

Preparation for Bypass: Pre-bypass Checklist	Checklist on Bypass	Preparation for Separation-from-Bypass Checklist
<p>1. Anticoagulation</p> <p>a. Heparin administered – 300 IU/kg(check cardiac calculator) <input type="checkbox"/></p> <p>b. Desired level of anticoagulation achieved –ACT >480 sec <input type="checkbox"/></p> <p>2. Arterial cannulation <input type="checkbox"/></p> <p>a. Absence of bubbles in arterial line</p> <p>b. Evidence of dissection or malposition?</p> <p>3. Venous cannulation <input type="checkbox"/></p> <p>4. Are all monitoring/access catheters functional? <input type="checkbox"/></p> <p>5. Transesophageal echocardiograph (if used) <input type="checkbox"/></p> <p>a. In “freeze” mode</p> <p>b. Scope in neutral/unlocked position</p> <p>6. Supplemental medications</p> <p>a. Neuromuscular blockers <input type="checkbox"/></p> <p>b. Anesthetics, analgesics, amnestics <input type="checkbox"/></p> <p>7. Inspection of head and neck <input type="checkbox"/></p> <p>a. Color</p> <p>b. Symmetry</p> <p>c. Venous drainage</p> <p>d. Pupils</p>	<p>1. Assess arterial inflow</p> <p>a. Is arterial perfusate oxygenated? <input type="checkbox"/></p> <p>b. Is direction of arterial inflow appropriate? <input type="checkbox"/></p> <p>c. Evidence of arterial dissection? <input type="checkbox"/></p> <p>i) Patient’s arterial pressure persistently low ?</p> <p>ii) Inflow line pressure high?</p> <p>iii) Pump/oxygenator reservoir level falling?</p> <p>iv) Unilateral facial swelling, discoloration?</p> <p>2. Assess venous outflow <input type="checkbox"/></p> <p>a. Is blood draining to the pump/oxygenator’s venous reservoir?</p> <p>b. Evidence of SVC obstruction?</p> <p>3. Is bypass complete? <input type="checkbox"/></p> <p>a. Arterial and PA pressure nonpulsatile?</p> <p>b. Desired pump flow established?</p> <p>4. Discontinue drug and fluid administration. <input type="checkbox"/></p> <p>5. Discontinue ventilation and inhalation drugs to patient’s lungs; confirm perfusionist started sevoflurane at >1% <input type="checkbox"/></p> <p>6. If TCA turn off bair hugger, warming blanket and apply ice to head. <input type="checkbox"/></p> <p>7. Consider GTN/phentolamine for cooling rewarming. <input type="checkbox"/></p> <p>8. Turn on warming devices only after temperature above 30° <input type="checkbox"/></p>	<p>1. Air clearance manoeuvres completed; can use TEE to confirm <input type="checkbox"/></p> <p>2. ROTEM while rewarming. <input type="checkbox"/></p> <p>3. Send for blood products while rewarming – PCT, FFP ,platelets <input type="checkbox"/></p> <p>4. Rewarming completed <input type="checkbox"/></p> <p>a. Nasopharyngeal temperature 36-37°C</p> <p>b. Rectal/bladder temperature $\geq 35^{\circ}\text{C}$, but $\leq 37^{\circ}\text{C}$</p> <p>5. Address issue of adequacy of anesthesia and muscle relaxation <input type="checkbox"/></p> <p>6. Obtain stable cardiac rate and rhythm (use pacing if necessary) <input type="checkbox"/></p> <p>7. Pump flow and systemic arterial pressure <input type="checkbox"/></p> <p>a. Pump flow to maintain mixed venous saturation $\geq 70\%$</p> <p>b. Systemic pressure restored to normothermic levels</p> <p>8. Metabolic parameters – check ABG from perfusionist <input type="checkbox"/></p> <p>a. Arterial pH, PO_2, PCO_2 within normal limits</p> <p>b. Hct: >25%</p> <p>c. K+: 4.0-5.0 meq/L</p> <p>9. Are all monitoring/access catheters functional/zeroed? <input type="checkbox"/></p> <p>a. Transducers re-zeroed</p> <p>b. TEE (if used) out of freeze mode</p> <p>10. Respiratory management <input type="checkbox"/></p> <p>a. Atelectasis cleared/lungs reexpanded</p> <p>b. Residual fluid in thoracic cavities drained</p> <p>c. Ventilation reinstituted & start sevoflurane</p> <p>11. Inotropes/vasopressors/vasodilators started <input type="checkbox"/></p> <p>12. Blood products in OT before coming off bypass <input type="checkbox"/></p> <p>11. Protamine -3mg/kg(check cardiac calculator) <input type="checkbox"/></p>