Factor XIIIa Rabbit mAb (Ready to Use)

Catalog No	YP-rAb-18226
Isotype	IgG
Reactivity	Human,Mouse,Rat
Applications	IHC
Gene Name	F13A1
Protein Name	Factor XIIIa
Purification Process	Protein A
Specificity	This antibody detects endogenous levels of Factor XIIIa
Formulation	The prediluted ready-to-use antibody is diluted in phosphate buffer saline containing stabilizing protein and 0.05% Proclin 300
Source	Monoclonal, Rabbit,IgG
Dilution	Ready to use for IHC Note: For IHC, we suggest antigen retrieval with TE buffer pH 9.0
Concentration	0.5 mg/ml
Purity	≥90%
Storage Stability	2° C to 8° C/1 year,Ship by ice bag
Synonyms	bA525O21.1 ; coagulation factor XIII, A1 polypeptide ; Coagulation factor XIII A chain ; Coagulation factor XIII A1 polypeptide ; Coagulation factor XIII A1 subunit ; Coagulation factor XIII, A polypeptide ; Coagulation factor XIIIa ; F13A ; F13A_HUMAN ; F13a1 ; Factor XIIIA ; Fibrin stabilizing factor, A subunit ; Fibrinoligase ; FSF, A subunit ; Protein glutamine gamma glutamyltransferase A chain ; Protein-glutamine gamma-glutamyltransferase A chain ; TGase ; Transglutaminase A chain ; Transglutaminase, plasma ; Transglutaminase. plasma
Observed Band	
Calculated Molecular Weight	
Cell Pathway	Cytoplasmic
Tissue Specificity	Cytoplasmic
Function	Catalytic activity:Protein glutamine + alkylamine = protein N(5)-alkylglutamine + NH(3).,cofactor:Binds 1 calcium ion per subunit.,Disease:Defects in F13A1 are the cause of F13A deficiency [MIM:134570]. F13A deficiency is an autosomal

	recessive disorder characterized by a life-long bleeding tendency, impaired wound healing and spontaneous abortion in affected women. In addition to the common presentation such as subcutaneous and intramuscular haematomas, severe bleeding such as intracranial hemorrhages may occur.,Function:Factor XIII is activated by thrombin and calcium ion to a transglutaminase that catalyzes the formation of gamma-glutamyl-epsilon-lysine cross-links between fibrin chains, thus stabilizing the fibrin clot. Also cross-link alpha-2-plasmin inhibitor, or fibronectin, to the alpha chains of fibrin.,online information:Factor XIII entry,online information:The Singapore human mutation and polymorphism database,polymorphism:There are four main allelic forms of this protein; F13A*1A, F13A*1B, F13A*2A and F13A*2B. In addition two other intermediate forms (F13A*(2)A and F13A*(2)B) seem to exist. The sequence shown is that of F13A*(2)B.,PTM:The activation peptide is released by thrombin.,similarity:Belongs to the transglutaminase superfamily. Transglutaminase family.,subcellular location:Secreted into the blood plasma. Cytoplasmic in most tissues, but also secreted in the blood plasma.,subunit:Tetramer of two A chains and two B chains.,
Background	This gene encodes the coagulation factor XIII A subunit. Coagulation factor XIII is the last zymogen to become activated in the blood coagulation cascade. Plasma factor XIII is a heterotetramer composed of 2 A subunits and 2 B subunits. The A subunits have catalytic function, and the B subunits do not have enzymatic activity and may serve as plasma carrier molecules. Platelet factor XIII is comprised only of 2 A subunits, which are identical to those of plasma origin. Upon cleavage of the activation peptide by thrombin and in the presence of calcium ion, the plasma factor XIII dissociates its B subunits and yields the same active enzyme, factor XIIIa, as platelet factor XIII. This enzyme acts as a transglutaminase to catalyze the formation of gamma-glutamyl-epsilon-lysine crosslinking between fibrin molecules, thus stabilizing the fibrin clot. It also crosslinks alpha-2-plasmin inhibitor, or
matters needing attention	Avoid repeated freezing and thawing!
Usage suggestions	This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.