

**DESCRIPTION**

<b>Species Reactivity</b>	Mouse
<b>Specificity</b>	Detects mouse Prostatic/Prss8 in ELISAs and Western blots. In sandwich immunoassays, less than 0.2% cross-reactivity is observed with recombinant human Prostatic.
<b>Source</b>	Polyclonal Goat IgG
<b>Purification</b>	Antigen Affinity-purified
<b>Immunogen</b>	Mouse myeloma cell line NS0-derived recombinant mouse Prostatic/Prss8 Ala30-Gln289 Accession # Q99L44
<b>Formulation</b>	Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details. *Small pack size (-SP) is supplied either lyophilized or as a 0.2 µm filtered solution in PBS.

**APPLICATIONS**

**Please Note:** Optimal dilutions should be determined by each laboratory for each application. *General Protocols* are available in the *Technical Information* section on our website.

	<b>Recommended Concentration</b>	<b>Sample</b>
<b>Western Blot</b>	0.1 µg/mL	Recombinant Mouse Prostatic/Prss8 (Catalog # 2968-SE)
<b>Mouse Prostatic/Prss8 Sandwich Immunoassay</b>		<b>Reagent</b>
<b>ELISA Capture</b>	0.2-0.8 µg/mL	Mouse Prostatic/Prss8 Antibody (Catalog # AF2968)
<b>ELISA Detection</b>	0.1-0.4 µg/mL	Mouse Prostatic/Prss8 Biotinylated Antibody (Catalog # BAF2968)
<b>Standard</b>		Recombinant Mouse Prostatic/Prss8 (Catalog # 2968-SE)

**PREPARATION AND STORAGE**

<b>Reconstitution</b>	Reconstitute at 0.2 mg/mL in sterile PBS.
<b>Shipping</b>	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below. *Small pack size (-SP) is shipped with polar packs. Upon receipt, store it immediately at -20 to -70 °C
<b>Stability &amp; Storage</b>	<b>Use a manual defrost freezer and avoid repeated freeze-thaw cycles.</b> <ul style="list-style-type: none"> <li>● 12 months from date of receipt, -20 to -70 °C as supplied.</li> <li>● 1 month, 2 to 8 °C under sterile conditions after reconstitution.</li> <li>● 6 months, -20 to -70 °C under sterile conditions after reconstitution.</li> </ul>

**BACKGROUND**

Prostatic encoded by the Prss8 gene, also known as channel activating protease 1, is a serine protease with a trypsin-like substrate specificity (1, 2). The proenzyme possesses a C-terminal membrane-spanning domain that can be proteolytically processed to generate a secreted form of the enzyme. The secreted form of prostatic has been purified from seminal fluid (2). Prostatic is highly expressed in the prostate gland, and is expressed at lower levels in the lung, kidney, liver, salivary gland, and pancreas (3). The peptidase activity of prostatic is involved in the regulation of epithelial sodium channels (4, 5). Secreted from NS0 cells as the active form, the purified recombinant mouse (rm) Prostatic most likely consists of a disulfide bond-linked two chains with N-terminal sequences of I<sub>45</sub>TGGGSAKPG and A<sub>30</sub>DGTE, respectively (3). The enzymatic activity of rmProstatic is effectively inhibited by rmHAI-1 and rmHAI-2B (Catalog # 1141-PI and 1107-PI).

**References:**

1. Vuagniaux, G. *et al.* (2000) *J. Am. Soc. Nephrol.* **11**:828.
2. Yu J.X. *et al.* (1994) *J. Biol. Chem.* **269**:18843.
3. Yu J.X. *et al.* (1995) *J. Biol. Chem.* **270**:13483.
4. Caldwell R.A. *et al.* (2004) *Am. J. Physiol. Cell Physiol.* **286**:C190.
5. Tong Z. *et al.* (2004) *Am. J. Physiol. Lung Cell Mol. Physiol.* **287**:L928.