



## Streptavidin – R-Phycoerythrin (R-PE)

Applicable to:

2012-0100 (100µg)  
2012-1000 (1mg)

Release 2

16/02/2016

### Product Details

Specificity	Biotin
Host species	<i>E. coli</i> and red algae
Format	Lyophilized
Buffer	Phosphate buffer
Preservatives	None
Shipping	Ambient temperature
Storage	-20°C
Shelf life	2 years

Our streptavidin conjugates are produced using our Lightning-Link® bioconjugation technology, therefore providing high quality, stable covalent conjugates for use in your application.

### Background Information

Streptavidin is purified from the bacterium *Streptomyces avidinii*. It is a tetrameric protein that is composed of identical subunits, with the tetramer having a molecular weight of approximately 53kDa. Each subunit binds one biotin molecule with a very high degree of specificity and affinity. The  $K_d$  for this interaction is in the region of  $10^{-15}$ M.

R-Phycoerythrin (R-PE) is a 240kDa phycobiliprotein that is isolated from red algae. R-PE has a bright red-orange fluorescence with a high quantum yield, and is brighter than other conventional fluorophores and phycobiliproteins. The absorbance spectrum of R-PE covers a

range of excitation wavelengths, which provides an advantage for multi-colour immunofluorescent staining or cell-sorting. The emission maximum of R-PE is at 575nm. R-PE is used for fluorescence-based detection, often in assays which require high sensitivity.

### Shipping conditions

The product is shipped at ambient temperature. Store the product at -20°C upon receipt.

### Potential Applications

Including, but not limited to:

- Flow cytometry
- ELISA
- Immunoblotting
- Immunohistochemistry
- Immunocytochemistry

### Related Products

Our Lightning-Link® Biotin conjugation kits allow you directly conjugate your primary antibody to biotin in under 20 minutes with only 30 seconds hands-on time:

<https://www.innovabiosciences.com/antibody-labeling-kits/biotin-streptavidin/lightning-link-biotin.html>

For technical enquiries get in touch with our technical support team at:

[technical.enquiries@innovabiosciences.com](mailto:technical.enquiries@innovabiosciences.com)

For further information see our website:

[www.innovabiosciences.com](http://www.innovabiosciences.com)

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