

For research use only ISO9001

# PowerStain<sup>TM</sup> Silver Stain Kit (low background)

Product Name	Qty	Cat. No.	
Silver Stain Kit (low background)	1 kit (500 mlx3)	EBP-1051	

- Highly sensitive protein and DNA staining after polyacrylamide, peptide gel electrophoresis
- Ready-to-use premixed solutions
- · Eliminating gel background results in enhanced staining sensitivity

### Description

Silver Stain Kit (low background) is the most sensitive and easiest way to detect nanogram quantities of protein on the analytic gels. Enhancer solution in the kit easily eliminates background staining on a polyacrylamide gel, results in increased detection sensitivity. The silver stain kit provides convenient ready—to—use formula and the kit involves three premixed solutions in 500 ml bottles sufficient for staining 25 mini gels.

#### Feature.

Staining Time: 2-4 hr

Sensitivity: 1-5 ng protein per band Usage: 25 mini gels (8x10cm², 1 mm thick)

### Component of Kit

Solution A: Pre-treatment solution (500 ml) Solution B: Silver stain solution (500 ml) Solution C: Developer solution (500 ml)

\* Because fixation solution and formaldehyde are not included in this kit, they should be prepared by users

#### Recommended Storage Condition

Store at room temperature for one year.

### Protocol

- 1. Fix gel with fixer (30% ethanol, 10% acetic acid) for 1 hr to overnight with mild agitation.
- 2. Wash gel twice with distilled water for 15 min.
- 3. Soak gel in Solution A just for 1 min with mild agitation.
- 4. Rinse gel twice with distilled water for 1 min each.
- 5. Soak gel in Solution B (Add 20  $\mu$ l formaldehyde to 100 ml Solution B just before use) for 20-30 min.
- 6. Brief rinse gel twice with distilled water for 1 min.
- 7. Soak gel in Solution C (Add 100  $\mu$ l formaldehyde to 100 ml Solution C just before use) until desired signals appear.
- 8. Stop developing with fixer.

## Cautions

- 20 ml of each solution is sufficient for a 10x8x0.75cm<sup>3</sup> mini-gel.
- All incubation must be performed with mild agitation at room temperature with upper sealing.
- Formaldehyde must be added just before use.
- Longer fixing time, higher signals.
- Excluding SDS in running gel may decrease background staining, subsequently decrease overall fixing time.