# abcam

# Product datasheet

# Native Cow Plasminogen protein ab62500

**Description** 

Product name Native Cow Plasminogen protein

**Purity** > 95 % Affinity purified.

Purified by gel filtration and affinity chromatography. Purity is determined by SDS-PAGE analysis.

**Expression system** Native

Protein length Full length protein

Animal free No
Nature Native
Species Cow

Additional sequence information Native glu-plasminogen is prepared from fresh frozen plasma

## **Specifications**

Our **Abpromise guarantee** covers the use of **ab62500** in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

**Applications** Functional Studies

SDS-PAGE

Form Liquid

Additional notes Concentration varies from lot to lot but is between 5-10mg/ml

**Preparation and Storage** 

Stability and Storage Shipped at 4°C. Upon delivery aliquot and store at -20°C. Avoid freeze / thaw cycles.

Constituent: 50% Glycerol

#### **General Info**

**Function** Plasmin dissolves the fibrin of blood clots and acts as a proteolytic factor in a variety of other

processes including embryonic development, tissue remodeling, tumor invasion, and

inflammation. In ovulation, weakens the walls of the Graafian follicle. It activates the urokinase-type plasminogen activator, collagenases and several complement zymogens, such as C1 and C5. Cleavage of fibronectin and laminin leads to cell detachment and apoptosis. Also cleaves fibrin,

1

thrombospondin and von Willebrand factor. Its role in tissue remodeling and tumor invasion may

be modulated by CSPG4. Binds to cells.

Angiostatin is an angiogenesis inhibitor that blocks neovascularization and growth of

experimental primary and metastatic tumors in vivo.

**Tissue specificity** Present in plasma and many other extracellular fluids. It is synthesized in the liver.

Involvement in disease Defects in PLG are a cause of susceptibility to thrombosis (THR) [MIM:188050]. It is a

multifactorial disorder of hemostasis characterized by abnormal platelet aggregation in response

to various agents and recurrent thrombi formation.

Defects in PLG are the cause of plasminogen deficiency (PLGD) [MIM:217090]. PLGD is characterized by decreased serum plasminogen activity. Two forms of the disorder are

distinguished: type 1 deficiency is additionally characterized by decreased plasminogen antigen levels and clinical symptoms, whereas type 2 deficiency, also known as dysplasminogenemia, is characterized by normal, or slightly reduced antigen levels, and absence of clinical manifestations. Plasminogen deficiency type 1 results in markedly impaired extracellular fibrinolysis and chronic mucosal pseudomembranous lesions due to subepithelial fibrin deposition and inflammation. The most common clinical manifestation of type 1 deficiency is ligneous conjunctivitis in which pseudomembranes formation on the palpebral surfaces of the eye progresses to white, yellow-

white, or red thick masses with a wood-like consistency that replace the normal mucosa.

**Sequence similarities**Belongs to the peptidase S1 family. Plasminogen subfamily.

Contains 5 kringle domains. Contains 1 PAN domain.

Contains 1 peptidase S1 domain.

**Domain** Kringle domains mediate interaction with CSPG4.

Post-translational N-linked glycan contains N-acetyllactosamine and sialic acid. O-linked glycans consist of Gal-

GalNAc disaccharide modified with up to 2 sialic acid residues (microheterogeneity).

In the presence of the inhibitor, the activation involves only cleavage after Arg-580, yielding two chains held together by two disulfide bonds. In the absence of the inhibitor, the activation involves

additionally the removal of the activation peptide.

**Cellular localization** Secreted. Locates to the cell surface where it is proteolytically cleaved to produce the active

plasmin. Interaction with HRG tethers it to the cell surface.

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

### Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet
- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit <a href="https://www.abcam.com/abpromise">https://www.abcam.com/abpromise</a> or contact our technical team.

#### Terms and conditions

modifications

•	Guarantee only valid for products bought direct from Abcam or one of our authorized distributors	
		3