### Overview

**Product name**: Human C Reactive Protein ELISA Kit (CRP)

**Detection method**: Colorimetric

**Sample type**: Cell culture supernatant, Serum, Plasma

**Assay type**: Sandwich (quantitative)

**Sensitivity**: < 2 pg/ml

**Range**: 34.29 pg/ml - 25000 pg/ml

**Recovery**: > 100%

<table>
<thead>
<tr>
<th>Sample type</th>
<th>Average %</th>
<th>Range</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cell culture supernatant</td>
<td>106.2</td>
<td>95% - 116%</td>
</tr>
<tr>
<td>Serum</td>
<td>116.7</td>
<td>106% - 127%</td>
</tr>
<tr>
<td>Plasma</td>
<td>102.2</td>
<td>93% - 112%</td>
</tr>
</tbody>
</table>

**Assay duration**: Multiple steps standard assay

**Species reactivity**: Reacts with: Human

**Product overview**: Abcam’s C Reactive Protein (CRP) Human ELISA (Enzyme-Linked Immunosorbent Assay) kit is an *in vitro* enzyme-linked immunosorbent assay for the quantitative measurement of Human CRP in serum, plasma, cell culture supernatants.

This assay employs an antibody specific for Human CRP coated on a 96-well plate. Standards and samples are pipetted into the wells and CRP present in a sample is bound to the wells by the immobilized antibody. The wells are washed and biotinylated anti-Human CRP antibody is added. After washing away unbound biotinylated antibody, HRP-conjugated streptavidin is pipetted to the wells. The wells are again washed, a TMB substrate solution is added to the wells and color develops in proportion to the amount of CRP bound. The Stop Solution changes the color from blue to yellow, and the intensity of the color is measured at 450 nm.

Get results in 90 minutes with Human C Reactive Protein ELISA Kit (ab181416) from our SimpleStep ELISA® range.
Notes
Optimization may be required with urine samples.

Tested applications
Suitable for: Sandwich ELISA

Platform
Microplate

Properties

Storage instructions
Store at -20°C. Please refer to protocols.

<table>
<thead>
<tr>
<th>Components</th>
<th>1 x 96 tests</th>
</tr>
</thead>
<tbody>
<tr>
<td>20X Wash Buffer Concentrate</td>
<td>1 x 25ml</td>
</tr>
<tr>
<td>300X HRP-Streptavidin Concentrate</td>
<td>1 x 200µl</td>
</tr>
<tr>
<td>5X Assay Diluent B</td>
<td>1 x 15ml</td>
</tr>
<tr>
<td>5X Assay Diluent D</td>
<td>2 x 15ml</td>
</tr>
<tr>
<td>CRP Microplate (12 x 8 well strips)</td>
<td>1 unit</td>
</tr>
<tr>
<td>Biotinylated anti-Human CRP (lyophilized)</td>
<td>2 vials</td>
</tr>
<tr>
<td>Recombinant Human CRP Standard (lyophilized)</td>
<td>2 vials</td>
</tr>
<tr>
<td>Stop Solution</td>
<td>1 x 8ml</td>
</tr>
<tr>
<td>TMB One-Step Substrate Reagent</td>
<td>1 x 12ml</td>
</tr>
</tbody>
</table>

Function
Displays several functions associated with host defense: it promotes agglutination, bacterial capsular swelling, phagocytosis and complement fixation through its calcium-dependent binding to phosphorylcholine. Can interact with DNA and histones and may scavenge nuclear material released from damaged circulating cells.

Tissue specificity
Found in plasma.

Sequence similarities
Belongs to the pentaxin family.
Contains 1 pentaxin domain.

Cellular localization
Secreted.

Applications

Our Abpromise guarantee covers the use of ab99995 in the following tested applications.
The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.
Sandwich ELISA- hu CRP (ab99995)

Typical Standard Curve

Representative Standard Curve using ab99995.

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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