

Materials List for

In vivo Assessment of Microtubule Dynamics and Orientation in *Caenorhabditis elegans* Neurons

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jove.com/video/62744

Materials

Name	Company	Catalog Number	Comments
CZ18975 worm strain	Yishi Jin lab	CZ18975	Generated by Anindya Ghosh-Roy
Agarose	Sigma	A9539	Mounting worms
Coverslip (18 mm x 18 mm)	Zeiss	474030-9010-000	Mounting worms
Dry bath with heating block	Neolab		Mounting worms
Glass slides (35 mm x 25 mm)	Blue Star		Mounting worms
Polystyrene bead solution (4.55 x 10 ¹³ particles/ml in aqueous medium with minimal surfactant)	Polysciences Inc.	00876	Mounting worms
Test tubes			Mounting worms
OP50 bacterial strain	Caenorhabditis Genetics Center (CGC)	OP50	Worm handling
60mm petri plates	Praveen Scientific	20440	Worm handling
Aspirator/Capillary	VWR	53432-921	Worm handling
Incubator	Panasonic	MIR554E	Worm handling
Platinum wire			Worm handling
Stereomicroscope with fluorescence attachment	Leica	M165FC	Worm handling
0.3% Sodium Chloride	Sigma	71376	Nematode Growth Medium
0.25% Peptone	T M Media	1506	Nematode Growth Medium
10mg/mL Cholesterol	Sigma	C8667	Nematode Growth Medium
1mM Calcium chloride dihydrate	Sigma	223506	Nematode Growth Medium
1mM Magnesium sulphate heptahydrate	Sigma	M2773	Nematode Growth Medium
2% Agar	T M Media	1202	Nematode Growth Medium
25mM Monobasic Potassium dihydrogen phosphate	Sigma	P9791	Nematode Growth Medium
0.1M Monobasic Potassium dihydrogen phosphate	Sigma	P9791	1X M9 buffer
0.04M Sodium chloride	Sigma	71376	1X M9 buffer
0.1M Ammonium chloride	Fisher Scientific	21405	1X M9 buffer

0.2M Dibasic Disodium hydrogen phosphate heptahydrate	Sigma	S9390	1X M9 buffer
Glass bottles	Borosil		Buffer storage
488 nm laser	Zeiss		Imaging
5X objective	Zeiss		Imaging
63X objective	Zeiss		Imaging
Camera	Photometrics	Evolve 512 Delta	Imaging
Computer system for Spinning Disk unit	HP	Intel ® Xeon CPU E5-2623 3.00GHz	Imaging
Epifluorescence microscope	Zeiss	Observer.Z1	Imaging
Halogen lamp	Zeiss		Imaging
Mercury Arc Lamp	Zeiss		Imaging
Spinning Disk Unit	Yokogawa	CSU-X1	Imaging
ZEN2 software	Zeiss		Imaging
Image J (Fiji Version)			Image analysis and processing
Adobe Creative Cloud	Adobe		Image analysis and processing
Computer system for Image Analysis	Dell	Intel ® Core ™ i7-9700 CPU 3.00GHz	Image processing/Representation