The RCGP Curriculum

The Curriculum Topic Guides

Super-Condensed Topic Guides 2021

Cardiovascular Health

The Role of the GP and emerging issues in primary care

- Work with patients to promote cardiovascular health including making healthy lifestyle choices
- Engage in disease prevention activities including identifying and managing risk factors for cardiovascular disease and advising on screening
- Diagnose and holistically manage common, important, and emergency cardiovascular conditions, taking into account social and cultural factors
- Monitor and manage the care of people with long-term cardiovascular conditions such as hypertension, chronic heart failure or AF
- Understand, apply, and communicate key research findings that influence cardiovascular risk and disease
- Understand the influence of an ageing population on cardiovascular health and services.

Knowledge and Skills Self-Assessment Guide

Symptoms and Signs

- Cardiac murmurs
- Chest pain
- Circulatory symptoms of ischaemia, thrombosis, chronic arterial and venous insufficiency
- Dyspnoea
- Oedema
- Palpitations
- Syncope, dizziness and collapse including non-cardiovascular causes
- Symptoms and signs of stroke/Transient Ischaemic Attack (TIA).

Common and Important Conditions

- Acute cardiovascular problems including cardiac arrest, acute coronary syndrome, acute myocardial infarct, acute left ventricular failure, dissecting aneurysms, severe hypertension and life-threatening arrhythmias, cardiogenic shock, acute ischaemia of limbs and gut, TIA and stroke
- Arrhythmias including conduction defects such as atrial fibrillation and flutter, heart block, supraventricular tachycardia, ventricular rhythm abnormalities
- Cardiomyopathies: primary and acquired, including dilated, hypertrophic obstructive
- Cardiovascular conditions for which anticoagulation may be relevant such as Atrial Fibrillation (AF), myocardial ischaemia, peripheral vascular disease and TIA/stroke (including heparin, thrombolysis indications, oral anticoagulation)
- Cerebral disease for which cardiovascular risk factors are important e.g. stroke, vascular dementia (see also Topic Guide 4.17 Neurology)
- Circulation disorders including: arterial problems such as peripheral vascular disease, vasculitis, aneurysms (cerebral, aortic and peripheral);and venous problems such as venous thromboembolism, pulmonary embolism, Raynaud's disease, varicose veins, venous and arterial ulcers
- Complications and malfunction of pacemakers relevant to primary care
- Congenital heart disease such as coarctation of the aorta, Ventricular Septal Defect (VSD), Atrial Septal Defect (ASD), Patent Ductus Arteriosus (PDA) and presentation of these both in children and adults
- Coronary heart disease including complications such as mural thrombus, ventricular aneurysm, and rhythm disturbance
- Drug-induced heart disease (e.g. secondary to cancer treatment with chemotherapy/ radiotherapy, recreational drugs)
- Heart failure: acute and chronic including left ventricular dysfunction, right heart failure, and cor pulmonale
- Hypertension: essential (and its classification into stages), secondary, and malignant
- Indications for and monitoring of commonly used drugs such as antihypertensive drugs, anticoagulants and statins
- Infections such as viral myocarditis, infective endocarditis, pericarditis, rheumatic fever and complications
- Pulmonary hypertension: primary and secondary to underlying causes such as fibrotic lung disease and recurrent pulmonary emboli
- Risk assessment tools such as QRISK, CHA_2D_2SVASc.
- Risk factors for coronary heart disease and other thromboembolic diseases such as lipid disorders, diabetes, hypertension
- Valvular problems such as mitral, tricuspid, pulmonary and aortic stenosis and regurgitation

Examinations and Procedures

- Cardiovascular system examination

- Blood pressure monitoring
- Pulse oximetry
- Use of emergency equipment, including defibrillator, and oxygen delivery
- Emergency cardio-pulmonary resuscitation.

Investigations

- Current risk assessment tools (eg CHA_2D_2SVASc and HASBLED for atrial fibrillation, QRISK/ASSIGN for Coronary Heart Disease)
- Relevant blood investigations such as cardiac enzymes, natriuretic peptides, or D-dimer
- Secondary care interventions such as coronary angiography and stents, perfusion scanning, and CT scans
- Specific cardiac investigations including home and ambulatory BP monitoring, electrocardiogram (ECG), exercise ECG, 24 hour and event monitoring ECGs, echocardiography, venous dopplers and Ankle Brachial Pressure Index (ABPI) measurement.

How this might be tested in MRCGP

AKT

- Interpreting ECG tracings
- Adverse drug effects of anti-hypertensives
- Genetics of familial hypercholesterolaemia.

RCA

- Man is concerned that he may have heart disease having experienced chest pain when he exercises at the gym
- Woman with well-controlled heart failure has increasing exertional dyspnoea over the past fortnight
- Father is concerned about sudden death in young athletes and requests a routine ECG for his 12-year-old son who has joined a running club.

WPBA

- Learning log reflecting on having to explain a pacemaker to a patient who has not understood the consultant's explanation
- Log entry about the logistics and value of the practice coronary heart disease clinic
- Consultation Observation Tool (COT) about advice for a man requesting a calcium score after a private medical examination when you are unsure about the evidence for this
- CEPS about performing CPR on a collapsed patient.

How to learn this topic

This section describes *examples* of opportunities for learning.
We recognise that Covid-19 restrictions have significantly affected their accessibility

Acute

- Seeing emergency presentations and referrals from primary care
- Being a member of the 'Arrest Team'; use of emergency equipment
- Attending acute clinics e.g. Rapid Access TIA/chest pain
- Seeing procedures e.g. angioplasty
- Following the patient journey e.g. via ward rounds, MDT meetings, discharge planning.

Other relevant specialties

- Ambulance service: pre-hospital care e.g. acute MI, collapse
- Cardiovascular rehabilitation programmes led by physiotherapists
- Diabetes, endocrinology, lipid clinics
- Paediatrics and transitional care
- Public health: population measures to address cardiovascular risk factors
- Palliative care.

Core themes

- **Communication and Consultation** –person centred, culturally sensitive approaches to heart disease & risk factors; communicating risk e.g. QRISK, anticoagulation
- **The normal and the abnormal** – impact of CVD on life, work, driving etc; atypical presentations e.g. of serious chest pain
- **Prescribing** – safety; polypharmacy
- **Teamworking** – care transition from paeds to adult; involvement of multiple specialties
- **Health promotion & prevention** – "lifestyle" risk factors; social determinants of health
- **Medico-legal/Ethics** – drug induced heart disease; resource allocation; patient autonomy versus unhealthy behaviours.

Primary Care

- Day to day practice
- Out of hours in GP
- In-house cardiovascular clinics e.g. hypertension

Community/MDT

- Community specialist teams e.g. heart failure, cardiac rehab
- Community weight management and smoking cessation services
- Outpatients/specialised clinics e.g. vascular, arrhythmias, cardiac imaging and other investigations.

Tips

- Audit/QIP
- Significant Event Analysis
- Clinical governance
- Risk Assessment
- Dr as teacher
- Leadership
- BNF
- NICE guidelines