Acute Coronary Syndrome (ACS) Management

Initial management of ACS

Mnemonic: MONAC

- Morphine: 10mg in 10ml slowly IV – titrate to pain (+ Metoclopramide IV)
- Oxygen: only if sats outside target range of 94-98%
- Nitrates: sublingual GTN (2 sprays) if not hypotensive (the PRN)
- Aspirin: 300mg PO loading dose (then 75mg OD)
- Clopidogrel: 300-600mg PO loading dose (then 75mg OD)

Plus start: atorvastatin 80mg ON, β-blocker (e.g. bisoprolol 2.5mg OD), ACS-specific LMWH below

Next, refer to cardiology for reperfusion therapy if indicated

Indications & contraindications for reperfusion therapy

<table>
<thead>
<tr>
<th>PCI (gold standard)</th>
<th>Indications</th>
<th>Contraindications</th>
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<tbody>
<tr>
<td>Indications:</td>
<td>Any ACS:</td>
<td>Significant co-morbidities (relative contraindication)</td>
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<td></td>
<td>• STEMI (inc. any amount of ST elevation / new LBBB)</td>
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<td></td>
<td>• NSTEMI</td>
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<td></td>
<td>• Unstable angina</td>
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<tr>
<td>Thrombolysis</td>
<td>STEMI with:</td>
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<td>• ST-elevation in two contiguous ECG leads</td>
<td>Activity internal bleeding</td>
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<td>o &gt;1mm in limb leads</td>
<td>Bleeding disorder</td>
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<td>o &gt;2mm in chest leads</td>
<td>Aortic dissection</td>
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<td></td>
<td>• Or, new LBBB</td>
<td>Stroke (haemorrhagic at any time or ischaemic &lt;6months)</td>
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<td>Surgery/trauma &lt;2 weeks</td>
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Short-term management of ACS

ST elevation
Reperfusion therapy as soon as possible (PCI is gold standard)

Non-ST elevation
Stabilise medically and admit and await cardiologist review:
- High risk (raised troponin/persistent pain/ST depression/diabetic): will go for PCI on a semi-elective basis (depending on TIMI/GRACE risk stratification score) + may be given glycoprotein IIb/IIIa inhibitor in meantime
- Low risk (i.e. resolved unstable angina): may go home with medications and outpatient stress test/angiography or have as inpatient

All patients
- ACS-specific LMWH (5 day course, then back to normal VTE prophylactic-dose LMWH as per hospital protocol)
  - Subcutaneous fondaparinux 2.5mg OD or enoxaparin 1mg/kg BD (unless PCI planned <24h)
  - Unfractionated heparin (if PCI planned <24h) i.e. STEMI
- Bed rest 48 hours with cardiac monitoring
- Admit for 4-7 days (do daily exam and cardiac enzymes for 2-3 days)
- Start some long-term medications early
  - Early β-blockade (reduces myocardial demand)
  - ACE inhibitor within 24 hours (but after 6 hours) if MI or LVF (prevents cardiac remodelling)
- Correct electrolytes

Long-term management of ACS

- β-blocker (reduces myocardial demand – continue for 12 months, or life-long if LV systolic dysfunction)
- ACE-inhibitor (prevents cardiac remodelling)
- GTN spray PRN
- Cardiovascular risk reduction
  - Aspirin (life-long) + clopidogrel (12 months)
  - Statin
  - BP control
  - Lifestyle modifications / cardiac rehabilitation