Tris buffer

Weight 0.484g of Tris Base.

Add 180mL of water.

Scale the pH meter.

Add sulfuric acid to have a pH=8.4.

Complete to 200mL of solution with water.

Other solutions

Tris+tween20: 0,2%w/w of Tween20 in Tris buffer.

Tris+Tween+PVP: PVP at 0.02%ww in the solution of Tris+Tween20.

KMnO4 solution: 40mg.mL-1 = 0.25 mM in water (new at each time).

Dopamine solution: 4.75mg.mL-1 in the Tris+tween20 solution (new at each time).

Silver nitrate solution: 18mg/mL in Tris+Tween20.

Ascorbic acid solution: 15.5mg.mL-1 in Tris+Tween20+PVP.

Polydopamine coating

1. Take 70µL of emulsion in a low binding Eppendorf and add 200µL of Tris+Tween20. Mix gently.

2. Centrifugate 30s at 4000rounds/minute, then eliminate 200µL of the aqueous phase below.

3. Rinse again one time.

4. Add 100µL of the dopamine solution and 85µL of Tris+Tween20. Mix gently.

5. Add 5µL of the solution of permanganate. Mix gently by taping with one finger.

6. Let incubate 2 hours in the obscurity in the rotor.

7. Centrifuge 30s at 4000rounds/minute, then eliminate 180µL of the aqueous phase below. Add 180µL of Tris+Tween20. Mix gently. Repeat the rinse one time.

Silver coating

1. Add 200µL of the solution of silver nitrate.

2. Let in incubate 90min in the rotor in obscurity.

3. Take 50µL of the solution in the ependorf and put it in another. Do it again with other ependorfs. 4 or 5 ependorfs daughter are obtained.

4. In each ependorf, add 150µL of the ascorbic acid solution.

19. Let incubate in rotor in obscurity 5min.