

Materials List for:

A Modular Microfluidic Technology for Systematic Studies of Colloidal Semiconductor Nanocrystals

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Materials

Name	Company	Catalog Number	Comments
Toluene	Fisher Scientific	AC364410010	99.85% extra over molecular sieves
Oleic acid	Sigma Aldrich	364525 ALDRICH	technical grade 90%
Cesium hydroxide (50 wt% in water)	Sigma Aldrich	232041 ALDRICH	50 wt% in water> 99.9% trace metals
Lead(II) oxide	Sigma Aldrich	211907 SIGMA-ALDRICH	> 99.9% trace metals basis
Tetraoctylammonium bromide	Sigma Aldrich	294136 ALDRICH	98%
1/16" OD, 0.04" ID FEP tubing	MicroSolv	48410-40	
1/16" OD, 0.02" ID ETFE tubing	MicroSolv	48510-20	
0.02" thru hole PEEK Tee	IDEX Health & Science	P-712	
1/4-28 ETFE flangeless ferrule for 1/16"	IDEX Health & Science	P-200N	
1/4-28 PEEK flangeless nut for 1/16"	IDEX Health & Science	P-230	
4-way PEEK L-valve	IDEX Health & Science	V-100L	
Syringe pump	Harvard Apparatus	70-3007	
8 mL stainless steel syringe	Harvard Apparatus	70-2267	
25 mL glass syringe	Scientific Glass Engineering	25MDF-LL-GT	
Optical breadboard	ThorLabs	MB1224	
300 mm translation stage	ThorLabs	LTS300	
Optical post	ThorLabs	TR2-4	TR2, TR3, or TR4
Optical post holder	ThorLabs	PH4-6	PH4 or PH6
365 nm LED	ThorLabs	M365LP1	
LED driver	ThorLabs	LEDD1B	
600 micron patch cord	Ocean Optics	QP600-1-SR	
Deuterium-halogen light source	Ocean Optics	DH-2000-BAL	
Miniature spectrometer	Ocean Optics	FLAME-S-XR1-ES	
Multifunction I/O device (DAQ)	National Instruments	USB-6001	
Virtual Instrument Software	National Instruments	LabVIEW 2015 SP1	