



#### ACE2

Rabbit Monoclonal antibody(Mab)
Catalog # AD80519

### **Specification**

#### **ACE2 - Product info**

Application IHC-P
Primary Accession Q9BYF1
Reactivity Human
Host Rabbit
Clonality Monoclonal
Calculated MW 92463

#### **ACE2 - Additional info**

Gene ID 59272

**Other Names** 

Angiotensin-converting enzyme 2, 3.4.17.23, Angiotensin-converting enzyme homolog, ACEH, Angiotensin-converting enzyme-related carboxypeptidase, ACE-related carboxypeptidase, 3.4.17.-, Metalloprotease MPROT15 {ECO:0000303|Ref.6}, Processed angiotensin-converting enzyme 2, ACE2 (<a href="http://www.genenames.org/cgi-bin/gene\_symbol\_report?hgnc\_id=13557" target="blank">HGNC:13557</a>)

**Dilution** 

IHC-P~~Ready-to-use

**Storage** 

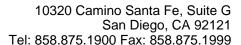
Maintain refrigerated at 2-8°C

#### **ACE2 - Protein Information**

Name ACE2 (HGNC:13557)

**Function** 

Essential counter-regulatory carboxypeptidase of the renin- angiotensin hormone system that is a critical regulator of blood volume, systemic vascular resistance, and thus cardiovascular homeostasis (PubMed:27217402). Converts angiotensin I to angiotensin 1- 9, a nine-amino acid peptide with anti-hypertrophic effects in cardiomyocytes, and angiotensin II to angiotensin 1-7, which then acts as a beneficial vasodilator and anti-proliferation agent, counterbalancing the actions of the vasoconstrictor angiotensin II (PubMed:10924499,

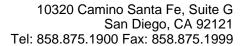




Cellular Location

Tissue Location

PubMed: 10969042, PubMed: 11815627, PubMed:14504186, PubMed:19021774). Also removes the C-terminal residue from three other vasoactive peptides, neurotensin, kinetensin, and des-Arg bradykinin, but is not active on bradykinin (PubMed: 10969042, PubMed: 11815627). Also cleaves other biological peptides, such as apelins (apelin-13, [Pyr1]apelin-13, apelin-17, apelin-36), casomorphins (beta-casomorphin- 7, neocasomorphin) and dynorphin A with high efficiency (PubMed: 11815627, PubMed: 27217402, PubMed:28293165). In addition. ACE2 C-terminus is homologous to collectrin and is responsible for the trafficking of the neutral amino acid transporter SL6A19 to the plasma membrane of gut epithelial cells via direct interaction, regulating its expression on the cell surface and its catalytic activity (PubMed: 18424768, PubMed: 19185582). [Processed angiotensin-converting enzyme 2]: Secreted [Isoform 2]: Apical cell membrane **Expressed in endothelial cells from small** and large arteries, and in arterial smooth muscle cells (at protein level) (PubMed:15141377). Expressed in enterocytes of the small intestine, Leydig cells and Sertoli cells (at protein level) protein level) (PubMed:18424768). Expressed in heart, kidney, testis, and gastrointestinal system (at protein level) (PubMed:10924499, PubMed:10969042,



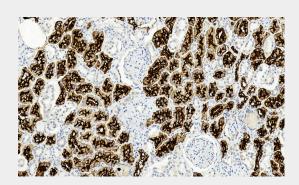


## **ACE2 - Protocols**

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

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

# **ACE2 - Images**



Kidney