List of figures and images

Volume 1

Resuscitation
ILCOR BLS algorithm 3
ILCOR adult ALS algorithm 2010 7
ILCOR Paediatric ALS algorithm 8
Normal end tidal CO2 trace 15
Easy CAP 15
Bag mask ventilation circuit 18
Tracheostomy tube 18
Magills forceps, OPA and NPA 19
Macintosh laryngoscope 27
Airtraq 27
Endotracheal tubes 28
Oropharyngeal and laryngeal axes 29
Laryngeal anatomy 30
ETT misplacement 30
Mallampati classification 32
Difficult intubation 33
Laryngeal mask airway 34
iGEL airway 34
Cricothyroidotomy 38
Needle cricothyroidotomy equipment 38
BiPAP 52
Oxylog 2000 54
Oxylog 3000 54
Shivering artefact 59
Arrhythmia management 59
Ventricular tachycardia 61
VT management options 62
Ventricular fibrillation 63
Brugada syndrome 63
Atrial fibrillation 65
AF acute anti-coagulation options 66
Atrial fibrillation management options 67
AF reversion options 68
SVT 70
SVT management options 72
Accessory pathway 72

Clinical practice skills
Adverse events and errors 161
'Swiss cheese' model of adverse events 163
Leadership styles 182
Delegation styles 183
Conflict management techniques 189
Power distance values for various nations 198
Individualism values for various nations 199
Uncertainty avoidance values for various nations 200
Quantity of life values for various nations 201

Life expectancy 205
BMI chart 208
Coin rubbing 210
Management of refusal of treatment 214
Normal 12 lead ECG 229
Normal QRS morphology 230
Cardiac axis 230
Right bundle branch block 231
Left bundle branch block 232
Left anterior hemiblock 232
Left posterior hemi block 233

ECG changes of hyperkalaemia 234
ECG changes of hypokalaemia 234
PSAX ventricular view 236
PSAX aortic view 237
Subcostal 4 chamber view 238
Colour Doppler of the internal carotid artery 246
Anion gap acidosis 260
Non anion gap acidosis 261
Assessment of hyponatraemia 267
Assessment of hypokalaemia 271
ECG changes of hypokalaemia 271
ECG changes of hyperkalaemia 272
Red cell development 287
White cell development 288
Dose effect curve 292
Log dose effect curve 292
First order kinetics 294
Zero order kinetics 294
Drug concentration after repeated IV doses 297
Drug concentration following a single oral dose 297
## List of figures and images

### Research skills
- Effects of variance 324
- Common data distributions 325
- Positive skew 326
- Negative skew 326
- Normal distribution 327
- Choice of statistical tests - parametric data 333
- Choice of statistical tests - non parametric data 334

### Management
- Estimated NHS productivity 2001-2005 358
- Diminishing return on health expenditure 365
- Personal balance and stress 368
- Proposed Australian mass casualty triage system 382

### Cardiovascular disorders
- ECG in large PE 390
- Hampton’s hump 391
- CTPA of pulmonary embolism 393
- Type A dissection 400
- Type B dissection 400
- CXR in aortic dissection 401
- CTA in aortic dissection 401
- ECG in pericarditis 404
- CXR of oesophageal rupture 406
- CT of oesophageal rupture 406
- Hyperacute T waves in ACS 409
- T wave inversion in ACS 409
- Inferior STEMI 410
- Left main occlusion 411
- Anterior STEMI 411
- Lateral STEMI 412
- LBBB and inferior STEMI 413
- Left ventricular aneurysm 414
- Inferolateral ST depression of ischaemia 414
- Early repolarisation phenomenon 415
- Coronary artery anatomy 420
- Acute coronary syndromes 421
- ACS evaluation pathway 425
- Reperfusion choices for STEMI 432
- Choice of thrombolytic therapy 434
- CXR in APO 442
- JVP measurement 447
- Normal JVP trace 447
- Auscultatory diagram of aortic stenosis 451
- Auscultatory diagram of mild aortic regurgitation 451
- Auscultatory diagram of severe aortic regurgitation 451
- Auscultatory diagram of mitral stenosis 452
- Auscultatory diagram of mitral regurgitation 453
- Tilting disc valve 455
- Bileaflet St Jude valve 455
- Prosthetic valve on CXR 457
- Splinter haemorrhages 459
- Ventricular septal defect 462
- Patent ductus arteriosus 463
- Coarctation of the aorta 464
- CXR of coarctation of the aorta 464
- ECG in dextrocardia 466
- Tetralogy of Fallot 467
- Atrial myxoma 470
- Pulsus paradoxicus 472
- ECG of electrical alternans 473
- Echocardiogram of pericardial effusion 473
- CXR of pericardial effusion 474
- Pericardial drainage set 474
- Sub xiphoid pericardial approach 475
- ECG of acute myocarditis 476
- Erythema marginatum 477

