

Materials List for:

# Sediment Core Sectioning and Extraction of Pore Waters under Anoxic Conditions

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URL: <https://www.jove.com/video/53393>

DOI: [doi:10.3791/53393](https://doi.org/10.3791/53393)

## Materials

Name	Company	Catalog Number	Comments
Disposable glove bag(s)	Sigma-Aldrich	Z106089-1EA	One per two cores to be processed is usually sufficient.
N <sub>2</sub> tank	Praxair		Often gas supply companies can deliver these directly to the field laboratory.
Nitrogen gas regulator	VWR	55850-478	Or similar
Several feet of tubing that fits the regulator	VWR	89403-862	Or similar
Safety equipment to secure the tank	VWR	60142-006	
Adjustable tubing clamp	VWR	62849-112	
Waterproof, good sealing electrical tape	Scotch	Super 33+	Widely available
2-4 short bungee cords			Widely available
Squirt bottles of nanopure water	VWR	16650-082	Any similar bottle is fine; pack an additional supply of nanopure water to refill these.
Large supply of paper towels and Kimwipes			Widely available
50 ml centrifuge tubes	VWR	21008-951	Acid cleaned as described in protocol. At least 2/core section needed.
Several permanent in markers.			Widely available
Several straight razor blades and box cutters.			Widely available
Centrifuge	Beckman-Coulter	Allegra X-22	Faster rotor allows greater separation.
Rotor to accommodate 50 ml tubes	Beckman-Coulter	SX-4250	
50 ml plastic syringes without black rubber tip on the barrel	VWR	66064-764	Acid cleaned as described in protocol. At least 1/core section needed, plus 1 for overlying water.
Syringe filters compatible with aqueous solutions.	VWR	28143-310	Either 0.45 µm or 0.20 µm poresizes may be used. Plan on five filters per core section processed.
Plastic (disposable) spoons.			Widely available; Acid cleaned as described in protocol.
Several boxes of disposable gloves.			Widely available

Large plastic beakers or other waste containers to place in the glove bag.	VWR	13890-148	
Laboratory balance	VWR	10205-008	An available balance will be fine; high precision not required
Dry shipper, pre-charged with liquid nitrogen	VWR	82005-416	Needed only if samples are being returned to the home laboratory for sensitive analyses.
Laboratory notebooks			Water repellent can be useful
Core liners	Watermark	77280	Available from Forrestry Suppliers
Core caps	Ben Meadows	218105	
Core slicers	McMaster Carr	8707K111	Cut this into 9 3 x 3 squares
PVC spacers	McMaster Carr	48925K96	Cut this into short lengths
PVC couplings	McMaster Carr	4880K76	Approximately 12 needed
Dowel			Widely available
Lab stopper	VWR	59580-400	Check to ensure the correct size to fit snugly within the core liners
Plywood for core guidance plate and top of lab jack			Widely available
Lab jack	VWR	89260-826	
Clamps			Widely available
Portable oxygen monitor	RKI instruments	OX-07	