NIPPON Genetics EUROPE GmbH

Midori Green DIRECT DNA stain

For laboratory use only. Not intended for human or animal diagnostic or therapeutic uses.

Cat. No. MG05 (50 µl)
Cat. No. MG06 (1 ml)

For long term storage please store Midori Green DIRECT at 4°C – shelf life = 12 months

Description:

MIDORI GREEN DIRECT represents a new and safe class of nucleic acid stains for visualization of double-stranded DNA, single-stranded DNA, and RNA in agarose gels. The dyes are developed to replace toxic Ethidium Bromide (EtBr, a potent mutagen), commonly used in gel electrophoresis for visualization of nucleic acids in agarose gels. MIDORI GREEN DIRECT was developed to work with Blue Light LED illuminators (like the FastGene® LED Illuminator or FastGene® LED Transilluminator) but it can be used with regular UV transilluminators as well.

Safety:

MIDORI GREEN DIRECT stain is non-carcinogenic and less mutagenic compared to Ethidium Bromide. Furthermore we can state that MIDORI GREEN DIRECT is impenetrable to latex gloves and cell membranes.
MIDORI GREEN DIRECT is classified as non-hazardous to aquatic life, under CCR Title 22 regulation. Thus, small amounts of MIDORI GREEN DIRECT stain can be safely released into the environment.
A detailed safety report can be downloaded at *www.nippongenetics.eu* or *www.nippongenetics.de*

Loading dye:

MIDORI GREEN DIRECT stains are provided in a sample loading buffer and they are to be added to your samples only. You do not need to add any other dyes to both gel matrix and running buffers.

Protocol:

1. Prepare the agarose solution.
2. Mix gentle without having any air bubbles.
3. Let the solution cool down to 60-70°C and cast the gel.
4. Mix samples and DNA markers with MIDORI GREEN DIRECT stain at 1:10 (dye : samples) dilution rate. Do not use more than 0,5 µl MIDORI GREEN DIRECT per sample even if you use more than 5 µl sample volume.
5. After the electrophoresis, view and document your result. View the results under traditional UV light after electrophoresis or use non-hazardous FastGene® Blue LED Illuminator for performance and health reasons.

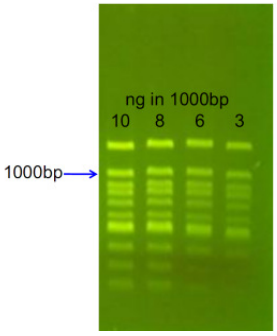

Fig.1: 1% agarose gel – samples were directly stained with MIDORI GREEN DIRECT