For Research Use Only

HSP27 Monoclonal antibody

Catalog Number:66767-1-lg Featured Product

2 Publications

BC012768

GeneID (NCBI):

UNIPROT ID:

Full Name:

P04792

GenBank Accession Number:

heat shock 27kDa protein 1



Basic Information

Catalog Number: 66767-1-lg Size:

2686 ug/ml Source: Mouse Isotype: lgG1

Calculated MW: Immunogen Catalog Number: AG27859

19-23 kDa Observed MW:

27 kDa

Purification Method:

Protein G purification CloneNo.:

3E7A1

Recommended Dilutions: WB 1:20000-1:100000 IHC 1:1000-1:4000 IF 1:50-1:500

Applications

Tested Applications:

WB, IHC, IF, FC (Intra), ELISA

Cited Applications:

WB. IF

Species Specificity:

human, mouse, rat, zebrafish

Cited Species:

human, mouse

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

WB: HCT 116 cells, HeLa cells, HSC-T6 cells, mouse liver tissue, U2OS cells, A549 cells, HepG2 cells, HuH-7

IHC: human gliomas tissue, human liver tissue

IF: zebrafish retina, MCF-7 cells

Background Information

HSPB1, also known as heat shock protein 27 (Hsp27), belongs to the small heat shock protein family which is induced in response to environmental challenges or/and developmental transitions. It is also an anti-apoptotic protein that plays crucial roles in tumorigenesis and cell survival and is reported to be an independent prognosis marker for cancer. Recently HSPB1 has been found to be a valuable marker for melanoma. In addition to the predicted 27 kDa, an extra 50-55 kDa representing dimeric form of HSPB1 may also be observed (21353161).

Notable Publications

Author	Pubmed ID	Journal	Application
Xiao Zhang	32945483	Oncol Rep	IF
Fangjia Yang	38507480	Sci Adv	WB,IF

Storage

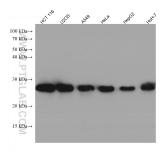
Storage:

Store at -20°C. Stable for one year after shipment.

PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

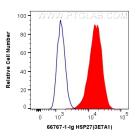
Selected Validation Data



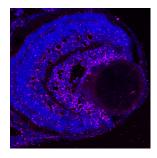
Various lysates were subjected to SDS PAGE followed by western blot with 66767-1-1g (HSPB1 antibody) at dilution of 1:50000 incubated at room temperature for 1.5 hours.



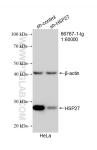
Immunohistochemical analysis of paraffinembedded human gliomas tissue slide using 66767-1-Ig (HSPB1 antibody) at dilution of 1:2000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



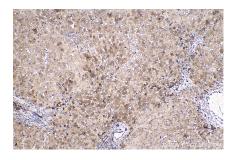
1X10^6 HepG2 cells were intracellularly stained with 0.5 ug Anti-Human HSP27 (66767-1-1g, Clone:3E7A1) (red) labeled with FlexAble CoraLite® Plus 555 Antibody Labeling Kit for Mouse IgG1 (KFA022), or 0.5 ug Control Antibody. Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).



Antibody staining on tissue sections of the zebrafish retina at 5 days post fertilisation (dpf) for Heatshock protein 27 (Hsp27;magenta); (#66767-1-lg) Dilution 1:200. Tissue fixed overnight in 4% PFA; DAPI, blue. Data generated by Natalia Jaroszynska in Professor Ryan MacDonald's lab, University College London, UK.



WB result of HSP27 antibody (66767-1-1g; 1:60000; incubated at room temperature for 1.5 hours) with sh-Control and sh-HSP27 transfected HeLa cells.



Immunohistochemical analysis of paraffinembedded human liver tissue slide using 66767-1-Ig (HSP27 antibody) at dilution of 1:8000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).