

## **HSPB1 / HSP27 Antibody**

Rabbit Polyclonal Antibody Catalog # ALS12818

## **Specification**

## **HSPB1 / HSP27 Antibody - Product Information**

Application IHC Primary Accession P04792

Reactivity Human, Monkey

Host Rabbit
Clonality Polyclonal
Calculated MW 23kDa KDa

## **HSPB1 / HSP27 Antibody - Additional Information**

## Gene ID 3315

#### **Other Names**

Heat shock protein beta-1, HspB1, 28 kDa heat shock protein, Estrogen-regulated 24 kDa protein, Heat shock 27 kDa protein, HSP 27, Stress-responsive protein 27, SRP27, HSPB1, HSP27, HSP28

## **Reconstitution & Storage**

Store at -20°C. Aliquot to avoid freeze/thaw cycles.

#### **Precautions**

HSPB1 / HSP27 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

## **HSPB1 / HSP27 Antibody - Protein Information**

## Name HSPB1

Synonyms HSP27, HSP28

#### **Function**

Small heat shock protein which functions as a molecular chaperone probably maintaining denatured proteins in a folding- competent state (PubMed:<a

href="http://www.uniprot.org/citations/10383393" target="\_blank">10383393</a>, PubMed:<a href="http://www.uniprot.org/citations/20178975" target="\_blank">20178975</a>). Plays a role in stress resistance and actin organization (PubMed:<a

href="http://www.uniprot.org/citations/19166925" target="\_blank">19166925</a>). Through its molecular chaperone activity may regulate numerous biological processes including the phosphorylation and the axonal transport of neurofilament proteins (PubMed:<a href="http://www.uniprot.org/citations/23728742" target="blank">23728742</a>).

## **Cellular Location**

Cytoplasm. Nucleus Cytoplasm, cytoskeleton, spindle Note=Cytoplasmic in interphase cells. Colocalizes with mitotic spindles in mitotic cells. Translocates to the nucleus during heat shock and



resides in sub-nuclear structures known as SC35 speckles or nuclear splicing speckles.

#### **Tissue Location**

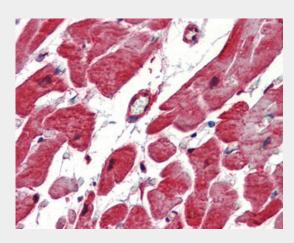
Detected in all tissues tested: skeletal muscle, heart, aorta, large intestine, small intestine, stomach, esophagus, bladder, adrenal gland, thyroid, pancreas, testis, adipose tissue, kidney, liver, spleen, cerebral cortex, blood serum and cerebrospinal fluid. Highest levels are found in the heart and in tissues composed of striated and smooth muscle.

## **HSPB1 / HSP27 Antibody - Protocols**

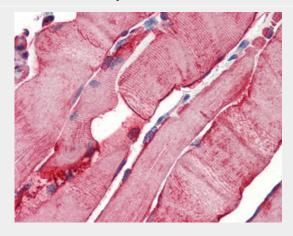
Provided below are standard protocols that you may find useful for product applications.

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

## **HSPB1 / HSP27 Antibody - Images**



Anti-HSP27 / Heat Shock Protein 27 antibody IHC of human heart.



Anti-HSP27 / Heat Shock Protein 27 antibody IHC of human skeletal muscle.



# HSPB1 / HSP27 Antibody - Background

Involved in stress resistance and actin organization.

## **HSPB1 / HSP27 Antibody - References**

Hickey E., et al. Nucleic Acids Res. 14:4127-4145(1986). Carper S.W., et al. Nucleic Acids Res. 18:6457-6457(1990). Hino M., et al. Biochem. Biophys. Res. Commun. 271:164-169(2000). Briolay J., et al. Submitted (JUN-1993) to the EMBL/GenBank/DDBJ databases. Yu W., et al. Genome Res. 7:353-358(1997).