

## ST14 Antibody (C-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP6248a

## **Specification**

#### ST14 Antibody (C-term) - Product Information

Application
Primary Accession
Other Accession
Reactivity
Host
Clonality
WB, IHC-P,E
Q9Y5Y6
NP\_068813
Human, Mouse
Rabbit
Polyclonal

Isotype Rabbit Ig
Antigen Region 826-855

ST14 Antibody (C-term) - Additional Information

#### **Gene ID 6768**

### **Other Names**

Suppressor of tumorigenicity 14 protein, Matriptase, Membrane-type serine protease 1, MT-SP1, Prostamin, Serine protease 14, Serine protease TADG-15, Tumor-associated differentially-expressed gene 15 protein, ST14, PRSS14, SNC19, TADG15

## **Target/Specificity**

This ST14 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 826-855 amino acids from the C-terminal region of human ST14.

#### **Dilution**

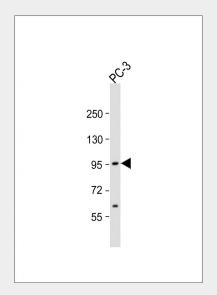
WB~~1:1000 IHC-P~~1:10~50

### **Format**

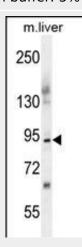
Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

### Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.



Anti-ST14 Antibody (C-term) at 1:1000 dilution + PC-3 whole cell lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 95 kDa Blocking/Dilution buffer: 5% NFDM/TBST.



ST14 Antibody (C-term R841) (Cat. #AP6248a) western blot analysis in mouse liver tissue lysates (35ug/lane). This demonstrates the ST14 antibody detected the ST14 protein (arrow).



### **Precautions**

ST14 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

ST14 Antibody (C-term) - Protein Information

Name ST14

Synonyms PRSS14, SNC19, TADG15

### **Function**

Degrades extracellular matrix. Proposed to play a role in breast cancer invasion and metastasis. Exhibits trypsin-like activity as defined by cleavage of synthetic substrates with Arg or Lys as the P1 site. Involved in the terminal differentiation of keratinocytes through prostasin (PRSS8) activation and filaggrin (FLG) processing.

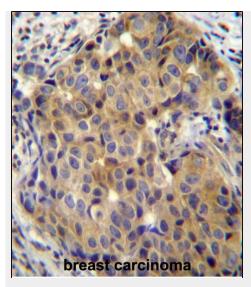
# **Cellular Location**

Membrane; Single-pass type II membrane protein

# ST14 Antibody (C-term) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture



ST14 Antibody (C-term) (Cat. #AP6248a)immunohistochemistry analysis in formalin fixed and paraffin embedded human breast carcinoma followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of ST14 Antibody (C-term) for immunohistochemistry. Clinical relevance has not been evaluated.

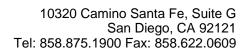
# ST14 Antibody (C-term) - Background

ST14 is an epithelial-derived, integral membrane serine protease. This protease forms a complex with the Kunitz-type serine protease inhibitor, HAI-1, and is found to be activated by sphingosine 1-phosphate. This protease has been shown to cleave and activate hepatocyte growth factor/scattering factor, and urokinase plasminogen activator, which suggest the function of this protease as an epithelial membrane activator for other proteases and latent growth factors. The expression of this protease has been associated with breast, colon, prostate, and ovarian tumors, which implicates its role in cancer invasion, and metastasis.

## ST14 Antibody (C-term) - References

Santin, A.D., et al., Cancer 98(9):1898-1904 (2003).

Oberst, M.D., et al., J. Biol. Chem. 278(29):26773-26779 (2003). Ihara, S., et al., J. Biol. Chem. 277(19):16960-16967 (2002). Benaud, C.M., et al., Clin. Exp. Metastasis





19(7):639-649 (2002). Benaud, C., et al., J. Biol. Chem. 277(12):10539-10546 (2002).