

Product Information

Molecular Weight Marker (M.W. 30,000–200,000)

Catalog Number **SDS6H2**

Storage Temperature 2–8 °C

Product Description

Polyacrylamide gel electrophoresis (PAGE) in the presence of the anionic detergent, sodium dodecyl sulfate (SDS), has proven to be a useful tool for the separation of protein subunits and the determination of their molecular masses. The proteins supplied in this mixture provide a molecular mass range common to most proteins and their subunits.

This protein standard is a lyophilized mixture of the six proteins shown in Table 1. The mixture has been formulated to yield well-defined bands, which after SDS-PAGE and staining with Brilliant Blue R (Catalog Number B8647) are approximately equal in color intensity.

1 vial is sufficient for 200-300 applications on a mini-gel (10 × 10 cm).

Table 1.
Protein Mixture in SDS6H2

Protein	Approximate Molecular Mass
Myosin, porcine	200,000
β-Galactosidase, from <i>E. coli</i>	116,000
Phosphorylase b, from rabbit muscle	97,000
Albumin, bovine	66,000
Albumin, from chicken egg white (Ovalbumin)	45,000
Carbonic Anhydrase, from bovine erythrocytes	29,000

Precautions and Disclaimer

This product is for R&D use only, not for drug, household, or other uses. Please consult the Material Safety Data Sheet for information regarding hazards and safe handling practices.

Preparation Instructions

Instructions for SDS Laemmli PAGE System only.

1. 1× Sample Buffer (62.5 mM Tris HCl, pH 6.8, containing 2% SDS, 5% 2-mercaptoethanol, 10% glycerol, and 0.002% bromophenol blue) – Prepared by mixing Laemmli Sample Buffer, 2× concentrate (Catalog Number S3401) 1:1 with deionized water.
2. Preparation of the standard mixture – Add 1.5 ml of 1× Sample Buffer to the SDS6H2 vial. Mix by inversion and then mix again using a vortex mixer for five seconds to complete solubilization. Aliquot and freeze at –20 °C.

Storage/Stability

The product ships on wet ice and storage at 2–8 °C is recommended. After reconstitution with 1× Sample Buffer, store in aliquots at –20 °C or below.

Procedure

1. Incubate an aliquot in a boiling water bath for 1 minute immediately before loading the standard mixture on gel.
2. Apply 5 µl/well for a mini-gel (10 × 10 cm). Apply 10 µl/well for a standard size gel (16 × 14 cm).

References

1. Laemmli, U.K., *Nature*, **227**, 680 (1970).

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