

Materials List for:

ODELAY: A Large-scale Method for Multi-parameter Quantification of Yeast Growth

Thurston Herricks¹, Fred D. Mast^{1,2}, Song Li¹, John D. Aitchison^{1,2}

¹Institute for Systems Biology

²Center for Infectious Disease Research

Correspondence to: Thurston Herricks at therrick@systemsbiology.org

URL: <https://www.jove.com/video/55879>

DOI: [doi:10.3791/55879](https://doi.org/10.3791/55879)

Materials

Name	Company	Catalog Number	Comments
Agarose UltraPure	ThermoFisher	16500500	Gel Temp 36C, Gel Strength (1%) 1.2 g/sq cm
Yeast Extract Peptone (YEP)	Fisher Scientific	BP1422-2	
Complete Supplement Mixture (CSM)	Fisher Scientific	MP114560222	
Polyethylene Glycol 3350 (av. mol. wt. 3000-3700)	SigmaAldrich	P2906	
Yeast Strain BY4741	ThermoFisher	95400.BY4741	
Yeast Strain BY4742	ThermoFisher	95400.BY4742	
50 mL Falcon tubes	Corning	430291	1 case
15 mL Falcon tubes	Corning	352096	
2 x 3 inch 1.0 mm thick slides 1/2 gross	VWR	48382-179	
96-well plate flat bottom	Corning	353072	
Hydra liquid handling robot	Thermo	1096-DT-100	
Hamilton Microlab Star Liquid Handling Robot	Hamilton		
hydra 100 mL tips Extended Length DARTS	Thermo	5527	
Synergy H4 Plate Reader	Biotek	H4MLFAD	
Leica DMI6000 B Microscope	Leica		
Leica 10X/0.3NA objective	Leica	11506289	
Hamamatsu ORCA Flash 4.0 Camera	Hamamatsu	C11440-22CU	
MATLAB with image processing tool box	Mathworks		
MicroManager	Open Imaging		https://micro-manager.org/
ODELAY Microscope Control (MATLAB scripts and GUI)			www.aitchisonlab.com \ODELAY for Matlab scripts and software
ODELAY Microscope Chamber			www.aitchisonlab.com \ODELAY for Mechanical Drawings
ODELAY Agar Molds			www.aitchisonlab.com \ODELAY for mold drawings