Store at 4°C

#4084

DRAQ5®

☐ Small 50 µl
☐ Large 200 µl

Cell Signaling TECHNOLOGY®

Orders ■ 877-616-CELL (2355)
orders@cellsignal.com
Support ■ 877-678-TECH (8324)
info@cellsignal.com
Web ■ www.cellsignal.com

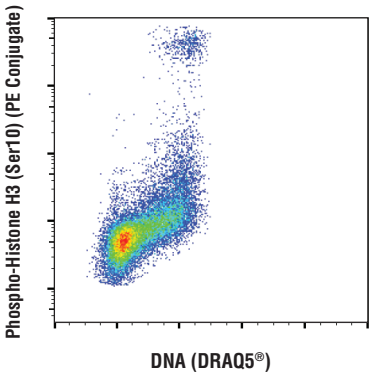
For Research Use Only. Not For Use In Diagnostic Procedures.

Applications	Species Cross-Reactivity
IF-F, IF-IC, IF-P, F	All

Background: DRAQ5®, 1, 5-bis{[2-(di-methylamino) ethyl]amino}-4, 8-dihydroxyanthracene-9,10-dione, is a cell permeable far-red fluorescent DNA dye that can be used in live or fixed cells. This dye can be used in combination with GFP or FITC labels. DRAQ5® has been used to examine cellular DNA in flow cytometry and fluorescent microscopy applications (1-3).

Background References:

(1) Smith, P.J. et al. (2000) *Cytometry* 40, 280–91.
(2) Wiltshire, M. et al. (2000) *Cytometry* 39, 217–23.
(3) Smith, P.J. et al. (1999) *J Immunol Methods* 229, 131–9.



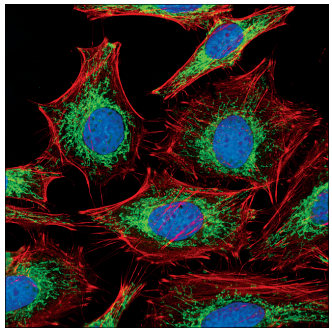
Flow cytometric analysis of Jurkat cells using Phospho-Histone H3 (Ser10) (D7N8E) XP® Rabbit mAb (PE Conjugate) #29237 versus DRAQ5® (DNA content).

Storage: Store at 4ºC protected from light.

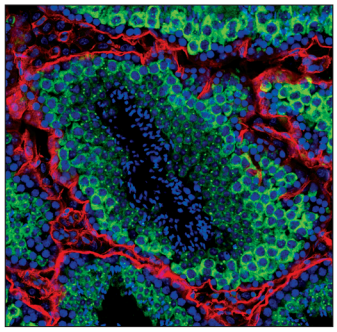
Directions for Use: Please follow CST's recommended IF and Flow protocols. For both applications, following secondary detection:

Flow Cytometry: Centrifuge cells and resuspend in 0.5 ml DRAQ5® diluted 1:500 (10 µM) in PBS or Antibody Dilution Buffer. Incubate for 5 min at room temperature in the dark before analyzing cells on flow cytometer.

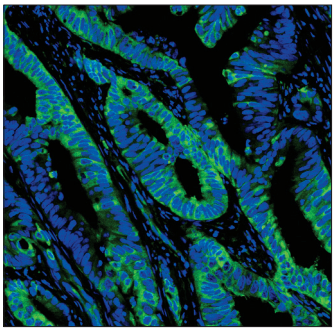
Immunofluorescence: Rinse samples twice in PBS for five minutes each. Dilute DRAQ5® 1:1000 (5 µM) in PBS and incubate for 5 minutes at room temperature in the dark. Rinse samples once in PBS, coat coverslips with anti-fade reagent and examine immediately using appropriate excitation wavelength.



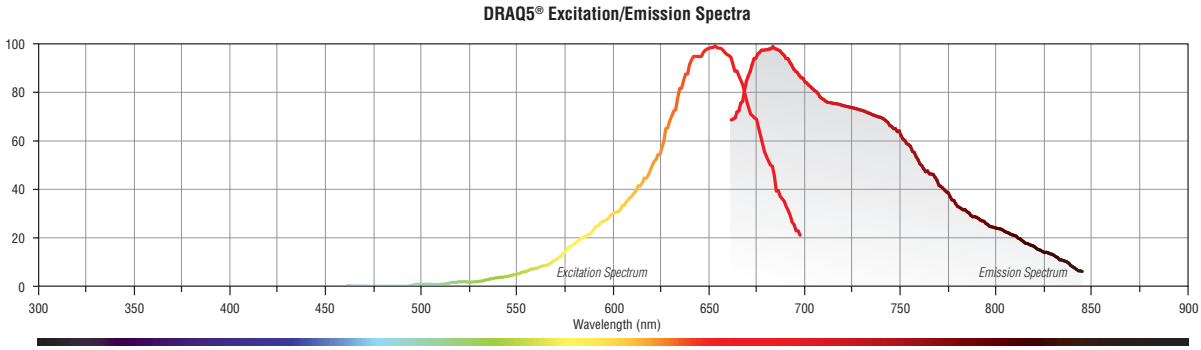
Confocal immunofluorescent analysis of HeLa cells using COX IV (3E11) Rabbit mAb #4850 (green). Actin filaments have been labled with DY-554 phalloidin (red). Blue pseudocolor = DRAQ5® (fluoresent DNA dye).



Confocal immunofluorescent analysis of mouse testis using Miwi (G82) Antibody #2079 (green) and Pan-Keratin (C11) Mouse mAb #4545 (red). Blue pseudocolor = DRAQ5® (fluorescent DNA dye).



Confocal immunofluorescent analysis of paraffin-embedded human colon adenocarcinoma using Phospho-S6 Ribosomal Protein (Ser235/236) (D57.2.2E) Rabbit mAb #4858 (green). Blue pseudocolor = DRAQ5® (fluorescent DNA dye).



Absorption and fluorescence emission spectra of DRAQ5® in aqueous solution.

DRAQ5® is a registered trademark of Biostatus Limited.

Applications Key: **W**—Western **IP**—Immunoprecipitation **IHC**—Immunohistochemistry **ChIP**—Chromatin Immunoprecipitation **IF**—Immunofluorescence **F**—Flow cytometry **E-P**—ELISA-Peptide

Species Cross-Reactivity Key: **H**—human **M**—mouse **R**—rat **Hm**—hamster **Mk**—monkey **Mi**—mink **C**—chicken **Dm**—D. melanogaster **X**—Xenopus **Z**—zebrafish **B**—bovine **Dg**—dog **Pg**—pig **Sc**—S. cerevisiae **Ce**—C. elegans **Hr**—horse **All**—all species expected Species enclosed in parentheses are predicted to react based on 100% homology.