# 2X RNA Loading Dye

## Catalog Number R0641

**Pub. No.** MAN0013155 **Rev.** C.00



**WARNING!** Read the Safety Data Sheets (SDSs) and follow the handling instructions. Wear appropriate protective eyewear, clothing, and gloves. Safety Data Sheets (SDSs) are available from **thermofisher.com/support**.

## Contents and storage

Contents	Amount	Storage
2X RNA Loading Dye	1 mL	room temperature or at 4 °C for periods up to 12 months. For longer periods, store at -20 °C

## **Description**

The 2X RNA Loading Dye is recommended for the preparation of Thermo Scientific RiboRuler RNA Ladders and RNA samples for electrophoresis on agarose or polyacrylamide gels. It contains electrophoresis tracking dyes; bromophenol blue, xylene cyanol FF, and the intercalating dye ethidium bromide. In most denaturing agarose gel systems, bromophenol blue migrates slightly faster than human 5S rRNA, whereas xylene cyanol FF migrates slightly slower than 18S rRNA.

2X RNA Loading Dye contains the denaturing agent formamide, thus in most cases RNA molecules are separated according to their size even during non-denaturing electrophoresis. In addition, formamide stabilizes RNA.

#### Composition

95 % formamide

0.025 % SDS

0.025 % bromophenol blue

0.025 % xylene cyanol FF

0.025 % ethidium bromide

0.5 mM EDTA.

### **Recommendations for Loading**

- 1. Add an equal volume of 2X RNA Loading Dye to RNA sample and mix well.
- 2. Heat the mixture at 70 °C for 10 min.
- 3. Chill on ice and spin down prior to loading on a gel.



## **Limited product warranty**

Life Technologies Corporation and/or it affiliate(s) warrant their products as set forth in the Life Technologies' General Terms and Conditions of Sale at www.thermofisher.com/us/en/home/global/terms-and-conditions.html. If you have any questions, please contact Life Technologies at www.thermofisher.com/support.



Thermo Fisher Scientific Baltics UAB | V.A. Graiciuno 8, LT-02241 Vilnius, Lithuania For descriptions of symbols on product labels or product documents, go to thermofisher.com/symbols-definition.

The information in this guide is subject to change without notice.

DISCLAIMER: TO THE EXTENT ALLOWED BY LAW, THERMO FISHER SCIENTIFIC INC. AND/OR ITS AFFILIATE(S) WILL NOT BE LIABLE FOR SPECIAL, INCIDENTAL, INDIRECT, PUNITIVE, MULTIPLE, OR CONSEQUENTIAL DAMAGES IN CONNECTION WITH OR ARISING FROM THIS DOCUMENT, INCLUDING YOUR USE OF IT.

Important Licensing Information: These products may be covered by one or more Limited Use Label Licenses. By use of this product, you accept the terms and conditions of all applicable Limited Use Label Licenses.

©2021 Thermo Fisher Scientific Inc. All rights reserved. All trademarks are the property of Thermo Fisher Scientific and its subsidiaries unless otherwise specified.

ThermoFisher SCIENTIFIC