# NHS Grampian Protocol For The Prescribing And Administration Of Oral Opioids Following Trauma Or Surgery in Adults

<table>
<thead>
<tr>
<th>Co-ordinators:</th>
<th>Consultation Group:</th>
<th>Approver:</th>
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<tbody>
<tr>
<td>Consultant Anaesthetist, Lead Acute Pain Sector</td>
<td>See Page 5</td>
<td>Medicine Guidelines and Policies Group</td>
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<tr>
<th>Identifier:</th>
<th>Review Date:</th>
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<tbody>
<tr>
<td>NHSG/Prot/OralOpioid/MGPG960</td>
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<td>October 2018</td>
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Uncontrolled when printed

Version 4

Executive Sign-Off

This document has been endorsed by the Director of Pharmacy and Medicines Management

Signature: [Signature]

[Signature]
Title: NHS Grampian Protocol For The Prescribing And Administration Of Oral Opioids Following Trauma Or Surgery in Adults

Unique Identifier: NHSG/Prot/OralOpioid/MGPG960

Replaces: NHSG/Prot/Opioid/MGPG815, Version 3

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Lead Author/Co-ordinator: Consultant Anaesthetist, Acute Pain Service

Subject (as per document registration categories): Policy

Key word(s): Protocol analgesia oral trauma opioids surgery prescribing administration pain


Document application: NHS Grampian Acute Sector

Purpose/description: To provide guidance in the use of oral morphine and oral oxycodone following surgery/trauma.

Responsibilities for implementation:

Organisational: Chief Executive and Management Teams
Corporate: Senior Managers
Departmental: Heads of Service/Clinical Leads
Area: Line Managers
Hospital/Interface services: Assistant General Managers and Group Clinical Directors
Operational Management Unit: Unit Operational Managers

Policy statement: It is the responsibility of supervisory staff at all levels to ensure that their staff are working to the most up to date and relevant policies, protocols procedures. By doing so, the quality of the services offered will be maintained, and the chances of staff making erroneous decisions which may affect patient, staff or visitor safety and comfort will be reduced.

Review: This policy will be reviewed in three years or sooner if current treatment recommendations change
Responsibilities for review of this document: Consultant Anaesthetist, Acute Pain Service

Responsibilities for ensuring registration of this document on the NHS Grampian Information/Document Silo: Pharmacy and Medicines Directorate

Physical location of the original of this document: Anaesthetic Department, ARI

Job/group title of those who have control over this document: Acute Pain Service

Responsibilities for disseminating document as per distribution list: Consultant Anaesthetist, Lead Acute Pain Sector

Revision History:

<table>
<thead>
<tr>
<th>Revision Date</th>
<th>Previous Revision Date</th>
<th>Summary of Changes (Descriptive summary of the changes made)</th>
<th>Changes Marked* (Identify page numbers and section heading)</th>
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<tbody>
<tr>
<td>May 2018</td>
<td>July 2016</td>
<td>Changed to 12 hourly PCA consumption.</td>
<td>Section 2 and 3</td>
</tr>
<tr>
<td>May 2018</td>
<td>July 2016</td>
<td>Recognition that younger patients may require higher dosage.</td>
<td>Section 2 and 3</td>
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<tr>
<td>May 2018</td>
<td>July 2016</td>
<td>Addition of qualification of normal renal function.</td>
<td>Section 2 and 3</td>
</tr>
<tr>
<td>August 2018</td>
<td>July 2016</td>
<td>Maximum dosage in 24 hours added.</td>
<td>Section 2</td>
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* Changes marked should detail the section(s) of the document that have been amended, i.e. page number and section heading.
NHS Grampian Protocol For The Prescribing And Administration Of Oral Opioids Following Trauma Or Surgery

1. Purpose And Scope

Patients with severe pain following trauma or surgery should be considered for oral morphine sulphate as the first line analgesic treatment.

Oral oxycodone (Longtec® Modified Release Tablets) should only be used as an alternative to Morphine Sulphate Modified Release (MST Continus®) if the patient is intolerant of morphine. Morphine intolerance can be defined as any adverse effects from taking morphine, such as nausea, vomiting, itching or hallucinations.

