

Product datasheet for TA336819

OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

HSP27 (HSPB1) Rabbit Polyclonal Antibody

Product data:

Product Type: Primary Antibodies

Applications: ICC/IF, IHC, WB

Recommended Dilution: Immunohistochemistry: 1:100, Western Blot: 2 ug/ml, Immunohistochemistry-Paraffin: 1:100,

Knockout Validated, Immunocytochemistry/ Immunofluorescence: 1:100

Reactivity: Human, Mouse, Rat

Host: Rabbit

Clonality: Polyclonal

Immunogen: A synthetic peptide made to an internal region of the human Hsp27 protein (within residues

80-150). [Swiss-Prot P04792]

Formulation: PBS, 0.05% Sodium Azide. Store at 4C short term. Aliquot and store at -20C long term. Avoid

freeze-thaw cycles.

Concentration: lot specific

Purification: Immunogen affinity purified

Conjugation: Unconjugated

Storage: Store at -20°C as received.

Stability: Stable for 12 months from date of receipt.

Gene Name: heat shock protein family B (small) member 1

Database Link: NP 001531

Entrez Gene 15507 MouseEntrez Gene 24471 RatEntrez Gene 3315 Human

P04792

Background: Heat shock protein 27 is a molecular chaperone involved in protection of cells during cellular

stress events. The activity of HSP27 protects from apoptotic events caused by heat shock and other distress. Immunohistochemical detection of HSP27 has been suggested as a qualitative

biomarker for colorectal cancer. It is also highly expressed in lung cancer, cerebral inflammation, ischemia-reperfusion injury, and glaucoma. Interestingly, HSP27

overexpression can counteract the activity of multi-drug resistance proteins in breast cancer. Polyphenols downregulate the expression of HSP27, as well as many antioxidant enzymes,

resulting in susceptibility to stress and damage.





HSP27 (HSPB1) Rabbit Polyclonal Antibody - TA336819

Synonyms: CMT2F; HEL-S-102; HMN2B; HS.76067; Hsp25; HSP27; HSP28; SRP27

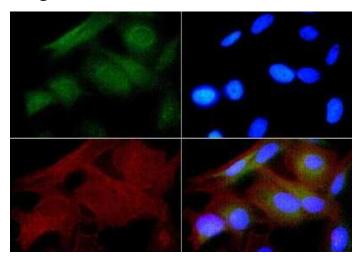
Note: This HSP27 antibody is useful for ICC/IF, IHC-P, and Western blot where a band is seen ~27

kDa. Prior to immunostaining paraffin tissues, antigen retrieval with sodium citrate buffer (pH

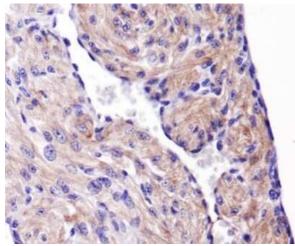
6.0) is recommended.

Protein Pathways: MAPK signaling pathway, VEGF signaling pathway

Product images:

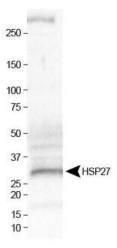


Immunocytochemistry/Immunofluorescence: HSP27 Antibody TA336819 - Hsp27 Antibody TA336819 - HSP27 antibody was tested in HeLa cells with FITC (green). Nuclei and actin were counterstained with DAPI (blue) and Phalloidin (red).

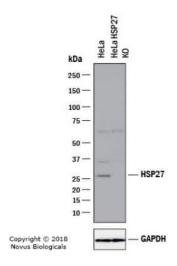


Immunohistochemistry: Hsp27 Antibody TA336819 - Staining of HSP27 in mouse heart using DAB with hematoxylin counterstain.





Western Blot: Hsp27 Antibody TA336819 - Analysis of HSP27 in human skeletal muscle lysate.



Knockout Validated: HSP27 Antibody TA336819 - Western blot shows lysates of HeLa human cervical epithelial carcinoma parental cell line and HSP27 knockout (KO) HeLa cell line. PVDF membrane was probed with 2 ug/ml of Rabbit Anti-Human HSP27 Polyclonal Antibody (Catalog # TA336819) followed by HRP-conjugated Anti-Rabbit IgG Secondary Antibody (catalog number HAF008). Specific band was detected for HSP27 at approximately 27 kDa (as indicated) in the parental HeLa cell line, but is not detectable in the knockout HeLa cell line. This experiment was conducted under reducing conditions.