DISCOVERY PROCESS DEVELOPMENT

VALIDATION

From a single chemistry . . .



A549 cell titration Two-fold serial dilutions, incubated with 500µM dye for 4 hours

an **improved readout** for cell proliferation, chemosensitivity, cytotoxicity and metabolite utilization assays.



The next generation of dye chemistry for cell enumeration and assaying cellular metabolism.

Biolog Redox Dye Mixes are easy-to-use colorimetric reagents for assaying viable cell number and measuring the ability of cells to convert extracellular metabolites into mitochondrial reducing equivalents. Redox Dye Mix MA and MB each contain a water-soluble non-toxic tetrazolium reagent that can be used with virtually any type of animal cell line or primary cell. Biolog Dye Mixes exhibit greater sensitivity, higher signal over background and a larger dynamic range than other commonly used reagents such as MTT, XTT, MTS and Alamar Blue.

No solubilization of the purple formazan product is required, and the homogeneous color formed enables kinetic analysis of dye formation by cells in tissue culture medium without additional processing. The quantity of formazan product is directly proportional to the number of living and respiring cells. Unlike other tetrazolium reagents, Biolog's dye mixes have been carefully formulated to eliminate interference by serum or quenching artifacts during prolonged assays.



Order Information

■ Biolog Redox Dyes are the best reagents for assaying utilization of multiple metabolites with Phenotype MicroArray[™] panels



HepG2/C3A cells in Biolog PM-M1 panel containing 91 diverse metabolites 20,000 cells per well, incubated with 500µM dye for 2 hours

Ideal for chemosensitivity and cytotoxicity assays



Immortalized and Ras-transformed mouse embryonic fibroblasts in Biolog PM-M14 panel 5,000 cells per well, incubated with 500µM MA dye for 6 hours

BIOLOG, Inc. 21124 Cabot Blvd Hayward, CA 94545 USA (510) 785-2564 • www.biolog.com



Biolog PM-M14 panel contains 23 anti-cancer drugs, three per row at four concentrations each. Drugs showing increased resistance in the ras-transformed cell line were (a) methotrexate, (b) floxuridine, (c) mitomycin C, (d) cytosine arabinoside, (e) daunorubicin, (f) doxorubicin, and (g) etoposide.