

Product Information

Name: Super GelBlue™ 10,000× in water

Catalog: S2019

Size: 1 mL, 8×1 mL, 25 mL

Storage and Handling

Store at room temperature

Product Description

Super GelBlue™ is a sensitive, stable and environmentally safe fluorescent nucleic acid dye designed to replace the highly toxic ethidium bromide (EtBr). It can be excited by 488 nm laser, and can be observed directly by blue light glue cutter or scanner.

Due to the unique molecular structure of Super GelBlue™, it can ensure its high safety and sensitivity, but also can not affect the migration of DNA bands. Even if the amount of DNA sample is very high, it can get a good effect of strip separation.

Protocol

1. Precast Protocol for Agarose Gels(same as EB)

(1) Dilute dye to get its dilution to working solution, add 5 μL Super GelBlue™ 10,000× to 50 mL gel solution and mix thoroughly. Super GelBlue™ has excellent thermal stability and can be added directly to a high temperature gel solution without waiting for cooling. It can also be prepared by mixing and heating Super GelBlue™ reagent with electrophoresis buffer containing agarose powder.

(2) Execute electrophoresis according to your standard protocol. Imaging with blue light.

2. Post-Staining Protocol

(1) Make up a dye-free gel and execute electrophoresis.

(2) Dilute Super GelBlue™ for 3,300 fold to make a 3× staining solution in H₂O containing 0.1 M NaCl (i.e., add 15 μL Super GelBlue™ 10,000× and 5 mL 1 M NaCl to 45 mL H₂O.)

(3) Place the gel carefully in a suitable container. Add sufficient amount of the 3× staining solution to submerge the gel. Incubate at room temperature for 30 min. It should be incubated for 30 min to 1 h when it comes to acrylamide gel, and time will be extended with the increase of acrylamide content. Imaging with blue light.

Note

1. The gel prepared by colloid dyeing is light orange red. After electrophoresis, it may appear that the color of the glue is not uniform in the naked eye (as the upper part of the gel is deep, and the lower part of the gum is light). This is a normal phenomenon and does not affect the electrophoresis results.

2. Super GelBlue™ can be used not only for agarose gel electrophoresis, but also for acrylamide gel nucleic acid electrophoresis.

3. Super GelBlue™ is suitable for blue light gel cutter and blue light scanner. It can also be used for UV Gel imaging system, but ultraviolet imaging strip is weak. It is recommended to use other dyes like S2001 or S2009.

4. The dye solution of bubble dyeing can be reused for about 3 times. If it is not reused immediately, it is recommended to keep the used dye solution away from light.

