SANTA CRUZ BIOTECHNOLOGY, INC.

HSPA1L (B-24): sc-133679



BACKGROUND

The heat shock proteins (HSPs) comprise a group of highly conserved, abundantly expressed proteins with diverse functions, including the assembly and sequestering of multi-protein complexes, the transportation of nascent polypeptide chains across cellular membranes and the regulation of protein folding. HSPA1L (heat shock 70 kDa protein 1L), also known as HSP70T, is a 641 amino acid protein that belongs to the HSP 70 family and, like other HSP proteins, mediates protein folding within the cytosol, as well as within other organelles throughout the cell. HSP proteins, such as HSPA1L, together with chaperones, bind extended peptide segments with a net hydrophobic character exposed during protein translation, membrane translocation or after stressinduced damage. HSPA1L has been found be expressed in spermatids and is not induced by heat shock.

REFERENCES

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- Milner, C.M. and Campbell, R.D. 1990. Structure and expression of the three MHC-linked HSP 70 genes. Immunogenetics 32: 242-251.
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- Neuhaus, E.M., et al. 2006. A specific heat shock protein enhances the expression of mammalian olfactory receptor proteins. Chem. Senses 31: 445-452.
- Alfirevic, A., et al. 2009. TNF, LTA, HSPA1L and HLA-DR gene polymorphisms in HIV-positive patients with hypersensitivity to cotrimoxazole. Pharmacogenomics 10: 531-540.

CHROMOSOMAL LOCATION

Genetic locus: HSPA1L (human) mapping to 6p21.33.

SOURCE

HSPA1L (B-24) is an affinity purified rabbit polyclonal antibody raised against synthetic HSPA1L peptide of human origin.

PRODUCT

Each vial contains 50 μg IgG in 500 μI PBS with < 0.1% sodium azide, 0.1% gelatin and < 0.02% sucrose.

APPLICATIONS

HSPA1L (B-24) is recommended for detection of HSPA1L of 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)] and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for HSPA1L siRNA (h): sc-95199, HSPA1L shRNA Plasmid (h): sc-95199-SH and HSPA1L shRNA (h) Lentiviral Particles: sc-95199-V.

Molecular Weight of HSPA1L: 70 kDa.

Positive Controls: Jurkat whole cell lysate: sc-2204 or Hs 181 Tes whole cell lysate: sc-364779.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker[™] compatible goat anti-rabbit IgG-HRP: sc-2030 (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).

DATA



HSPA1L (B-24): sc-133679. Western blot analysis of HSPA1L expression in Jurkat (**A**) and Hs 181 Tes (**B**) whole cell lysates.

STORAGE

Store at 4° C, **D0 NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

RESEARCH USE

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

