1 Guideline title

Post MI – secondary prevention in primary and secondary care for patients following a myocardial infarction.

1.1 Short title

Post MI

2 Background

a) The National Institute for Clinical Excellence (‘NICE’ or ‘the Institute’) has commissioned the National Collaborating Centre for Primary Care to develop a clinical guideline on secondary prevention for patients following a myocardial infarction in primary and secondary care (post MI), and to update the existing inherited NICE guideline ‘Prophylaxis for patients who have experienced a myocardial infarction’ (inherited Guideline A April 2001) for use in the NHS in England and Wales. This follows referral of the topic by the Department of Health and Welsh Assembly Government (see Appendix). The updated guideline will provide recommendations for good practice that are based on the best available evidence of clinical and cost effectiveness.

b) The Institute’s clinical guidelines will support the implementation of National Service Frameworks (NSFs) in those aspects of care where a Framework has been published. The statements in each NSF reflect the evidence that was used at the time the Framework was prepared. The clinical guidelines and technology appraisals published by the Institute after an NSF has been issued will have the effect of updating the Framework.
3 Clinical need for the guideline

a) The incidence of myocardial infarction (MI) for men aged between 30-69 is about 600 per 100,000 and for women about 200 per 100,000. From these statistics, the British Heart Foundation (2004) have estimated that there are about 147,000 MIs per year in men of all ages in the UK and 121,000 in women, giving a total of 268,000 cases. In the UK, the prevalence of MI is about 838,000 for men, and about 394,000 for women. This gives a total of over 1.2 million cases (British Heart Foundation, 2004).

b) MI is a complication of coronary heart disease (CHD), together with heart failure, atrial fibrillation and other rhythm disturbances. CHD is a preventable disease. The death rate from CHD has been falling since the early 1970s, and for people aged below 75, rates have fallen by almost 25% since 1996 (Department of Health, 2004). In spite of these improvements, when compared internationally, the UK death rate from CHD is relatively high with more than 103,000 deaths per year (Department of Health, 2003). Comparing Western European countries, only Ireland and Finland have a higher death rate from CHD than the UK (British Heart Foundation, 2004).

c) With respect to gender, socio-economic status, ethnicity and geographical location in the UK, there are significant differences in the death rate from CHD.

- Death rates in men aged under 75 are nearly three times higher than in women (Department of Health, 2003).

- Death rates in affluent areas in the UK are half of those in deprived areas (Department of Health, 2003).

- People of South Asian origin have almost a 50% higher death rate compared with the general population (Wild and McKeigue, 1997).
d) Cardiac rehabilitation programs have been consistently shown to reduce mortality rates in CHD patients (Canadian Coordinating Office for Health Technology Assessment, 2003). Cardiac rehabilitation is the coordinated sum of interventions required to ensure the best possible physical, psychological and social conditions to enable the CHD patient to preserve or resume optimal functioning in society. It also aims to slow or reverse progression of the disease. Cardiac rehabilitation cannot be regarded as an isolated form or stage of therapy, but must be integrated within secondary prevention services, of which it forms only one facet (WHO definition, 1993).

e) A number of drugs have been shown to improve outcome after MI. Anti-platelet agents, beta-adrenoreceptor blocking drugs and statins reduce both mortality and incidence of non-fatal infarction. Angiotensin-converting enzyme inhibitors have been shown to reduce mortality after an MI.

4 The guideline

a) The guideline development process is described in detail in three booklets that are available from the NICE website (see ‘Further information’). The guideline development process – information for stakeholders, the public and the NHS describes how organisations can become involved in the development of a guideline. Guideline development methods – information for National Collaborating Centres and guideline developers provides advice on the technical aspects of guideline development.

b) This document is the scope. It defines exactly what this guideline will (and will not) examine, and what the guideline developers will consider. The scope is based on the referral from the Department of Health and Welsh Assembly Government (see Appendix).

c) The areas that will be addressed by the guideline are described in the following sections.
4.1 Population

4.1.1 Groups that will be covered
Adult patients (≥ 18 years) who have had an MI. The following groups are included:

a) Patients following the early acute phase.

b) Patients who are identified as having had a proven MI at some point in the past.

4.1.2 Groups that will not be covered
a) Patients who have had a non-atherosclerotic-induced MI.

b) Patients in the early acute phase of an MI.

c) Patients that have had a non-spontaneous MI (for example, a periprocedural MI, which may occur after percutaneous coronary intervention).

