunits.

CHROMOSOMAL LOCATION

Genetic locus: EIF3CL/EIF3C (human) mapping to 16p11.2; Eif3c (mouse) mapping to 7 F3.

SOURCE

eIF3 p110 (A-20) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the C-terminus of eIF3 p110 of human origin.

PRODUCT

Each vial contains 200 μg lgG in 1.0 ml of PBS with <0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-31872 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

RESEARCH USE

For research use only, not for use in diagnostic procedures.

APPLICATIONS

elF3 p110 (A-20) is recommended for detection of elF3 p110 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

elF3 p110 (A-20) is also recommended for detection of elF3 p110 in additional species, including equine, canine and bovine.

Suitable for use as control antibody for eIF3 p110 siRNA (h): sc-40545, eIF3 p110 siRNA (m): sc-40546, eIF3 p110 shRNA Plasmid (h): sc-40545-SH, eIF3 p110 shRNA Plasmid (m): sc-40546-SH, eIF3 p110 shRNA (h) Lentiviral Particles: sc-40545-V and eIF3 p110 shRNA (m) Lentiviral Particles: sc-40546-V.

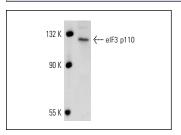
Molecular Weight of eIF3 p110: 110 kDa.

Positive Conrols: F9 cell lysate: sc-2245, JAR cell lysate: sc-2276 or HeLa whole cell lysate: sc-2200.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

DATA



eIF3 p110 (A-20): sc-31872. Western blot analysis of eIF3 p110 expression in F9 whole cell lysate.

SELECT PRODUCT CITATIONS

1. Farny, N.G., et al. 2009. Metazoan stress granule assembly is mediated by $P\text{-elF2}\alpha\text{-dependent}$ and -independent mechanisms. RNA 15: 1814-1821.

STORAGE

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.



Try **eIF3 p110 (B-6): sc-74507**, our highly recommended monoclonal aternative to eIF3 p110 (A-20).

Santa Cruz Biotechnology, Inc. 1.800.457.3801 831.457.3800 fax 831.457.3801 Europe +00800 4573 8000 49 6221 4503 0 www.scbt.com