

Anti-Arg2 Rabbit Monoclonal Antibody

Catalog # ABO15981

Specification

Anti-Arg2 Rabbit Monoclonal Antibody - Product Information

Application	WB, IF, ICC, FC
Primary Accession	<u>P78540</u>
Host	Rabbit
Isotype	lgG
Reactivity	Human
Clonality	Monoclonal
Format	Liquid
Description	
Anti-Arg2 Rabbit Monoclonal Antibody . Tested in WB, ICC/IF, Flow Cytometry applications. This	
antibody reacts with Human.	

Anti-Arg2 Rabbit Monoclonal Antibody - Additional Information

Gene ID 384

Other Names Arginase-2, mitochondrial, 3.5.3.1, Arginase II, Kidney-type arginase, Non-hepatic arginase, Type II arginase, ARG2

Calculated MW 39 kDa KDa

Application Details WB 1:500-1:2000
ICC/IF 1:50-1:200
FC 1:50

Contents Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol, 0.4-0.5mg/ml BSA.

Immunogen A synthesized peptide derived from human Arg2

Purification Affinity-chromatography

Storage

Store at -20°C for one year. For short term storage and frequent use, store at 4°C for up to one month. Avoid repeated freeze-thaw cycles.

Anti-Arg2 Rabbit Monoclonal Antibody - Protein Information

Name ARG2



Function

May play a role in the regulation of extra-urea cycle arginine metabolism and also in down-regulation of nitric oxide synthesis. Extrahepatic arginase functions to regulate L-arginine bioavailability to nitric oxid synthase (NOS). Arginine metabolism is a critical regulator of innate and adaptive immune responses. Seems to be involved in negative regulation of the survival capacity of activated CD4(+) and CD8(+) T cells (PubMed:27745970). May suppress inflammation- related signaling in asthmatic airway epithelium (PubMed:27214549). May contribute to the immune evasion of H.pylori by restricting M1 macrophage activation and polyamine metabolism (By similarity). In fetal dendritic cells may play a role in promoting immune suppression and T cell TNF-alpha production during gestation (PubMed:28614294). Regulates RPS6KB1 signaling, which promotes endothelial cell senescence and inflammation and implicates NOS3/eNOS dysfunction (PubMed:22928666). Can inhibit endothelial autophagy independently of its enzymatic activity implicating mTORC2 signaling (PubMed:25484082). Involved in vascular smooth muscle cell senescence and apoptosis independently of its enzymatic activity (PubMed:23832324). Since NOS is found in the penile corpus cavernosum smooth muscle, the clitoral corpus cavernosum and the vagina, arginase-2 plays a role in both male and female sexual arousal (PubMed:12859189).

Cellular Location Mitochondrion.

Tissue Location

Expressed most strongly in kidney and prostate, much less strongly in the brain, skeletal muscle, placenta, lung, mammary gland, macrophage, uterus, testis and gut, but apparently not in the liver, heart and pancreas. Expressed in activated T cells (PubMed:27745970).

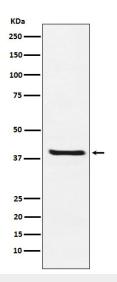
Anti-Arg2 Rabbit Monoclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

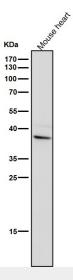
- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Anti-Arg2 Rabbit Monoclonal Antibody - Images

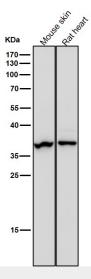




Western blot analysis of Arg2 expression in 293T cell lysate.

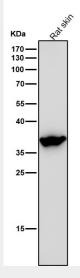


All lanes use the Antibody at 1:3K dilution for 1 hour at room temperature.

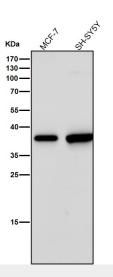


All lanes use the Antibody at 1:3K dilution for 1 hour at room temperature.





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