4.2 Healthcare setting
a) The guideline will cover the care received from healthcare professionals who have direct contact with, and make decisions concerning, the care of people who have survived the early acute phase of an MI.

b) The guideline will address care in primary and secondary and, where appropriate, tertiary centres.

c) The management of patients in accident and emergency departments will not be considered.

d) The guideline will also be relevant to the work, but will not cover the practice, of those working in the occupational health services and voluntary sector.
4.3 Clinical management of secondary prevention

4.3.1 Areas that will be covered

a) The guideline will cover the management of MI following the early acute phase.

b) The guideline will cover pharmacological intervention including: drug interactions, side effects, commencement of treatment, monitoring of treatment and duration of treatment. The guideline will advise on the use of the following classes of drugs within the licensed indications for secondary prevention.

i. angiotensin-converting enzyme inhibitors and angiotensin II receptor blockers

ii. antiplatelet drugs including aspirin

iii. beta-adrenoreceptor blocking drugs

iv. calcium channel blockers

v. omega-3-acid ethyl esters

vi. potassium channel activators

vii. vitamin K antagonists.

The guideline will exclude the following drugs.

i. Anti-hypertensive therapy as this guideline will cross refer to the NICE Guideline ‘Hypertension – management of hypertension in adults in primary care’, August 2004

ii. General lipid lowering drugs as this guideline will cross refer to the NICE Guideline ‘Hyperlipidaemia: identification and management of hyperlipidaemia as part of cardiovascular risk assessment in primary care’ (ongoing)
iii. Heart failure drugs as this guideline will cross refer to the NICE Guideline 'Management of chronic heart failure in adults in primary and secondary care', October 2003

iv. Drugs that are subject to a NICE Technology Appraisals (section 6) as this guideline will cross refer to the appropriate appraisals.

Recommendations on treatment options will be based on the best evidence available to the guideline development group. Note that guideline recommendations will normally fall within licensed indications; exceptionally, and only where clearly supported by evidence, use outside a licensed indication may be recommended. The guideline will assume that prescribers will use the Summary of Product Characteristics to inform their decisions for individual patients.

c) The guideline will cover the criteria for referral for assessment for possible coronary revascularisation.

d) The guideline will cover cardiac rehabilitation. According to the US Public Health Service, cardiac rehabilitation is defined as a rehabilitative program that involves the following:

- medical evaluation
- prescribed exercise
- education
- counseling of patients with cardiac disease

e) The guideline will cover exercise, education sessions, and resumption of physical, sexual, social and vocational activities and psychological aspects of rehabilitation.

f) The guideline will include advice on the following ongoing lifestyle modifications:

i. diet
ii. exercise

iii. alcohol consumption

iv. smoking cessation will be cross-referred to the NICE Technology Appraisal ‘Guidance on the use of nicotine replacement therapy (NRT) and bupropion for smoking cessation’, April 2002.

g) The guideline will advise on how to improve access to standard care of the following patient groups who are at risk of being excluded from secondary prevention following an MI:

i. black and minority ethnic groups

ii. older people

iii. lower socio-economic groups

iv. women.

4.3.2 Areas that will not be covered

a) Diagnosis of an MI either acutely or retrospectively.

b) Interventions specific to the early phase of the acute MI including (but not exclusively):

- re-perfusion strategies in ST elevation infarcts
- conservative versus invasive management in non-ST elevation infarcts including angiography.

c) Methods of assessment of cardiac status before possible coronary revascularisation.

d) The additional management of diabetes and heart failure in patients who have had an MI.

e) Symptom control such as the management of angina.
4.4 Status

4.4.1 Scope

This is the draft scope.

4.4.2 Guideline

The development of the guideline recommendations will begin in November 2004.

5 Further information

Information on the guideline development process is provided in:

- The guideline development process – an overview for stakeholders, the public and the NHS
- Guideline development methods – information for National Collaborating Centres and Guideline Developers

These booklets are available as PDF files from the NICE website (www.nice.org.uk). Information on the progress of the guideline will also be available from the website.

6 Relevant NICE publications

Clinical Guidelines:

Type 2 diabetes – management of blood pressure and blood lipids, October 2002.

Hypertension – management of hypertension in adult patients in primary care, August 2004.

Hyperlipidaemia – identification and management of hyperlipidaemia as part of cardiovascular risk assessment in primary care (ongoing).

Obesity – the prevention, identification, evaluation, treatment and weight maintenance of overweight and obesity in adults (ongoing).

**Technology Appraisals:**

Guidance on the use of nicotine replacement therapy (NRT) and bupropion for smoking cessation, April 2002.

Vascular disease – clopidogrel and dipyridamole for the prevention of occlusive vascular events, (ongoing).


Statins for the prevention of coronary events (ongoing).
Appendix – Referral from the Department of Health and Welsh Assembly Government

The Department of Health and Welsh Assembly Government asked the Institute to update the NICE Guideline ‘Prophylaxis for patients who have experienced a myocardial infarction’, April 2001.