

## Recombinant SimpleStep ELISA®

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## Overview

**Detection method** Colorimetric

Intra-assay

Sample	n	Mean	SD	CV%
Serum	8			2.8%

Inter-assay

Sample	n	Mean	SD	CV%
Serum	3			8.1%

**Range** 54.69 pg/ml - 3500 pg/ml

### Sample specific recovery

Sample type	Average %	Range
Serum	104	99% - 108%
Hep Plasma	95	93% - 98%
EDTA Plasma	101	93% - 107%
Cit plasma	90	88% - 94%

Species reactivity Reacts with: Human

## Product overview

Human PGC ELISA kit (ab275552) is a single-wash 90 min sandwich ELISA designed for the quantitative measurement of Human PGC protein in human serum and plasma. It uses our proprietary SimpleStep ELISA® technology. Quantitate Human PGC with 16.5 pg/mL sensitivity.

SimpleStep ELISA® technology employs capture antibodies conjugated to an affinity tag that is recognized by the monoclonal antibody used to coat our SimpleStep ELISA® plates. This approach to sandwich ELISA allows the formation of the antibody-analyte sandwich complex in a single step, significantly reducing assay time. See the SimpleStep ELISA® protocol summary in the image section for further details. Our SimpleStep ELISA® technology provides several benefits:

- Single-wash protocol reduces assay time to 90 minutes or less
- High sensitivity, specificity and reproducibility from superior antibodies
- Fully validated in biological samples
- 96-wells plate breakable into 12 x 8 wells strips

A 384-well SimpleStep ELISA® microplate ([ab203359](#)) is available to use as an alternative to the 96-well microplate provided with SimpleStep ELISA® kits.

## Notes

Pepsinogen C (PGC, progastricsin) is an aspartic proteinase zymogen that belongs to the peptidase family A1. Pepsin C, the activated protease, is a digestive enzyme that is produced in the stomach and constitutes a major component of the gastric mucosa. Pepsinogen C protein is synthesized as an inactive zymogen that autocatalyzes by sequential cleavage of the prosegment into its active mature form at low pH. Pepsinogen C polymorphisms are associated with susceptibility to gastric cancers. Serum levels of this enzyme are used as a biomarker for certain gastric diseases including Helicobacter pylori related gastritis.

## Platform

Pre-coated microplate (12 x 8 well strips)

## Properties

### Storage instructions

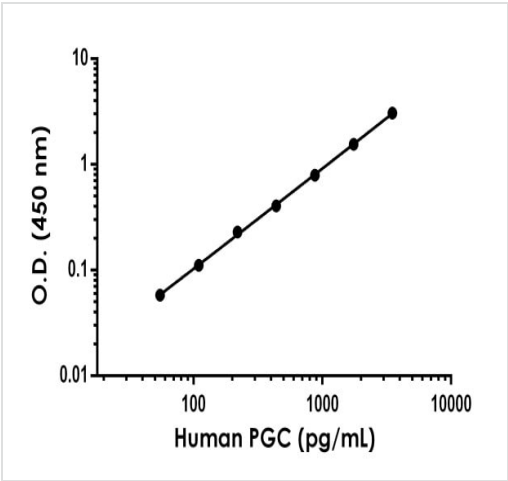
Store at +4°C. Please refer to protocols.

Components	1 x 96 tests
10X Human PGC (Pepsinogen C) Capture Antibody	1 x 600µl
10X Human PGC (Pepsinogen C) Detector Antibody	1 x 600µl
10X Wash Buffer PT (ab206977)	1 x 20ml
Antibody Diluent 4BI	1 x 6ml
Human PGC (Pepsinogen C) Lyophilized Recombinant Protein	2 vials
Plate Seals	1 unit

Components	1 x 96 tests
Sample Diluent NS (ab193972)	1 x 50ml
SimpleStep Pre-Coated 96-Well Microplate (ab206978)	1 unit
Stop Solution	1 x 12ml
TMB Development Solution	1 x 12ml

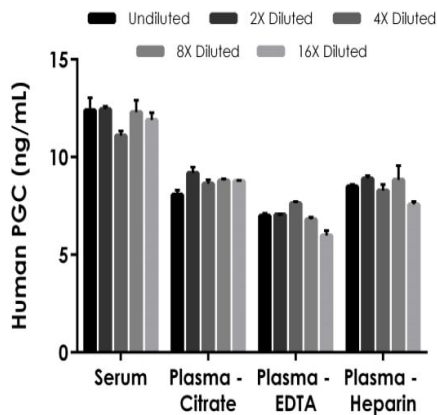
Function	Hydrolyzes a variety of proteins.
Sequence similarities	Belongs to the peptidase A1 family. Contains 1 peptidase A1 domain.
Cellular localization	Secreted.

Images



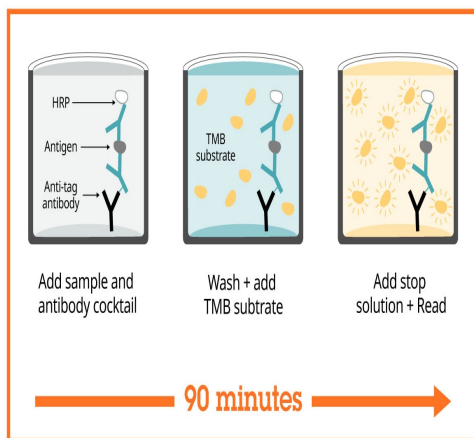
Example of human PGC standard curve in Sample Diluent NS.

The PGC standard curve was prepared as described in Section 10. Raw data values are shown in the table. Background-subtracted data values (mean +/- SD) are graphed.



Interpolated concentrations of native PGC in human serum and plasma samples.

The concentrations of PGC were measured in duplicates, interpolated from the PGC standard curves and corrected for sample dilution. Undiluted samples are as follows: serum 25%, plasma (citrate) 25%, plasma (EDTA) 50%, and plasma (heparin) 25%. The interpolated dilution factor corrected values are plotted (mean  $\pm$  SD,  $n=2$ ). The mean PGC concentration was determined to be 12.02 ng/mL in serum, 8.96 ng/mL in plasma (citrate), 6.89 ng/mL in and plasma (EDTA), and 8.41 ng/mL in plasma (heparin).



SimpleStep ELISA technology allows the formation of the antibody-antigen complex in one single step, reducing assay time to 90 minutes. Add samples or standards and antibody mix to wells all at once, incubate, wash, and add your final substrate. See protocol for a detailed step-by-step guide.

Sandwich ELISA - Human PGC ELISA Kit  
(ab275552)

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Consistent and  
reproducible results



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scalable supply  
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Success from the  
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Confirmed  
specificity



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compliant  
Animal-free  
production

To learn more about the advantages of recombinant antibodies see [here](#).

Sandwich ELISA - Human PGC ELISA Kit  
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Single-wash 90-minute  
protocol



**Flexible**

Matched antibody pairs  
available



**Precision antibodies**

High sensitivity, specificity  
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**Scalable**

Now in 10-pack and  
384-well formats

Sandwich ELISA - Human PGC ELISA Kit

(ab275552)

To learn more about the advantages of SimpleStep ELISA® kits  
see [here](#).

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