# PRODUCT INFORMATION



## CytoTrace™ Orange CMTMR

Item No. 20696

CAS Registry No.: 323192-14-9

Formal Name: 9-[2-carboxy-4(or 5)-[[4-(chloromethyl)

benzoyl]amino]phenyl]-3,6-bis

(dimethylamino)-xanthylium, inner salt

Synonym: CellTracker<sup>™</sup> Orange CMTMR

MF: C32H28CIN3O4

FW: 554.0 **Purity:** ≥90% Ex./Em. Max: 541/565 nm Supplied as: A solid Storage: -20°C ≥4 years Stability: Special Conditions: Light sensitive

Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

## **Laboratory Procedures**

CytoTrace™ Orange CMTMR is supplied as a solid. A stock solution may be made by dissolving the CytoTrace™ Orange CMTMR in the solvent of choice. CytoTrace™ Orange CMTMR is soluble in the organic solvent DMSO, which should be purged with an inert gas.

#### Description

CytoTrace™ Orange CMTMR is a rhodamine-based, cell-permeant, vital fluorescent dye that is retained by cells for prolonged periods (>72 hours) and is passed to daughter cells. Cells loaded with long-lasting dyes, including CMTMR, are used to follow cell trafficking and cell-to-cell interactions in vivo. 1-3 They have also been used to estimate the growth of implanted tumor spheroids.<sup>4</sup> CytoTrace™ Orange CMTMR displays excitation/emission maxima of 541/565 nm, respectively.

#### References

- 1. Brooks, A.E.S., Parsamand, T., Kelly, R.W., et al. An improved quantitative method to assess adhesive properties of Trichomonas vaginalis to host vaginal ectocervical cells using flow cytometry. J. Microbiol. Methods 92(1), 73-78 (2013).
- 2. Buehler, C., Dong, C.Y., So, P.T.C., et al. Time-resolved polarization imaging by pump-probe (stimulated emission) fluorescence microscopy. Biophys J. 79(1), 536-549 (2000).
- 3. Sato, K., Imai, Y., and Irimura, T. Contribution of dermal macrophage trafficking in the sensitization phase of contact hypersensitivity. J. Immunol. 161(12), 6835-6844 (1998).
- 4. Borgström, P., Hillan, K.J., Sriramarao, P., et al. Complete inhibition of angiogenesis and growth of microtumors by anti-vascular endothelial growth factor neutralizing antibody: Novel concepts of angiostatic therapy from intravital videomicroscopy. Cancer Res. 56(17), 4032-4039 (1996).

WARNING
THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

#### WARRANTY AND LIMITATION OF REMEDY

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