

ACTGene, Inc. PO.Box 7011

Piscataway, NJ 08855-7011

Tel: 973-978-6688

Email: <a href="mailto:sales@actgene.com">sales@actgene.com</a>
Web Site: <a href="mailto:www.actgene.com">www.actgene.com</a>

# HydraGreen™ Safe DNA Dye, 20,000X in Water

# **Product contents:**

P/N: ACT-IDMG04

1x1ml or 1x20ul (Sample), 1ml HydraGreen Sufficient for approximately 400x50ml or 200x100ml agarose gels

## Introduction:

HydraGreen<sup>™</sup>, 20,000X in water, is a non-carcinogenic and non-toxic alternative to Ethidium bromide used for the detection of nucleic acids in agarose gels. It is as sensitive as Ethidium bromide. There is also no toxic DMSO as HydraGreen<sup>™</sup> is supplied in water.

HydraGreen™ has fluorescence excitation maxima at 295 nm and 490 nm. The fluorescence emission maxima is similar to EtBr when bound to DNA – at 530 nm.

## **Protocol:**

**Note:** It is highly recommended agarose gel to be  $\leq$ 0.5cm in thickness. TAE buffer system is preferred for higher sensitivity.

# PRE-STAIN:

Wait for melted agarose to be cooled to 55°C.

Add 4-6 µl per 100 ml of agarose or 2-3 µl per 50 ml of agarose, swirl and mix well.

IMPORTANT: HydraGreen ™ is supplied in 20,000X concentration in water

Or

#### POST-STAIN:

Use 10 to 15  $\mu$ l per 100 ml of staining solution. Same as when using ethidium bromide. For an average gel thickness of about 0.5 cm, stain 30 minutes, followed by a destain of 30 minutes in water. Protect gel and staining solution from light with aluminum foil or place in dark.

# **DETECTION:**

Detect bands under UV illumination (yellow or green gelatin- or cellophane filters is recommended for clearer bands) or non-UV LED illuminators such as Blue Light LED illumination.

# **Shipping and Storage Conditions:**

Shipped in room temperature.

One year 4 degree or three months room temperature shelf life. Protect from light.

For Research Use.

© 2016, ACTGene, Inc.