

## Avidin

**Description:**Avidin is a glycosylated polypeptide chain having a molecular mass of 68kDa and containing 4 subunits each with a binding site for biotin. The Avidin is purified by affinity chromatographic techniques. The purification procedure ensures minimal contamination by other proteins or DNA. The resulting high activity and purity of the product gives very low non-specific binding (NSB).

**Catalog #:**PRPS-507

For research use only.

**Synonyms:**Avidin, AVD, AVID.

**Source:**Hen's egg white.

**Physical Appearance:**Sterile Filtered white lyophilized powder.

**Purity:**Greater than 97.0% as determined by SDS-PAGE.

### Stability:

Lyophilized Avidin although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution Avidin should be stored at 4°C between 2-7 days and for future use below -18°C. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Please prevent freeze-thaw cycles.

### Usage:

NeoBiolab's products are furnished for LABORATORY RESEARCH USE ONLY. The product may not be used as drugs, agricultural or pesticidal products, food additives or household chemicals.

### Applications:

Avidin may be used to visualize biotin conjugated molecules in ELISA, blotting and histological techniques.

### Solubility:

It is recommended to reconstitute the lyophilized Avidin in sterile 18M-cm H<sub>2</sub>O not less than 100µg/ml or more than 10mg/ml solutions.

### Introduction:

Avidin is a tetrameric protein of 4 identical subunits (homotetramer) each of which can bind to biotin with a high degree of affinity and specificity. Avidin molecular weight in its tetrameric form is estimated to be between 66-69 kDa. Avidin is produced in the oviducts of birds, reptiles and amphibians and is subsequently deposited in the whites of their eggs. In the chicken egg white, avidin makes up roughly 0.05% of total protein (approximately 1.8 mg per egg). 10% of Avidin's molecular weight is ascribed to carbohydrate content which is composed of four to five mannose and three N-acetylglucosamine residues. Avidin has at least three distinctive oligosaccharide structural types which are similar in structure and composition. The dissociation constant (K<sub>D</sub>) of avidin is approximately 10<sup>-15</sup>M, making it one of the strongest known non-covalent bonds.

### Biological Activity:

11-15 units/mg protein, 1 unit binds 1

*To place an order, please [Click HERE](#).*