

## **QuantiChrom™ Protein Assay Kit**

The protein is known as the "building blocks of life" and is one of the most important macromolecules in life science. Proteins are polypeptides made up of amino acids and play various key roles in all aspects of biology. Protein quantitation is a very common practice for life scientists.

Simple, direct and automation-ready procedures for measuring protein concentration are becoming popular in research and drug discovery. BioAssay Systems' QuantiChrom protein assay kit is based on an improved Coomassie Blue G method. The dye forms a blue complex specifically with protein, and the intensity of color, measured at 595nm, is directly proportional to the protein concentration in the sample. The optimized formulation substantially reduces interference by substances in the raw samples and exhibits increased sensitivity towards peptides.

### **APPLICATIONS**

Direct Assays: total protein concentration.

#### **KEY FEATURES**

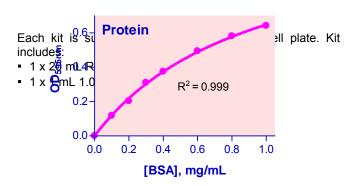
Sensitive and accurate. Use 10  $\mu$ L samples. Detection range 0.06 – 1.0 mg /mL protein in 96-well plate assay.

**Simple and high-throughput**. The "mix-and-read" procedure involves addition of a single working reagent and reading the optical density. Can be readily automated as a high-throughput assay in 96-well plates for thousands of samples per day.

**Low interference**. Glucose, tris, vitamins, and amino acids, DNA, RNA, salts, EDTA (< 12 mM), phenol (< 50 mM), urea (< 0.6 M), Triton (< 0.1%) and SDS (< 0.01% SDS) do not interfere in the assay.

Versatility: assays can be executed in 96-well plate or cuvet

# QuantiChrom<sup>™</sup> Protein Assay Kit QCPR-500



Standard Curve in 96-well plate assay

### **REFERENCES:**

- [1]. Bradford, M. (1976). A rapid and sensitive method for the quantitation of microgram quantities of protein utilizing the principle of protein-dye binding. Anal. Biochem. 72: 248-354
- 2. Friedenauer, S. and Berlet, H.H. (1989). Sensitivity and variability of the Bradford protein assay in the presence of detergents. Anal. Biochem. 178: 263-268.
- 3. Stoscheck, C. M. (1990). Increased uniformity in the response of the Coomassie Blue G protein assay to different proteins. Anal. Biochem. 184: 111-116.