### Respiratory disorders
- Anterior lung and pleural anatomy 490
- Pleural effusion 492
- RUL consolidation 492
- RML consolidation 492
- RLL consolidation 492
- LLL consolidation 493
- Lung abscesses on CXR 493
- CXR in APO 442
- Varicella pneumonia on CXR 496
- Divisions of the mediastinum 497
- CXR of pneumomediastinum 535
- CXR of pneumothorax 536
- Pneumothorax size estimation 538
- Chest drain insertion site 540
- Chest drain skin incision 540
- Chest drain insertion 541
- Underwater sealed drain system 542
- US of pleural effusion 544

### Abdominal disorders
- AXR demonstrating splenomegaly 550
- CT of splenic infarction 550
- Haemorrhoids and perianal haematomas 552
- Rectus sheath haematoma 558
- AXR and CT of small bowel obstruction 563
- AXR of sigmoid volvulus 564
- US of AAA 569
- CT of AAA 569
- AXR of AAA 570
- CT of acute aortic occlusion 571
- Branches of the aorta 573
- CT of free intra-abdominal gas 574
- Erect CXR of duodenal perforation 574
- Anatomy of the pancreas 577
- US of gall stones 579
- US of acute cholecystitis 580
- CT of acute cholecystitis 580

### Neurological disorders
- Functional areas of the cerebral cortex 607
- Saggital anatomy of the brain 608
List of figures and images

Volume 2

Infectious disorders
Cellulitis of the foot 754
Rash of Herpes Zoster 759
Kaposi’s sarcoma 767

Paediatrics
Fever without source in children < 3 years of age 804

Mental health
Mental health flow chart 838

Obstetrics & gynaecology
Sites of ectopic pregnancy 858
The menstrual cycle 862
Normal fundal height 875

Urogenital disorders
KUB of ureteric calculus 898
CT of high grade ureteric obstruction 898
CT of VUJ calculus 899
CT of polycystic kidney disease 915
CT of renal cyst 916
US of hydronephrosis 919

Haematological disorders
Anaemia 928
Microcytic anaemia 930
Macrocytic anaemia 931
Platelet development 938
Clotting system 940
Ecchymoses 941
Deep veins of the lower limb 956
Axillary vein thrombosis 957
Lymphocyte development 964

Soft tissue disorders
CXR of Marfan’s syndrome 999

Environmental disorders
Redback spider 1008
Funnel Web spider 1010
Snake bite marks 1016
VDK 1017
Snake bite management 1020
Python bite 1021
ECG of hypothermia 1041
Skin features of lightning injury 1057

Skin disorders
Anatomy of the skin 1062
Target lesions 1064
Pemphigus 1065
Keratoacanthoma 1075
# List of figures and images

## Head & neck disorders
- Middle and internal ear anatomy 1078
- Left tympanic membrane anatomy 1080
- Anatomy of the sinuses 1084
- External laryngeal anatomy 1086
- Epiglottitis 1087
- Internal nasal anatomy 1090
- Submandibular swelling 1094
- Location of the salivary glands 1097
- Dental anatomy 1098

## Eye disorders
- The slit lamp 1104
- Ocular anatomy 1105
- Fundoscopic anatomy 1106
- Mire position for measuring IOP 1106
- iCare tonometer 1107

