MitoTracker® Red CMXRos

500 µg (10 x 50 µg)

**Description:** MitoTracker® Red CMXRos is well retained after fixation allowing for further sample processing and immunostaining. Excitation: 579 nm Emission: 599 nm

**Background:** MitoTracker® dyes are cell permeable probes that contain a mildly thiol-reactive chloromethyl moiety for mitochondrial labeling. To label mitochondria, cells are simply incubated with MitoTracker® probes, which passively diffuse across the plasma membrane and accumulate in active mitochondria.

**Directions for Use:** Each vial of MitoTracker® Red CMXRos contains 50 µg lyophilized solid. To make a 1 mM stock solution, reconstitute the solid in 94.1 µl high quality DMSO. While the optimal staining concentration and incubation times can vary by application, typical results are obtained by diluting the stock solution directly into growth media at a concentration between 50-200 nM and incubation between 15-45 min at 37°C. After incubation, fix the cells in ice-cold methanol for 15 min at -20°C then rinse 3 times with PBS for 5 min. Proceed with immunostaining.

**Storage:** Store lyophilized solid at -20°C dessicated and protected from light. In lyophilized form, this reagent is stable for 12 months. Once reconstituted in DMSO, the solution can be stored at -20°C, protected from light and must be used within 2 weeks. Avoid freeze-thaw cycles.

**Applications**

<table>
<thead>
<tr>
<th>IF/IC, F</th>
<th>Species Cross-Reactivity</th>
<th>Molecular Wt.</th>
</tr>
</thead>
<tbody>
<tr>
<td>All</td>
<td>531.52 g/mol</td>
<td></td>
</tr>
</tbody>
</table>

Confocal immunofluorescent analysis of HeLa cells using MitoTracker® Red CMXRos (red) and Lamin A/C (4C11) Mouse mAb (Alexa Fluor® 488 Conjugate) #8617 (green). Blue pseudocolor = DRAQ5® #4084 (fluorescent DNA dye).

Flow cytometric analysis of live Jurkat cells, treated with CCCP (80 µM, 15 min; blue) or untreated (green) labeled with MitoTracker® Red CMXRos (solid lines), compared to unlabeled Jurkat cells (dashed line).