The purpose of this document is to provide the background and outline the procedure to be followed.

2. Background

It was thought by some that, even if pain was not good for the patient at least it did no harm. It is now recognised that severe acute pain can have a number of harmful physiological and psychological side effects.\(^1\)

The pathophysiological consequences of acute pain involve adverse effects on multiple organ systems, while the psychological effects of acute pain may be less obvious. Pain after surgery can have a major influence on psychological function, which could lead to increased pain perception. Unrelieved pain can lead to increased anxiety, insomnia, and give rise to complications such as chest infections and deep vein thrombosis. Pain assessment should be made regularly, especially in those patients unable to communicate effectively.

Anaesthetists might use oxycodone in theatre as the main opioid, either because the patient is intolerant of morphine or because patients wake up more quickly after oxycodone, compared to morphine following theatre. Consideration can be given to using morphine post operatively if the patient is not intolerant of morphine, in terms of cost reduction and the fact that oxycodone is potentially more addictive than morphine.
Patients under 70 years of age, tolerant of morphine with normal renal function

(i) Morphine Sulphate Modified Release (MST Continus®) 20 mgs is administered every 12 hours and is prescribed for administration at 0800 and 2000 (maximum recommended dose 80 mgs/24 hours.) It is available in modified release tablet form or modified release sachets. Morphine Sulphate Modified Release Tablets (MST Continus®) must be swallowed whole. Sachets may be preferred by a patient if tablets are difficult to swallow.

And

(ii) Oral morphine sulphate solution (10mg/5mL) 10mg hourly as required for pain (maximum recommended dose 120 mgs/24 hours).

If patient is using Patient Controlled Analgesia (PCA) consider stopping the PCA the morning after surgery if the patient can tolerate oral medication. If the patient has used more than 15mg/12 hours of intravenous morphine, commence oral morphine as above.

Review oral morphine prescription at least every 24 hours. If the patient has required 2 or less breakthrough doses of oral morphine, the background morphine sulphate modified release dose can be reduced by 50%, or patient changed to alternative analgesia, such as dihydrocodeine or tramadol.

Consideration must be given to the relative potency of dihydrocodeine and tramadol.

- Dihydrocodeine dose 60mg = approximately 5mg oral morphine.
- Tramadol dose 50mg = approximately 5 - 10mg oral morphine.

Consider concomitant use of simple analgesics, e.g. paracetamol, NSAIDs.

For patients:

(i) On opioids pre-operatively.
(ii) Who have undergone total knee replacement surgery.
(iii) Who are in a younger age bracket, i.e. 18 – 60 years
(iv) Whose parenteral morphine consumption in last 12 hours is greater than 20mg.

Consider:

(i) Morphine Sulphate Modified Release Tablets (MST Continus®) 30mg at 0800 hours and 2000 hours.

And

(ii) Oral morphine sulphate solution (10mg/5mL) 20mg hourly as required for breakthrough pain (maximum dose 200 mgs/ 24 hours).
These doses may have to be increased further in opioid tolerant patients, e.g. Intravenous Drug User (IVDU), or those on middle strength opioids at home, e.g. regular dihydrocodeine or cocodamol 30/500.

**Patients under 70 years of age, intolerant of morphine with normal renal function**

(i) Longtec® Modified Release Tablets 10 mgs (oxycodone modified release tablets) are administered every 12 hours and are prescribed for administration at 0800 and 2000 hours (maximum recommended dose 40mgs/24 hours). There are several brands of oxycodone MR, in order to minimise risks of inappropriate selection prescribing by brand name is preferable, i.e. Longtec® Modified Release Tablets (oxycodone MR).

And

(ii) Shortec® Capsules (oxycodone immediate release (IR) capsules) 5mg hourly as required for breakthrough pain (maximum dose 50 mgs/24 hours).

If the patient is using patient controlled analgesia (PCA), consider stopping the PCA the morning after surgery if the patient can tolerate oral medication. If they have used more than 15mg/12 hours of intravenous morphine or 10 oxycodone/12 hours then commence oral oxycodone as above.

