

Active Recombinant Human ACE protein, His-tagged

Cat. No. ACE-510H **Lot. No.** (See product label)

SPECIFICATION

Product Overview	Active Recombinant Human ACE protein(P12821)(1160~1306 aa), fused with N-terminal His tag, was expressed in E.coli.
Species	Human
Source	E.coli
ProteinLength	1160-1306 aa
Form	Lyophilized from sterile 20mM Tris, 150mM NaCl, pH8.0, containing 1mM EDTA, 1mM DTT, 0.01% SKL, 5% Trehalose and Proclin300.
Bio-activity	Angiotensin-converting enzyme ACE, is a central component of the renin-angiotensin system (RAS), which controls blood pressure by regulating the volume of fluids in the body. It converts the hormone angiotensin I to the active vasoconstrictor angiotensin II. Therefore, ACE indirectly increases blood pressure by causing blood vessels to constrict. ACE inhibitors are widely used as pharmaceutical drugs for treatment of cardiovascular diseases. Besides, Actin Beta (ACTb) has been identified as an interactor of ACE, thus a binding ELISA assay was conducted to detect the interaction of recombinant human ACE and recombinant human ACTb. Briefly, ACE were diluted serially in PBS with 0.01% BSA (pH 7.4). Duplicate samples of 100μL were then transferred to ACTb-coated microtiter wells and incubated for 2h at 37°C. Wells were washed with PBST and incubated for 1h with anti-ACE pAb, then aspirated and washed 3 times. After incubation with HRP labelled secondary

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

antibody, wells were aspirated and washed 3 times. With the addition of substrate solution, wells were incubated 15-25 minutes at 37°C. Finally, add 50μ stop solution to the wells and read at 450nm immediately. The binding activity of ACE and ACTb was in a dose dependent manner.

Molecular Mass	20.2kDa
Endotoxin	<1.0EU per 1μg (determined by the LAL method).
Purity	> 90% as determined by SDS-PAGE.
Storage	Avoid repeated freeze/thaw cycles. Store at -20°C for 12 months. Aliquot and store at -80°C for 12 months.
Reconstitution	Reconstitute in 20mM Tris, 150mM NaCl (pH8.0) to a concentration of 0.1-1.0mg/mL. Do not vortex.

GENE INFORMATION

Gene Name	ACE angiotensin I converting enzyme (peptidyl-dipeptidase A) 1 [Homo sapiens]
Official Symbol	ACE
Synonyms	ACE; angiotensin I converting enzyme (peptidyl-dipeptidase A) 1; DCP1; angiotensin-converting enzyme; ACE1; CD143; kininase II; peptidase P; CD143 antigen; testicular ECA; carboxycathepsin; dipeptidyl carboxypeptidase 1; dipeptidyl carboxypeptidase I; angiotensin converting enzyme, somatic isoform; DCP; ICH; MVCD3;
Gene ID	1636
mRNA Refseq	NM_000789

 Tel: 1-631-559-9269 1-516-512-3133

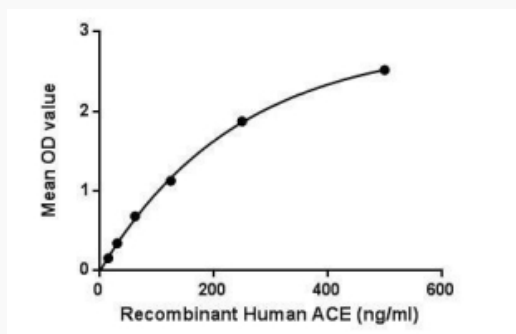
 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

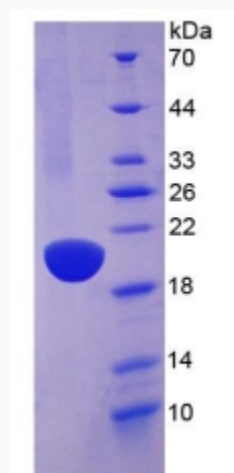
Protein Refseq NP_000780

UniProt ID P12821

Activity



SDS-PAGE



Tel: 1-631-559-9269 1-516-512-3133

Email: info@creative-biomart.com Fax: 1-631-938-8127

45-1 Ramsey Road, Shirley, NY 11967, USA