# Datasheet for ABIN873212

## anti-GGCX antibody (AA 51-150)

## Overview

<table>
<thead>
<tr>
<th>Quantity</th>
<th>100 μL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Target</td>
<td>GGCX</td>
</tr>
<tr>
<td>Binding Specificity</td>
<td>AA 51-150</td>
</tr>
<tr>
<td>Reactivity</td>
<td>Human</td>
</tr>
<tr>
<td>Host</td>
<td>Rabbit</td>
</tr>
<tr>
<td>Clonality</td>
<td>Polyclonal</td>
</tr>
<tr>
<td>Conjugate</td>
<td>This GGCX antibody is un-conjugated</td>
</tr>
<tr>
<td>Application</td>
<td>ELISA, Immunofluorescence (Cultured Cells) (IF (cc)), Immunofluorescence (Paraffin-embedded Sections) (IF (p)), Immunohistochemistry (Paraffin-embedded Sections) (IHC (p)), Immunohistochemistry (Frozen Sections) (IHC (fro))</td>
</tr>
</tbody>
</table>

## Product Details

<table>
<thead>
<tr>
<th>Immueogen</th>
<th>KLH conjugated synthetic peptide derived from human GGCX</th>
</tr>
</thead>
<tbody>
<tr>
<td>Isotype</td>
<td>IgG</td>
</tr>
<tr>
<td>Predicted Reactivity</td>
<td>Human, Mouse, Rat, Cow, Sheep, Pig, Horse, Rabbit</td>
</tr>
<tr>
<td>Purification</td>
<td>Purified by Protein A.</td>
</tr>
</tbody>
</table>

## Target Details

<table>
<thead>
<tr>
<th>Target</th>
<th>GGCX</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alternative Name</td>
<td>GGCX (GGCX Products)</td>
</tr>
</tbody>
</table>
Target Details

**Background:** GGCX is a 758 amino acid multi-pass membrane protein. Localized to the membrane of the endoplasmic reticulum, GGCX functions to mediate the vitamin K-dependent carboxylation of glutamate residues on target proteins, thereby producing calcium binding gamma-carboxyglutamate (Gla) residues on these proteins and simultaneously converting vitamin K to vitamin K epoxide. GGCX exists as a monomer and, via its ability to modify glutamate residues, it accomplishes the post-translational changes that are necessary for the activity of all vitamin K-dependent proteins (such as blood coagulation and bone matrix proteins). Defects in the gene encoding GGCX are the cause of combined deficiency of vitamin K-dependent clotting factors 1 (VKCFD1) and PXE-like disorder with multiple coagulation factor deficiency, both of which are characterized by abnormal skin, blood or bone function.

**Subcellular location:** Cytoplasm, Cell membrane

**Synonyms:** Gamma glutamyl carboxylase, Gamma-glutamyl carboxylase, GC antibody GGCX, Peptidyl glutamate 4 carboxylase, Peptidyl-glutamate 4-carboxylase, Vitamin K dependent gamma carboxylase, Vitamin K gamma glutamyl carboxylase, Vitamin K-dependent gamma-carboxylase, VKCFD 1, VKCFD1, VKGC_HUMAN.

<table>
<thead>
<tr>
<th>Gene ID:</th>
<th>2677</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pathways:</td>
<td>SARS-CoV-2 Protein Interactome</td>
</tr>
</tbody>
</table>

**Application Details**

<table>
<thead>
<tr>
<th>Application Notes:</th>
<th>ELISA 1:500-1000</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>IHC-P 1:200-400</td>
</tr>
<tr>
<td></td>
<td>IHC-F 1:100-500</td>
</tr>
<tr>
<td></td>
<td>IF(IHC-P) 1:50-200</td>
</tr>
<tr>
<td></td>
<td>IF(IHC-F) 1:50-200</td>
</tr>
<tr>
<td></td>
<td>IF(ICC) 1:50-200</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Restrictions:</th>
<th>For Research Use only</th>
</tr>
</thead>
</table>

**Handling**

<table>
<thead>
<tr>
<th>Format:</th>
<th>Liquid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Concentration:</td>
<td>1 µg/µL</td>
</tr>
<tr>
<td>Buffer:</td>
<td>0.01M TBS (pH 7.4) with 1 % BSA, 0.03 % Proclin300 and 50 % Glycerol.</td>
</tr>
<tr>
<td>Preservative:</td>
<td>ProClin</td>
</tr>
</tbody>
</table>
## Handling

<table>
<thead>
<tr>
<th>Precaution of Use</th>
<th>This product contains ProClin: a POISONOUS AND HAZARDOUS SUBSTANCE, which should be handled by trained staff only.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Storage</td>
<td>-20 °C</td>
</tr>
<tr>
<td>Storage Comment</td>
<td>Store at -20°C for one year. Avoid repeated freeze/thaw cycles.</td>
</tr>
<tr>
<td>Expiry Date</td>
<td>12 months</td>
</tr>
</tbody>
</table>