

# ARG58569 anti-Prothrombin antibody

Package: 50 μg Store at: -20°C

# Summary

Product Description	Rabbit Polyclonal antibody recognizes Prothrombin
Tested Reactivity	Hu
Tested Application	FACS, IHC-P, WB
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Target Name	Prothrombin
Species	Human
Immunogen	Recombinant protein corresponding to Y97-R124 of Human Prothrombin.
Conjugation	Un-conjugated
Alternate Names	PT; EC 3.4.21.5; Prothrombin; THPH1; Coagulation factor II; RPRGL2

## **Application Instructions**

Application table	Application	Dilution
	FACS	1:150 - 1:500
	IHC-P	0.5 - 1 μg/ml
	WB	0.1 - 0.5 μg/ml
Application Note	IHC-P: Antigen Retrieval: Heat mediation was performed in Citrate buffer (pH 6.0) for 20 min. * The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	

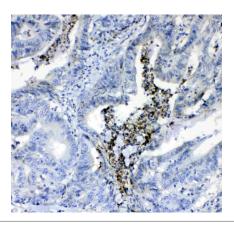
# Properties

Form	Liquid
Purification	Purified.
Buffer	0.9% NaCl, 0.2% Na2HPO4, 0.05% Sodium azide and 4% Trehalose.
Preservative	0.05% Sodium azide
Stabilizer	4% Trehalose
Concentration	0.5 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C or below. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.

## Bioinformation

Gene Symbol	F2
Gene Full Name	coagulation factor II (thrombin)
Background	Coagulation factor II is proteolytically cleaved to form thrombin in the first step of the coagulation cascade which ultimately results in the stemming of blood loss. F2 also plays a role in maintaining vascular integrity during development and postnatal life. Peptides derived from the C-terminus of this protein have antimicrobial activity against E. coli and P. aeruginosa. Mutations in F2 lead to various forms of thrombosis and dysprothrombinemia. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Aug 2015]
Function	Thrombin, which cleaves bonds after Arg and Lys, converts fibrinogen to fibrin and activates factors V, VII, VIII, XIII, and, in complex with thrombomodulin, protein C. Functions in blood homeostasis, inflammation and wound healing. [UniProt]
Calculated Mw	70 kDa
PTM	The gamma-carboxyglutamyl residues, which bind calcium ions, result from the carboxylation of glutamyl residues by a microsomal enzyme, the vitamin K-dependent carboxylase. The modified residues are necessary for the calcium-dependent interaction with a negatively charged phospholipid surface, which is essential for the conversion of prothrombin to thrombin.
	N-glycosylated. N-glycan heterogeneity at Asn-121: Hex3HexNAc3 (minor), Hex4HexNAc3 (minor) and Hex5HexNAc4 (major). At Asn-143: Hex4HexNAc3 (minor) and Hex5HexNAc4 (major). [UniProt]
Cellular Localization	Secreted, extracellular space. [UniProt]

## Images



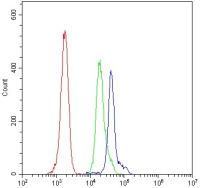
### ARG58569 anti-Prothrombin antibody IHC-P image

Immunohistochemistry: Paraffin-embedded Human colon cancer tissue. Antigen Retrieval: Heat mediated was performed in Citrate buffer (pH 6.0) for 20 min. The tissue section was blocked with 10% goat serum. The tissue section was then stained with 1  $\mu$ g/ml ARG58569 anti-Prothrombin antibody overnight at 4°C.

	Human plasma
<b>kDa</b> 180 - 130 -	
95 -	
72 -	- Ter 1
55 -	
43 -	
34-	
26-	
17-	

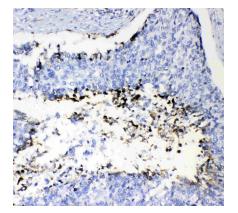
### ARG58569 anti-Prothrombin antibody WB image

Western blot: 50  $\mu g$  of Human plasma lysate stained with ARG58569 anti-Prothrombin antibody at 0.5  $\mu g/ml$ , overnight at 4°C, under reducing conditions.



### antibody (blue) at 1 µg/10^6 cells for 30 min at 20°C, followed by incubation with DyLight®488 labelled secondary antibody. Isotype control antibody (green) was rabbit IgG (1 µg/10^6 cells) used under the same conditions. Unlabelled sample (red) was also used as a

control.



# ARG58569 anti-Prothrombin antibody IHC-P image

ARG58569 anti-Prothrombin antibody FACS image

Flow Cytometry: Human PBMC cells were blocked with 10% normal goat serum and then stained with ARG58569 anti-Prothrombin

Immunohistochemistry: Paraffin-embedded Human lung cancer tissue. Antigen Retrieval: Heat mediated was performed in Citrate buffer (pH 6.0) for 20 min. The tissue section was blocked with 10% goat serum. The tissue section was then stained with 1  $\mu$ g/ml ARG58569 anti-Prothrombin antibody overnight at 4°C.