Chronic Coronary Syndrome (Previously Known As Stable Angina) – Management

Manage cardiovascular risk factors and other co morbidities
- Diabetes, hypertension, anaemia, hyperthyroidism, hyperlipidaemia

Hypertension- keep BP <130/80 in line with ESC[1]

Pharmacological Management

To alleviate symptoms

Sublingual GTN (when needed)[2] to ALL Patients:
- Acute relief of angina symptoms/or before exertion
- Repeat dose after 5 minutes if pain has not gone
- Call emergency services if pain has not gone after 5 minutes of second dose
- If attacks occur more than twice a week, regular therapy is required and should be introduced in a step-wise manner according to response (*See below*)

1st Line Therapy (see page 2)
- **Beta blocker** AND/OR
- **Calcium channel blocker (CCB)**

Consider combining a Beta blocker with a Dihydropyridine CCB.
Where a Beta blocker is contraindicated or not tolerated ONLY then consider a Non-Dihydropyridine CCB (Diltiazem/Verapamil) on its own.

If beta blockers and CCB are contraindicated /not tolerated:

2nd line therapy (see page 2)
- **Long lasting nitrate** AND/OR
- **Nicorandil**

If symptoms uncontrolled on dual /maximum tolerated doses:

3rd line therapy - referral to cardiologist (see page 2)
- Ivabradine (Amber-G)
- Ranolazine (Amber-G)

Consider referral to cardiologist
- Symptom control is poor on the maximum licensed or tolerated doses or on two combined drugs
- There are several risk factors or a strong family history
- There are problems with employment or life insurance

Drugs for Secondary Prevention

(1) Antiplatelet[3]
- Aspirin 75mg daily +/- PPI taking into account bleeding risk and co-morbidities
- Clopidogrel 75mg daily if Aspirin not tolerated. People with Stroke or Peripheral Arterial Disease should continue Clopidogrel rather than aspirin.

Note: Clopidogrel does not have a license for stable angina)

Stable angina with elective coronary stenting:
- Bare stent: Clopidogrel AND Aspirin 75mg daily for 1 month then Aspirin 75mg only
- Drug-eluting stents - Clopidogrel AND Aspirin 75mg daily for up to 12 months, then Aspirin 75mg only

(2) Statin Use Barnsley Lipid Algorithm[4] on the choice of long-term standard therapy

(3) ACE Inhibitor
- Consider the benefits of treatment with an ACE-I for patients with stable angina and diabetes[5] or left ventricular systolic dysfunction[6].
- Offer or continue ACE-I for other conditions e.g. heart failure, hypertension.

Offer treatment of high blood pressure in line with the Barnsley Antihypertensive Medication Guideline[7]

Provide patient information and advice

- **Lifestyle Advice**
  - Increase physical activity within
  - Stop smoking
  - Follow a Mediterranean diet
  - Weight control
  - Consumption of fish oils rich in omega- 3 fatty acids
- **Driving - group 1 cars and motorcycles**

  Must not drive when symptoms occur:
  - At rest
  - With emotion
  - At the wheel

  Driving may resume after satisfactory symptom control. (Need not notify DVLA; see DVLA guidelines for group 2 bus and lorry as needed)
- **Work**

  Most people continue their work. Heavy manual workers may need to alter their profession.
- **Sexual activity**
  - Unlikely to precipitate an episode of angina if patient can briskly climb two flights of stairs
  - GTN taken immediately before Intercourse if sexual activity preciptates angina
  - Phosphodiesterase type 5 inhibitors are contraindicated with long acting nitrates or nicorandil.

Patient follow-up and rehabilitation
- Review every 6 months to 1 year

Drugs to Alleviate Stable Angina Symptoms: Detailed Drug Information

-Always reassess every 2-4 weeks after initiating or changing drug therapy [2]
- Titrate according to symptoms and heart rate for full anti-anginal effects

1st Line Therapy

Consider combining a beta-blocker with a Dihydropyridine CCB if symptoms not adequately controlled on a beta-blocker alone:

Beta blockers (one of the following):
Tailor doses to ensure symptom control /maximum beta blockade/ resting heart rate of 55-60 beats/min:
- **Bisoprolol 5-20mg ONCE daily**
- **Atenolol 25-100mg daily** (may prefer to give as divided doses e.g. 50mg twice daily due to plasma half-life of 6-9 hours)
- **Metoprolol 50-100mg TWICE daily**[6,8]

AND

Calcium Channel Blockers – Dihydropyridines (one of the following):
- **Long acting Felodipine 5-10mg daily**
- **Amlodipine 5-10mg daily**
  - Safe to combine Dihydropyridine CCBs with Beta blockers

OR *if a beta blocker is not tolerated/contra-indicated, only then consider a heart rate-lowering CCB*

Calcium Channel Blockers: Non-Dihydropyridines:
- **Diltiazem prescribe by brand** as ONCE daily: Zemtard® or TWICE daily: Angitil SR®. (Tildiem® three times daily preparation should only be initiated in 'exceptional circumstances' where there is a clinical need)

Verapamil: For consideration by Secondary Care only following appropriate clinical assessment.

(Avoid use in combination with beta blockers)

2nd Line Therapy

If beta blockers or CCB contraindicated or not tolerated/symptoms are not adequately controlled then consider mono/combinational therapy with:

Long Lasting Nitrate (as mono/combinational therapy):
- **Isosorbide Mononitrate 10-60mg TWICE daily** by asymmetric dosing e.g. Take ONE tablet at 8AM and ONE at 2PM to extend the nitrate-free period
- If there is a specific reason to use a modified release ONCE DAILY preparation e.g. headache, concordance issues, then prescribe Monomil XL® or Chemydur XL® and document reason

AND/OR

Nicorandil:
- Consider only as 2nd line treatment due to increased risk of serious skin, mucosal and eye ulceration, including GI Ulcer[9]
- **10-20mg** TWICE daily (5mg TWICE daily if headache); up to 40mg TWICE daily

3rd Line Therapy

If symptoms uncontrolled on TWO anti-anginal therapies on maximum tolerated dose:

Cardiologist referral for:
- **Ivabradine** (For information only – Amber-G on Traffic Light List):- Started only if resting HR at least 70 bpm
  - When combining Ivabradine with a CCB, use a **Dihydropyridine CCB ONLY** e.g. Amlodipine, long acting felodipine.
  - Monitor for AF/Bradycardia. Carefully consider if benefits outweigh risks if patient develops AF or becomes bradycardic. Consider stopping if resting heart rate remains below 50 bpm or symptoms of bradycardia persist.
  - Consider stopping if limited or no symptom control after 3 months[10]
- **Ranolazine** (For information only – Amber-G on Traffic Light List):- Useful in patients where options are limited by bradycardia or hypotension

Consider adding a third anti-anginal drug not from algorithm above only when[5]:
1) The person's symptoms are not satisfactorily controlled with two anti-anginal drugs

AND

2) The person is waiting for revascularisation or revascularisation is not considered appropriate or acceptable

Development Process

This guidance was prepared in March 2021 and is due for review in March 2023. This guidance has been subject to consultation and endorsement by the Cardiologists in Barnsley and was ratified by the Area Prescribing committee on….

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