Beijing Emarbio Science & Technology Co.,LTD

Anti-HSP70 Mouse Monoclonal Antibody(4H9)

Catalog No.	EM42019-01	EM42019-02	
Size	50μl	100μl	
Species	**Human Mouse Rat Pig**	*Molecular*	70KD

Background: The **70 kilodalton heat shock proteins** (**Hsp70**s) are a family of ubiquitously expressed heat shock proteins. Proteins with similar structure exist in virtually all living organisms. The Hsp70s are an important part of the cell's machinery for protein folding, and help to protect cells from stress. Hsp70 is usually in an ATP bound state. Hsp70 by itself is characterized by a very weak ATPase activity, such that spontaneous hydrolysis will not occur for many minutes. As newly synthesized proteins emerge from the ribosomes, the substrate binding domain of Hsp70 recognizes sequences of hydrophobic amino acid residues, and interacts with them. This spontaneous interaction is reversible, and in the ATP bound state Hsp70 may relatively freely bind and release peptides. However, the presence of a peptide in the binding domain stimulates the ATPase activity of Hsp70, increasing its normally slow rate of ATP hydrolysis.

Specificity: HSP70 Mouse monoclonal antibody detects endogenous HSP70 proteins.

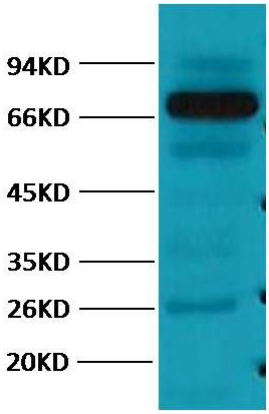
Application: **WB: 1:1,000-2,000**

Optimal dilutions/concentrations should be determined by the end user.

Form: Liquid ,1mg/ml

Storage buffer: PBS, pH 7.4, containing 0.02% ***sodium azide*** as Preservative and 50% Glycerol.

Storage: Store at -20°C. Do not aliquot the antibody.



Western blot analysis of Pig Skeletal Muscle with HSP70 mAb diluted at 1:2,000.