**Key issues for MBBS year 4
Anaesthesia, Perioperative Medicine and Pain Workbook**

Chapter 1 Pre-operative patient: **Cardiac & Respiratory Systems**

 Walking up 1 flight of stairs without symptoms- a key fitness measure

 dysrythmias/cardiac failure/ Ischaemic Ht Diease before surgery is a big deal

 Carry on most drugs especially β blockers

 But stop ACE inhibitors / we mostly stop anticoagulants

 Caution stopping any anticoagulation in those with coronary stents = risk vs benefit

Chapter 2 Pre-operative patient: **Other systems**

 NBM guidelines - 2 hrs fluid /6 hours food /milk

 Diabetes: let good long term control, measure glucose, eat/drink ASAP after

 Diabetic drugs & insulin complex – Summary; NIDDM carry on, IDDM complex

 FBC, U & E, G+ S, other preop bloods

 Tests; Mnemonic: UBEXS; **Urine, Bloods, ECG, Xray, Special**

Chapter 3 **Intra- operative care**

 Classic drugs of Anaesthesia: Hypnosis/Analgesia/ Neuromuscular Paralysis

 MAP = CO x SVR - 2 basic causes of hypotension

 Anaesthesia causes hypotension

 Basic airway management Mask ventilation vs supra vs infraglottic airways

Chapter 4 **Post- operative care**

 LMWH timing; 6 hrs post then 6pm daily

 Classifying complications- local/systemic & immediate/early/late

 Enhanced recovery- the concept and some elements

 Ways to prescribe oxygen + antiemetics

Chapter 5 **Assessing & managing postoperative pain**

Basic approach ‘RAT’: Recognise Assess Treat’

Classifying Analgesia- Psychological / Physical / Local - regional / systemic (ladder)

Common analgesics: side effects, routes and doses

Spinals and Epidurals

Paracetamol, NSAID + Opioid 'rules' doses and timings

Chapter 6 **Body fluid compartments, Fluids and Blood Products**

 Intra/extra cellular, interstitial and vascular compartments

 Crystalloids/colloids/ blood products: types, contents, uses

 Anaemia preoperatively- the options

 Side effects of blood transfusion (Immediate /Long term /Large transfusions) Large red cell transfusions can cause ↓ToC ↓Ca++ (citrate) ↑K+ ↓coagulation

Chapter 7 **Intravenous fluid therapy**

 NICE ward guidelines: Assessment, Resuscitation, Routine Maintenance Replacement Redistribution

 Bleeding- physiology

 The stress response: Autonomic / Immune/ Endocrine / RAS

Chapter 8 **Patient safety, risk and recovery**

WHO safe surgery checklist components

Risk: BRAN= **B**enefits, **R**isk, **A**lternative treatments, doing **N**othing

 Consent-have capacity + informed

 Calculating risk: ASA + SORT score

Chapter 9 **Assessing Acutely ill patients**

DR ABCDE first few minutes

 'Do Not Attempt to Resuscitate' - what it means/doesn't mean

Chapter 10 **Critical Care**

Why go to Critical Care- indications

 What can be done there – systems approach; CVS RS GI Liver Renal Neuro

 Sepsis, sepsis 6 and qSOFA

 Issues in Critical Care