

In Vitro Toxicology Services

Caliper Discovery Alliances & Services (CDAS) www.novascreen.com offers cellular toxicity assays using tumor derived, and in certain cases, primary cell lines. Additional cell lines available upon request (410) 712-4410 or (800) 543-4141

Blood	
HL-60	leukemia, acute promyelocytic
Jurkat	leukemia, acute T-cell
THP1	leukemia, acute monocytic
U937	lymphoma, monocyte histiocytic
Bone	
Saos2	osteosarcoma
Brain	
H4	glioblastoma
IMR32	neuroblastoma
NT2	neuronal teratocarcinoma
SH-SY5Y	neuroblastoma
SK-N-F1	neuroblastoma
SK-N-MC	neuroepithelioma
SK-N-SH	neuroblastoma
U373 MG	glioblastoma
Breast	
MCF7	mammory gland, adenocarcinoma
T-47D	ductal carcinoma
SK-Br-3	adenocarcinoma
Colon	
HCT-116	colorectal carcinoma
HT-29	colorectal carcinoma
Liver	
Hepatocytes	primary hepatocytes*
Lung	
A549	carcinoma
DMS 53	small cell carcinoma
DMS 153	small cell carcinoma
IMR 90	primary fibroblast
Muscle	
Hs.729T	rhabdomyosarcoma
RD	rhabdomyosarcoma
Pancreas	
PANC-1	epithiloid carcinoma
Prostate	
LNCap	carcinoma
PC-3	bone metastasis adenocarcinoma
RWPE-1	epithelial transfected w/ HPV-18

Cellular Toxicity Studies:

- Proliferation (CyQuant Assay)
- Viability (Live-Dead Assay)
- Mechanism based Cytotoxicity
 - » Apoptosis, CASP3 activation (fluorescent quantification of cellular Casp3 activity)
 - » Cellular respiration (photometric quantification of cellular ATP/ADP)
 - » Cellular metabolism (colorimetric quantification of cellular glucose)
 - » Cellular anabolism (fluorescent quantification of cellular protein)

Renal	
RPTEC	primary epithelial proximal tubule
Skin	
A-431	epidermoid carcinoma
CCD986Sk	fibroblast
Vascular	
CASMC	primary arterial smooth muscle
HUVEC	primary umbilical vein epithelial

Metabolism Studies			
	ASSAY	CAT#	Source
Cytochrome p450 - enzyme inhibition			
	CYP1A2 (h)	400-0093	hcDNA
	CYP2A6 (h)	400-0094	hcDNA
	CYP2C19 (h)	400-0095	hcDNA
	CYP2C9*1 (h)	400-0096	hcDNA
	CYP2D6 (h)	400-0097	hcDNA
	CYP3A4 (h)	400-0098	hcDNA
Metabolic Stability			
	Drug stability	400-0250	rat liver S9
	Drug half life	400-0251	rat liver S9