## Trauma
- Acute extradural haematoma 1138
- Acute subdural haematoma 1138
- Acute tentorial subdural haematoma 1139
- Chronic subdural haematoma 1139
- Acute on chronic subdural 1139
- Assessment and management of head injury 1141
- Sites for emergency craniotomy 1145
- Bones of the upper cervical spine 1150
- C5-6 instability 1150
- Lateral cervical spine X-ray interpretation 1151
- Rotated peg view 1152
- Assessment of suspected cervical spine injury 1154
- Bilateral C5-6 facet joint dislocation 1155
- Anterior tear drop fracture 1155
- Atlanto axial dislocation 1155
- Displaced type II dens fracture 1155
- Hangman's fracture 1155
- Jefferson fracture 1156
- Lumbar vertebral anatomy 1157
- L1 crush fracture 1158
- L1 burst fracture 1158
- Spinal tract anatomy 1159
- Dermatomes of the body 1161
- MRI of cord lesion 1162
- CXR of haemothorax 1165
- Left haemothorax 1166
- Bilateral pneumothoraces 1166
- Ruptured right mainstem bronchus 1167
- CXR of pulmonary contusion 1168
- CXR of aortic rupture 1169
- CTA of aortic injury 1169
- CTA of aortic tear 1169
- CXR of traumatic diaphragmatic hernia 1172
- Facial bone anatomy 1174
- Mandibular fracture 1175
- TMJ dislocation 1176
- Tripod fracture 1176
- Blow out fracture X-ray 1177
- CT of blowout fracture 1177
- Le Fort fractures 1178
- Dental injuries 1179
- Anatomy of the pinna 1181
- FAST scan of Morrison's pouch 1183
- Subcapsular splenic haematoma 1184
- Grade II splenic injury 1184
- Grade III splenic injury 1185
- Grade V splenic injury 1185
- Grade III liver laceration 1186
- Liver contusion 1186
- Grade II renal injury 1189
- Grade IV renal injury 1189
- Extraperitoneal bladder rupture 1189
- Anatomy of the pelvis 1192
- Acetabular fracture 1193
- CT of sacral fracture 1194
- Pubic diastasis 1195
- Pelvic angiogram 1195
- Closed degloving injury 1195
- Knife as foreign body 1197
- Zones of the neck 1199
- Lateral thoracotomy incision site 1201
- Thoracotomy view 1201
- Right cubital fossa anatomy 1204
- Cross section of the forearm 1206
- Gunshot wound skin marker 1208
- CT of gunshot wound to neck 1209
- Zones of the hand 1211
- Surface anatomy of the palm 1212
- Anatomy of the finger tendons 1213
- Innervation of the dorsum of the hand 1214
- Mallet finger 1214
- Anatomy of the finger phalanges 1216
- Burn area assessment chart - adult 1223
- Burn depth assessment 1226
- Interrupted suture insertion technique 1232
- Skin flap repair 1232

## Bone and joint disorders
- Assessment of joint pain 1248
- Bursae around the knee 1251
- MRI of lumbar discitis 1253
- Salter Harris classification of fractures 1264
- Dislocated left hip prothesis 1272
- Right posterior hip dislocation 1272
- Subcapital NOF fracture 1273
- Intertrochanteric NOF fracture 1273
- Anatomy of the knee joint 1276
- Lipohaemarthrosis 1277
- Lateral tibial plateau fracture 1278
- Patella fracture 1278
- Ankle joint anatomy 1282
- Bones of the foot - medial aspect 1283
- Bones of the foot - plantar aspect 1284
- Ankle fracture 1285
- Talar dome fracture 1286
- Calcaneal body fracture 1286
- Lisfranc's fracture dislocation 1287
- Fifth metatarsal base fracture 1287
- Achilles tendon rupture 1289
- Shoulder anatomy 1291
- Anterior shoulder dislocation 1291
- Luxatio erecta 1293
Type I distal clavicular fracture 1294
Posterior sternoclavicular joint dislocation 1295
A-C joint dislocation 1295
Fractured neck of humerus 1296
Bones of the elbow - lateral view 1299
Bones of the elbow - medial aspect 1299
Supra and intracondylar fracture of the humerus 1300
Medial epicondyle fracture 1301
Lateral humeral condyle fracture 1301
Monteggia fracture 1302
Bones of the wrist - dorsal aspect 1303

Normal carpal alignment 1303
Translunate dislocation of the carpus 1304
Carpal dislocation at the wrist 1304
Transcaphoid perilunate dislocation 1304
Colle’s fracture 1305
Torus fracture 1305
Smith’s fracture 1305
Scaphoid fracture 1306
Fractured 5th metacarpal neck 1308
Radial collateral ligament injury 1308

Toxicology
The parasympathetic nervous system 1314
The sympathetic nervous system 1315
ECG of Na+ channel blocking toxicity 1316

Management of poisoning 1323
Paracetamol toxicity nomogram 1342
Paracetamol management 1344