

DESCRIPTION

Species Reactivity	Human
Specificity	Detects human HSP90α in Western blots. In Western blots no cross-reactivity with recombinant human HSP90β is observed.
Source	Polyclonal Rabbit IgG
Purification	Antigen Affinity-purified
Immunogen	Human HSP90 α isoform 1 synthetic peptide Asp702-Met716 Accession # P07900
Conjugate	Alexa Fluor 594 Excitation Wavelength: 590 nm Emission Wavelength: 617 nm
Formulation	Supplied 0.2mg/ml in 1X PBS with RDF1 and 0.09% Sodium Azide
*Contains <0.1% Sodium Azide, which is not hazardous at this concentration according to GHS classifications. Refer to the Safety Data Sheet (SDS) for additional information and handling instructions.	

APPLICATIONS

Please Note: Optimal dilutions should be determined by each laboratory for each application. [General Protocols](#) are available in the Technical Information section on our website.

Knockout Validated	Optimal dilution of this antibody should be experimentally determined.
Western Blot	Optimal dilution of this antibody should be experimentally determined.

PREPARATION AND STORAGE

Shipping	The product is shipped with polar packs. Upon receipt, store it immediately at the temperature recommended below.
Stability & Storage	Protect from light. Do not freeze. 12 months from date of receipt, 2 to 8 °C as supplied

BACKGROUND

The heat shock protein-90 kDa (HSP90) is a composite name for a large group of genes whose molecular weights average 90 kDa. HSP90 functions primarily as a molecular chaperone, facilitating the folding of other cellular proteins, preventing protein aggregation, or targeting improperly folded proteins to specific degradative pathways. HSP90 is ubiquitously expressed, highly conserved and accounts for 1-2% of the total cellular protein. Recently introduced, standardized nomenclature has divided the 17 identified HSP90 genes into three related and one unrelated classes, HSP90AA1, HSP90AB, HSP90BB, and TRAP, respectively. Six of these genes were functional while the remaining 11 are considered putative pseudogenes. Eukaryotic cells have two principal forms of HSP90. The AF7247 antibody described here is specific to HSP90 the inducible form, HSP90AA1, also known as HSP90α, HSP90A, HSPC1, HSPCA and HSP86. The other form is a constitutively expressed HSP90AB1 that is a 724 amino acid protein that is also known as HSP90-β, HSP90B, HSPCB, HSPC2, and HSP89-β. HSP90AB1-1 and HSP90AA share 90% identity. In addition to its role as a molecular chaperone and stress response protein, HSP90 is a central component in a number of basic cellular processes including hormone signaling and cell cycle control.

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