# ABclonal www.abclonal.com

# **Recombinant Mouse Renin-1/REN1 Protein**

Catalog No.: RP02135 Recombinant

## **Sequence Information**

**Species Gene ID Swiss Prot** HEK293 cells 19701 P06281

Tags

C-His

**Synonyms** 

D19352; Ren; Ren-1; Ren-A; Ren1c; Ren1d; Rn-1; Rnr; REN1

#### **Product Information**

**Source** Purification
HEK293 cells > 95% by SDS-

PAGE.

#### **Endotoxin**

< 1 EU/ $\mu$ g of the protein by LAL method.

#### **Formulation**

Lyophilized from a 0.2 µm filtered solution of PBS, pH 7.4.Contact us for customized product form or formulation.

#### Reconstitution

Centrifuge the tube before opening. Reconstitute to a concentration of 0.1-0.5 mg/mL in sterile distilled water. Avoid vortex or vigorously pipetting the protein. For long term storage, it is recommended to add a carrier protein or stablizer (e.g. 0.1% BSA, 5% HSA, 10% FBS or 5% Trehalose), and aliquot the reconstituted protein solution to minimize free-thaw cycles.

#### **Contact**

•

www.abclonal.com

### **Background**

Mouse Renin, also known as Renin-1, is a member of the peptidase A1 amily. Renin is synthesized by the juxtaglomerular cells of the kidney in response to decreased blood pressure and sodium concentration. It cleaves angiotensinogen to generate angiotensin I, which can be further converted by angiotensin converting enzyme (ACE) to angiotensin II. Angiotensin II is the active molecule of the reninangiotensin system that acts by binding to angiotensin receptors type 1 and 2 (AT1 and AT2), and has direct pathophysiological effects on the heart and peripheral vasculature. After secretion, inactive prorenin can be proteolytically activated by trypsin, cathepsin B, or other proteinases.

#### **Basic Information**

#### **Description**

Recombinant Mouse Renin-1/REN1 Protein is produced by Mammalian expression system. The target protein is expressed with sequence (Leu22-Arg402) of Mouse Renin-1/REN1 (Accession #P06281) fused with a 10xHis tag at the Cterminus.

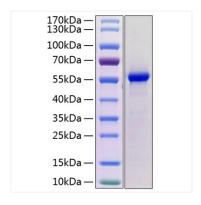
#### **Bio-Activity**

#### Storage

Store at  $-20^{\circ}$ C. Store the lyophilized protein at  $-20^{\circ}$ C to  $-80^{\circ}$ C up to 1 year from the date of receipt. <br/>
-20°C for 3 months, at 2-8°C for up to 1 week.

Avoid repeated freeze/thaw cycles.

# **Validation Data**



Recombinant Mouse Renin/REN1 Protein was determined by SDS-PAGE with Coomassie Blue, showing a band at 50-60kDa.