Review oral oxycodone prescription at least every 24 hours. If the patient has required 2 or less breakthrough doses of oral Shortec® Capsules (oxycodone immediate release capsules), the background Longtec® Modified Release Tablets (oxycodone modified release tablets) dose can be reduced by 50%, or patient changed to alternative analgesia, such as tramadol or dihydrocodeine.

Consideration must be given to the relative potency of dihydrocodeine and tramadol.

- Dihydrocodeine dose 60mg = approximately 2.5mg oxycodone.
- Tramadol dose 50mg = approximately 2.5 - 5mg oral oxycodone.

Consider concomitant use of simple analgesics, e.g. paracetamol, NSAIDs.

For patients:

(i) Taking opioids pre-operatively.
(ii) Who have undergone total knee replacement surgery.
(iii) Who are in a younger age bracket, i.e.18-60
(iv) Whose parenteral oxycodone consumption in last 12 hours is greater than 10mg.

Consider:

(i) Longtec® Modified Release Tablets (oxycodone modified release tablets) 20mg at 0800 hours and 2000 hours.
And

(ii) Shortec® Capsules (oxycodone immediate release capsules) 10mg hourly as required for breakthrough pain (maximum dose 100 mgs/24 hours).

These doses may have to be increased further in opioid tolerant patients, e.g. IVDU.

Alternative prescription for those over 70 years old

Patients over the age of 70 are more sensitive to strong opioids and may suffer from excess sedation and respiratory depression. Regular paracetamol and oral morphine solution 5mgs or oxycodone 2mgs as required are options used to avoid long acting opioids. Oxycodone has been shown to reduce risk of falls in the elderly compared to morphine and is used in the Hip Fracture Repair Guideline. Alternative analgesics given on a regular basis such as dihydrocodeine 30mg every six hours or tramadol 50mg every six hours along with regular paracetamol every six hours should be considered but may be inadequate for severe pain.

Advice can be sought from the Acute Pain Service, or out of hours from the on call anaesthetist

The dose of paracetamol is 15 mgs/Kg up to a maximum dose of 1g every 6 hours. However, 1g should only be given where weight is >50g.

Both dihydrocodeine and tramadol can cause sedation and confusion in the elderly. Tramadol may be less constipating at lower doses than dihydrocodeine and lower doses can be used if adverse effects are problematic.

3. Monitoring

All patients receiving strong oral opioids must have pain, sedation and nausea scores and respiratory rate recorded and assessed at regular intervals. The Acute Pain Service or senior ward medical staff must be informed of any concerns.

The number of doses of rescue analgesia (oral morphine solution 10mg/5mL or Shortec® Capsules (oxycodone immediate release capsules)) must be reviewed at least daily and the dose of regular strong opioid adjusted as below:

<table>
<thead>
<tr>
<th>0 or 1 dose in last 24 hours</th>
<th>2 or 3 doses in last 24 hours</th>
<th>More than 4 doses in last 24 hours</th>
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<tbody>
<tr>
<td><em>Reduce</em> MST® Continus and Longtec® by 50%. Change to regular DHC/tramadol after 24 hours on reduced dose.</td>
<td><em>Continue</em> current regimen until using less breakthrough analgesia.</td>
<td><em>Increase</em> MST® Continus by 50% per dose or Longtec® by 50% per dose and consider increasing breakthrough dose.</td>
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Discharge Advice

Some patients may require these strong opioids for longer periods of time but should not be discharged home with them unless specified by senior medical staff or Acute Pain Service. Analgesia should be reviewed daily to avoid unnecessary discharge prescriptions. A reducing plan for the patient must be in place for discharge with any strength of opioid analgesic.

Patient information leaflets about strong opioids are available on all wards and should be sent home with the patient.

Consultative Group

Grampian Area Anaesthetic Senior Staff Committee
Grampian Acute Pain Service.

References


3) Medicines, Ethics and Practice: A guide for pharmacists and pharmacy technicians. RPSGB. Number 33 (July 2009).

4) Opioids Aware: A resource for patients and healthcare professionals to support prescribing of opioid medicines for pain. https://www.rcoa.ac.uk/faculty-of-pain-medicine

5) Hip Fracture Repair Guideline 2016, NHS Grampian