AceColor™ Prestained Protein Marker (15-140 kDa)

Cat. No.	SBP104
Pack Size	2*250μL/Tube, 10*250μL/Tube, 100mL/Bottle, 1L/Bottle
Appearance	Dark blue solution
Storage Buffer	20mM Tris-H3PO4(pH7.5), 2mM EDTA, 1.5% (W/V) SDS, 15% (W/V) Glycerol, 4M Urea, 3mM DTT, 0.1% (V/V) Proclin300
Quality Control	Tested in SDS-PAGE and western blotting
Shelf life	Stable at -20°C for 36 months ; 4°C for 3 months ; 25°C for 4 weeks

Description

AceColor™ Prestained Protein Ladder is a high-performance, ready-to-use molecular weight marker designed to provide clear, consistent, and reliable results in SDS-PAGE and Western blotting workflows. This ladder consists of **eight prestained proteins**, precisely spanning a molecular weight range of 15 to 140 kDa, with a distinct **orange reference band at 70 kDa** for easy orientation and gel monitoring.

Key Features

- **Wide Coverage:** Contains 8 prestained protein bands covering 15–140 kDa, ideal for most protein separation and detection needs.
- **70 kDa Orange Reference Band:** Enhances visualization and orientation across gel and blot membranes.
- **Ready-to-Use Convenience:** Pre-formulated in gel loading buffer—no boiling, dilution, or reducing agents required.
- **Exceptional Lot Consistency:** Guaranteed <3% lot-to-lot variation in apparent molecular weight, ensuring reproducibility.
- **Broad Compatibility:** Validated for use with SDS-PAGE, PVDF, nitrocellulose, and nylon membranes for transfer verification and molecular sizing.

Applications

- Monitoring protein migration during SDS-PAGE
- Verification of transfer efficiency in Western blot
- Estimation of target protein molecular weights

Important Information

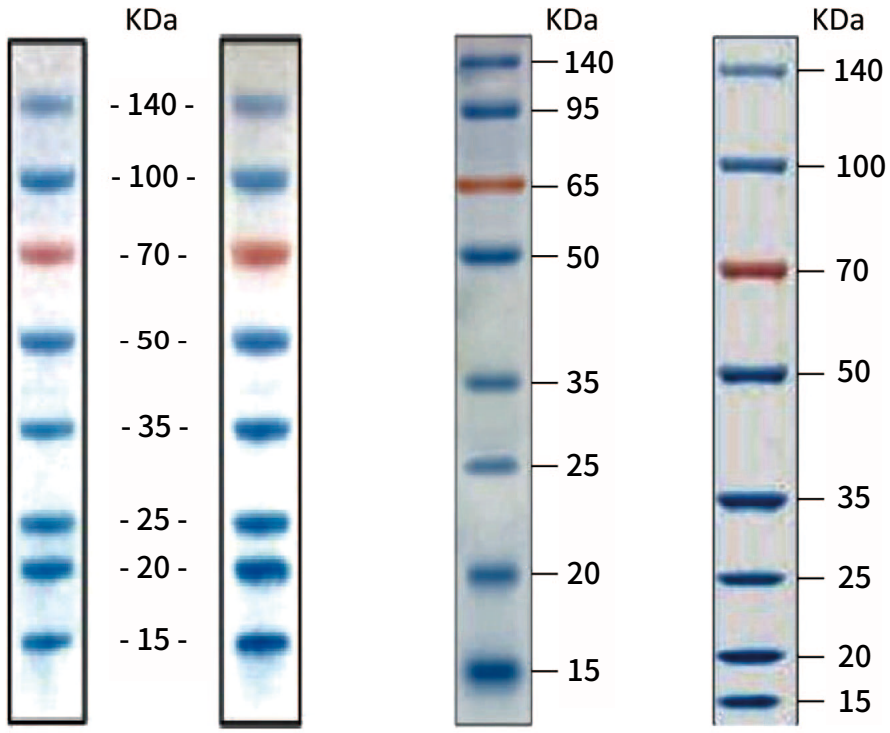
1. Prestained proteins can have different mobilities in various SDS-PAGE-buffer systems. However, they are suitable for approximate molecular weight determination when calibrated against unstained standards in the same system. See the table provided for migration patterns in different electrophoresis conditions.
2. In low-percentage gels (< 10 %), the low-molecular weight proteins in the ladder may migrate with the dye front.
3. **AceColor™** Prestained Protein Ladder can be used in Western Blotting with all common membranes: PVDF, Nylon and Nitrocellulose.
4. Longer transfer times or higher transfer voltages may be required for Western blotting of large (>100 kDa) proteins.

Preparation

1. Thaw the ladder at room temperature for a few minutes to dissolve precipitated solids. Do not boil !!
2. Mix gently, but thoroughly, to ensure the solution is homogeneous.
3. Load the following volumes of the ladder on an SDS-polyacrylamide gel:
   - 5 μL per well for mini gel.
   - 10 μL per well for large gel.
4. Use the same volumes for Western blotting.
5. The loading volumes listed above are recommended for gels with a thickness of 0.75-1.0 mm. The loading volume should be doubled for 1.5 mm thick gels.

Migration patterns of Prestained Protein Ladder

The apparent molecular weight of each protein (kDa) has been determined by calibration against an unstained prote in ladder in each electrophoresis.



SDS-PAGE **Western Blot** **15% Tris-Gly** **15% Tris-HEPES**

4-20% Bis-Tris
(Tris-MOPS buffer)