

# Quick Start Protocol

## GelRed® & GelGreen® Nucleic Acid Gel Stains

Catalog nos. 41002, 41003, 41004, 41005

### Precast agarose gels

- 1. Add GelRed® or GelGreen® to molten agarose at 1X final concentration.**

For example, add 5  $\mu$ L of 10,000X GelRed® or GelGreen® to 50 mL agarose.

- 2. Cast gel and run samples.**

Recommended loading is 50-200 ng DNA or ladder per lane, or 2-5  $\mu$ L PCR product. If DNA concentration is unknown, run 1/2 to 1/3 the amount you would normally load on an EtBr gel. Overloading DNA can lead to poor band migration. If you need to load more DNA, use the post-staining protocol (other side).

- 3. Image gel.**

GelRed®: use UV light box with EtBr filter.

GelGreen®: use UV light box with SYBR® Green filter, or blue light illuminator such as a Dark Reader®.

Visit [www.biotium.com](http://www.biotium.com) for complete protocols, troubleshooting tips, and answers to frequently asked questions (FAQs).

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## **Post-staining agarose or acrylamide gels**

- 1. Run samples on gel with no DNA gel stain added.**
- 2. Dilute GelRed® or GelGreen® in water at 3X final concentration.**

For example, add 15  $\mu$ L 10,000X GelRed® or GelGreen® to 50 mL water.

- 3. Place gel in clean container with enough 3X gel stain to cover gel and incubate with rocking for 30 min.**

Bands may begin to be detectable after 5 min.

- 4. Image gel.**

GelRed®: use UV light box with EtBr filter.

GelGreen®: use UV light box with SYBR®

Green filter, or blue light illuminator such as a Dark Reader®.

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**GelRed® & GelGreen®**

**Quick Start Protocol Side B**