

## Murine Anti-Prothrombin

### Clone GMA-091

Prothrombin is the vitamin K-dependent zymogen of thrombin. As a single chain protein (Mr 72,000) it contains 10 Gla residues, 2 kringle domains and three N-linked carbohydrate units. Prothrombin is activated to thrombin by the prothrombinase complex consisting of enzyme factor Xa, cofactor factor Va, phospholipid and Ca<sup>2+</sup>. GMA-091 (previously known as GMA-028) binds prothrombin, prethrombin 1, fragment 1.2 and fragment 2 by Western blot and solid-phase ELISA. It does not cross-react with human thrombin, murine prothrombin, Factor IX, or Factor X.

#### Description

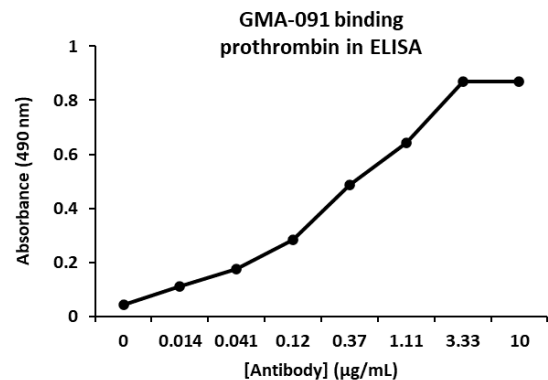
<b>Antibody Source:</b>	mouse monoclonal, IgG <sub>2a</sub>
<b>Antigen Species Bound:</b>	murine
<b>Specificity:</b>	prothrombin fragment 2
<b>Immunogen:</b>	human prothrombin

#### Formulation and Storage

<b>Purity:</b>	Purified by protein G affinity chromatography from serum-free cell culture supernatant.
<b>Product Formulation:</b>	Lyophilized from a ≥1 mg/ml solution in 20 mM NaH <sub>2</sub> PO <sub>4</sub> 0.15 M NaCl, 1.0% (w/v) mannitol, pH 7.4. Concentration determined by absorbance measurement at 280 nm and using an extinction coefficient of 1.4 (ε <sub>0.1%</sub> ).
<b>Reconstitution:</b>	Reconstitute with deionized water.
<b>Storage:</b>	Store lyophilized or reconstituted and aliquoted material at -20 °C for prolonged periods. Avoid freeze-thaw cycles. Alternatively, add 0.02% (w/v) sodium azide to reconstituted solution and store at 4 °C.
<b>Country of origin:</b>	USA
<b>Size Options:</b>	0.1 mg or 0.5 mg

#### Applications

<b>Working Concentration:</b>	Approximately 1-5 µg/ml. Researcher should titer antibody in specific assay.
<b>ELISA:</b>	Binds human prothrombin, prethrombin 1, fragment 1.2 and fragment 2 in solid-phase ELISA.
<b>Immunoblotting:</b>	Binds human prothrombin (~72kD), prethrombin 1 (~50kD), fragment 1.2 (~37kD) and fragment 2 (~13kD) under reduced conditions.



**Western blot, reduced, with 1 µg/ml GMA-091**

