HSP60 Monoclonal Antibody (2E1/53)

Product Details	
Size	100 µg
Species Reactivity	Human, Mouse, Non-human primate, Rat
Published Species	Rabbit, Human
Host/Isotype	Mouse / IgM
Class	Monoclonal
Type	Antibody
Clone	2E1/53
Conjugate	Unconjugated
Immunogen	Human placental HSP60.
Form	Lyophilized
Concentration	1 mg/mL
Purification	purified
Storage buffer	PBS with 1mg/mL BSA
Contains	0.05% sodium azide
Storage conditions	-20° C, Avoid Freeze/Thaw Cycles
RRID	AB_325461

Applications	Tested Dilution	Publications
Western Blot (WB)	1:2,000	2 Publications
Immunohistochemistry (IHC)	1-10 µg/mL	-
Immunocytochemistry (ICC/IF)	1:20-1:200	-
ELISA (ELISA)	1-10 µg/mL	-
Immunoprecipitation (IP)	2 µg	-
Miscellaneous PubMed (Misc)	-	1 Publication

Product Specific Information

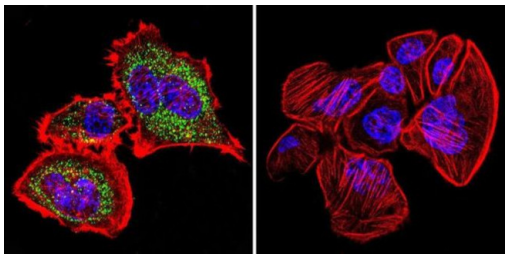
MA3-013 detects HSP60 from human, monkey, mouse, and rat samples. This antibody displays no other protein reactivity.

MA3-013 has been successfully used in Western blot, immunoprecipitation, immunohistochemistry, immunofluorescence, and ELISA procedures. By Western blot, this antibody detects a single 58 kDa protein representing recombinant human HSP60.

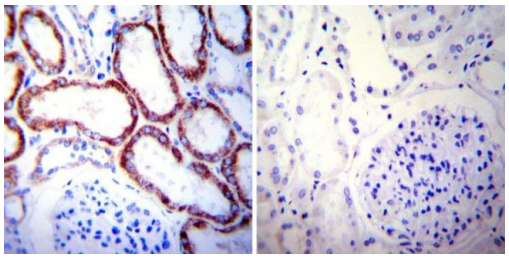
The MA3-013 antigen is human placental HSP60. Epitope mapping studies using human HSP60 deletion mutants suggest that this antibody binds between amino acids 211-288.

Reconstitute with PBS.

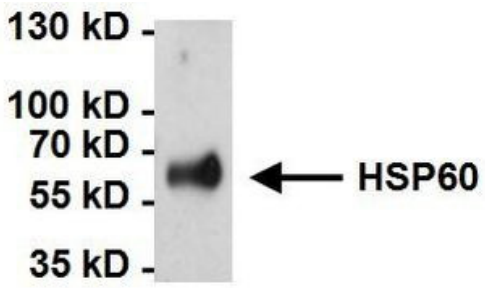
Product Images For HSP60 Monoclonal Antibody (2E1/53)



HSP60 Antibody (MA3-013) in ICC/IF
Immunofluorescent analysis of Heat Shock Protein 60 (Hsp60) in U251 Cells. Cells were grown on chamber slides and fixed with formaldehyde prior to staining. Cells were probed without (control) or with a Heat Shock Protein 60 (Hsp60) monoclonal antibody (Product # MA3-013) at a dilution of 1:200 overnight at 4 C, washed with PBS and incubated with a DyLight-488 conjugated secondary antibody (Product # 35503). Heat Shock Protein 60 (Hsp60) staining (green), F-Actin staining with Phalloidin (red) and nuclei with DAPI (blue) is shown. Images were taken at 60X magnification.



HSP60 Antibody (MA3-013) in IHC (P)
Immunohistochemistry was performed on normal deparaffinized Human kidney tissue tissues. To expose target proteins, heat induced antigen retrieval was performed using 10mM sodium citrate (pH6.0) buffer, microwaved for 8-15 minutes. Following antigen retrieval tissues were blocked in 3% BSA-PBS for 30 minutes at room temperature. Tissues were then probed at a dilution of 1:100 with a mouse monoclonal antibody recognizing Heat Shock Protein 60 (Product # MA3-013) or without primary antibody (negative control) overnight at 4°C in a humidified chamber. Tissues were washed extensively with PBST and endogenous peroxidase activity was quenched with a peroxidase suppressor. Detection was performed using a biotin-conjugated secondary antibody and SA-HRP, followed by colorimetric detection using DAB. Tissues were counterstained with hematoxylin and prepped for mounting.



HSP60 Antibody (MA3-013) in IP
Immunoprecipitation of Heat Shock Protein 60 (HSP60) was performed on HeLa cells. Antigen-antibody complexes were formed by incubating 500 µg of whole cell lysate with 2 µg of a HSP60 monoclonal antibody (Product # MA3-013) overnight on a rocking platform at 4°C. The immune complexes were captured on 50 µL Protein A/G Plus Agarose (Product # 20423), washed extensively, and eluted with 5X Lane Marker Reducing Sample Buffer (Product # 39000). Samples were resolved on a 4-20% Tris-HCl polyacrylamide gel, transferred to a PVDF membrane, and blocked with 5% BSA/TBST for at least 1 hour. The membrane was probed with a HSP60 monoclonal antibody (Product # MA3-013) at a concentration of 1 µg/mL overnight rotating at 4°C, washed in TBST, and probed with a goat anti-mouse IgM secondary antibody (Product # 31440) at a dilution of 1:20,000 for at least 1 hour. Chemiluminescent detection performed using SuperSignal West Dura (Product # 34075).

View more figures on thermofisher.com

3 References

Western Blot (2)

International journal of molecular sciences

Cardiac Alarmins as Residual Risk Markers of Atherosclerosis under Hypolipidemic Therapy.

"Published figure using HSP60 monoclonal antibody (Product # MA3-013) in Western Blot"

Authors: Suica VI,Uyy E,Ivan L,Boteanu RM,Cerveanu-Hogas A,Hansen R,Antohe F

Year
2022

Species
Rabbit

Cell stress & chaperones

An inventory of interactors of the human HSP60/HSP10 chaperonin in the mitochondrial matrix space.

"MA3-013 was used in Western Blotting to present the first survey of interactors of the human mitochondrial HSP60 /HSP10 chaperonin."

Authors: Bie AS,Cömert C,Körner R,Corydon TJ,Palmfeldt J,Hipp MS,Hartl FU,Bross P

Year
2020

Species
Human

Miscellaneous PubMed (1)

Molecular and cellular biology

Primary structure of a human mitochondrial protein homologous to the bacterial and plant chaperonins and to the 65-kilodalton mycobacterial antigen.

"MA3-013 was used in western blot to clone and characterize human hsp60"

Authors: Jindal S,Dudani AK,Singh B,Harley CB,Gupta RS

Year
1989

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