



## CSIR-CDRI Team Launched the Products GreenR<sup>™</sup> DNA Gel Stain and Real-Time GreenR PCR Master Mix



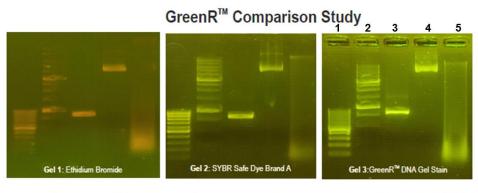
On the occasion of One Week One Lab (OWOL) celebrations, CSIR-CDRI has launched the products GreenR<sup>TM</sup> DNA staining dye and Real-Time GreenR Master Mix on Feb 16, 2023 in Indian market for biomedical research and diagnostics. The dye GreenR<sup>TM</sup> has been designed and developed by CDRI Chief Scientist Dr. Atul Goel and his group in collaboration with an industry partner Biotech Desk Pvt. Ltd. (BDPL), Hyderabad. The technology of the product GreenR has been patented, licensed and transferred to M/s Gene to Protein Pvt. Ltd., Lucknow on the National Technology Day (May 11, 2022).

Ethidium Bromide (EtBr) is commonly used as a stain in DNA and RNA agarose gel electrophoresis. EtBr is mutagenic in nature and hence a health hazard for the researcher, requiring special handling and disposal measures. To overcome these issues of toxicity, some companies have invented safe DNA staining dyes like SYBR Green but these dyes have substantial cost as they are expensive to import. The product GreenR<sup>TM</sup> is non-mutagenic, cost-effective and its disposal is simple and easy. GreenR dve is nonfluorescent in solution, when binding with DNA/RNA, it exhibits green fluorescence. It binds to all nucleic acids including genomic DNA, plasmid DNA and RNA, PCR amplified products of different sizes. The dye GreenR can be used with PCR master Mix for highly sensitive real time qPCR experiments. The GreenR dye was benchmarked with commercial dyes, and equivalent staining outcome was observed upon comparison. Dr Goel said that this indigenous dye has varied applications in molecular diagnostics and life sciences research. The discovery of this indigenous dye offers the Indian researcher an alternative to expensive imported dyes made by foreign MNCs and take India a step closer to 'ATMANIRBHARTA'. CDRI product GreenR is marketed by Gene to Protein Pvt. Ltd., Lucknow and is available on Government eMarketing (GeM) portal.









- 1. 100bp DNA ladder
- 2. 1Kb DNA ladder
- 3. PCR purified Product
- 4. Plasmid DNA P01-200ng
- 5. Genomic DNA-300ng

Different nucleic acids has been run on 1% agarose gel and stained with **Gel** 1: Ethidium Bromide, **Gel 2:** SYBR Safe dye from 3<sup>rd</sup> party and **Gel 3:** GreenR™ DNA Gel Stain.

## **Available on GeM**

This product on GeM - <a href="https://mkp.gem.gov.in/dna-gel-loading-dye/greenr-dna-gel-stain-dna-staining-dye/p-5116877-42521963983-cat.html">https://mkp.gem.gov.in/dna-gel-loading-dye/greenr-dna-gel-stain-dna-staining-dye/p-5116877-42521963983-cat.html</a>

Should anyone express interest in procuring GreenR Dye and/or RT-PCR Master mix kit or require further information, G2P team would be delighted to provide personalized assistance and address any queries they may at <a href="mailto:ihansi@genetoprotein.com">ihansi@genetoprotein.com</a>.

