

CORIN Antibody (Center) Blocking Peptide
Synthetic peptide
Catalog # BP6868c**Specification**

CORIN Antibody (Center) Blocking Peptide - Product InformationPrimary Accession [O9Y5Q5](#)**CORIN Antibody (Center) Blocking Peptide - Additional Information****Gene ID** 10699**Other Names**

Atrial natriuretic peptide-converting enzyme, 3421-, Corin, Heart-specific serine proteinase ATC2, Pro-ANP-converting enzyme, Transmembrane protease serine 10, Atrial natriuretic peptide-converting enzyme, N-terminal propeptide, Atrial natriuretic peptide-converting enzyme, activated protease fragment, Atrial natriuretic peptide-converting enzyme, 180 kDa soluble fragment, Atrial natriuretic peptide-converting enzyme, 160 kDa soluble fragment, Atrial natriuretic peptide-converting enzyme, 100 kDa soluble fragment, CORIN, CRN, TMPRSS10

Target/Specificity

The synthetic peptide sequence used to generate the antibody [AP6868c](/products/AP6868c) was selected from the Center region of human CORIN. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

CORIN Antibody (Center) Blocking Peptide - Protein Information**Name** CORIN**Synonyms** CRN, TMPRSS10**Function**

Serine-type endopeptidase involved in atrial natriuretic peptide (NPPA) and brain natriuretic peptide (NPPB) processing (PubMed: [10880574](http://www.uniprot.org/citations/10880574), PubMed: [21288900](http://www.uniprot.org/citations/21288900), PubMed: [20489134](http://www.uniprot.org/citations/20489134), PubMed: [21763278](http://www.uniprot.org/citations/21763278))

target="_blank">21763278). Converts through proteolytic cleavage the non-functional propeptides NPPA and NPPB into their active hormones, ANP and BNP(1-32) respectively, thereby regulating blood pressure in the heart and promoting natriuresis, diuresis and vasodilation (PubMed:10880574, PubMed:21288900, PubMed:20489134, PubMed:21763278). Proteolytic cleavage of pro-NPPA also plays a role in female pregnancy by promoting trophoblast invasion and spiral artery remodeling in uterus (PubMed:22437503). Also acts as a regulator of sodium reabsorption in kidney (By similarity).

Cellular Location

Cell membrane; Single-pass type II membrane protein. Note=May easily detach from the endothelial cell membrane [Atrial natriuretic peptide-converting enzyme, 180 kDa soluble fragment]: Secreted. Note=Soluble form produced following cleavage by ADAM10 [Atrial natriuretic peptide-converting enzyme, 100 kDa soluble fragment]: Secreted. Note=Soluble form produced following autocatalytic cleavage

Tissue Location

Highly expressed in heart. Expressed in heart myocytes. Also expressed in pregnant uterus. Detected in blood, in plasma as well as in serum (at protein level)

CORIN Antibody (Center) Blocking Peptide - Protocols

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

- [Blocking Peptides](#)

CORIN Antibody (Center) Blocking Peptide - Images

CORIN Antibody (Center) Blocking Peptide - Background

CORIN is a member of the type II transmembrane serine protease class of the trypsin superfamily. Members of this family are composed of multiple structurally distinct domains. This protein converts pro-atrial natriuretic peptide to biologically active atrial natriuretic peptide, a cardiac hormone that regulates blood volume and pressure. This protein may also function as a pro-brain-type natriuretic peptide convertase.

CORIN Antibody (Center) Blocking Peptide - References

Fox,A.A., et.al., Anesthesiology 110 (4), 738-747 (2009)