Opioids in palliative care

This guideline provides advice on the care of adults with advanced and progressive disease who require strong opioids for pain control, defined as those in severe pain who may be opioid-naïve, or those whose pain has been inadequately controlled by weak opioids such as codeine or tramadol (step 2 of the WHO pain ladder; Box 1).

The guideline does NOT cover:
- second-line treatment with strong opioids where a change in opioid treatment is required because of inadequate pain control or toxicity,
- pain control during the last days of life,
- palliative care in children.

Definitions of pain
- **Background pain** is chronic, persistent pain.
- **Breakthrough pain** is a transient increase in pain intensity over background pain, typically of rapid onset and generally self-limiting with an average duration of 30 minutes.

Treatment and management
- Strong opioids are:
  - the main treatment for pain related to advanced and progressive disease.
  - represented at step 3 of the WHO pain ladder: www.who.int/cancer/palliative/painladder/en (see Box 1)

Pharmacological treatment
- The opioids included in this guideline are:
  - buprenorphine, diamorphine, fentanyl, morphine and oxycodone.
- Routes of administration include:
  - **oral**: immediate-release or sustained-release opioids i.e. morphine or oxycodone,
  - **transdermal patches** i.e. fentanyl or buprenorphine,
  - **subcutaneous** i.e. morphine, diamorphine.
- Choose an opioid on an individual basis for each patient.
- Treatment with opioids involves three stages:
  - initial dose titration,
  - maintenance treatment,
  - management of breakthrough pain.

Initial dose titration
**First-line**: use an oral preparation if suitable. Give:
- **regular** oral sustained-release or immediate-release morphine (depending on patient preference), **AND** rescue doses of oral immediate-release morphine for breakthrough pain.
- For patients with no renal or hepatic comorbidities give:
  - a total initial daily dose of 20 to 30mg of oral morphine e.g. 10 to 15mg sustained-release morphine twice daily, **AND**
  - 5mg oral immediate-release morphine for rescue doses during the titration phase.
- Adjust the dose to balance pain control and adverse effects. Seek specialist advice if this balance is not reached after a few dose adjustments.
- When the optimal balance of pain control and adverse effects has been achieved prescribe maintenance treatment.
- Seek specialist advice before prescribing strong opioids for patients with moderate to severe renal or hepatic impairment.

Maintenance treatment
**First-line**: give oral sustained-release morphine.
- **DO NOT** give transdermal patch formulations as first-line maintenance treatment if oral opioids are suitable.
- Seek specialist advice before prescribing strong opioids for patients with moderate to severe renal or hepatic impairment.

Management of breakthrough pain
**First-line**: give oral immediate-release morphine as rescue medication for breakthrough pain in patients on maintenance oral morphine.
- **DO NOT** offer fast-acting fentanyl as first-line rescue medication.
- If pain remains inadequately controlled despite optimising treatment:
  - seek specialist advice.

Box 1. WHO pain ladder
Opioids in palliative care continued……

NICE CG140, 2012

Treatment if oral opioids are NOT suitable
◆ Oral opioids may be unsuitable for:
  ➢ people with swallowing difficulties,
  ➢ when oral absorption is impaired,
  ➢ when pain is unstable.
◆ If oral opioids are not suitable consider initiating:
  ➢ transdermal patches if analgesic requirements are stable.
  ➢ subcutaneous opioids if analgesic requirements are unstable.
◆ Seek specialist advice where needed.
◆ Choose a preparation with the lowest acquisition cost.

Prescribing
Transdermal patches
◆ Use caution when calculating opioid equivalence for transdermal patches §.
◆ Opioid equivalence for transdermal patches:
  ➢ a fentanyl 12 microgram patch equates to approximately 45mg oral morphine daily.
  ➢ a buprenorphine 20 microgram patch equates to approximately 30mg oral morphine daily.
§ Editorial note: opioid conversion charts are approximate and may differ. They should only be used as a guide. The BNF provides further information on dose equivalence.

Transdermal patches – further information**
Factors affecting absorption
◆ Fever or external heat:
  ➢ monitor patients using patches for increased adverse effects if they have a fever as increased absorption is possible,
  ➢ avoid exposing application site to external heat, e.g. a hot bath or sauna as this may increase absorption.
Fentanyl transdermal patches**
◆ Are available as three day (72 hour) patches.
Buprenorphine transdermal patches**
◆ Are available as four day (96 hour) and seven day patches.
◆ Due to the long duration of action:
  ➢ other opioids should not be administered within 24 hours of patch removal,
  ➢ patients with severe adverse effects should be monitored for up to 30 hours after removing the patch.

Counselling
◆ When starting treatment with strong opioids discuss any concerns about:
  ➢ addiction,
  ➢ tolerance,
  ➢ adverse effects,
  ➢ fears that treatment implies the final stages of life.
◆ Reassure patients that addiction is very rare and that tolerance does not significantly affect pain management or result in the need for escalating doses.
◆ Give verbal and written information to patients and carers on strong opioid treatment. Include the following:
  ➢ when and why strong opioids are used to treat pain,
  ➢ how effective they are likely to be,
  ➢ when and how often to take strong opioids and how long pain relief should last,
  ➢ adverse effects and signs of toxicity,
  ➢ safe storage.
◆ Give information on out of hours contact, follow-up and further prescribing.
◆ Offer access to frequent review.

Management of adverse effects
Constipation
◆ Constipation affects nearly all patients receiving strong opioid treatment.
◆ Prescribe regular laxative treatment at an effective dose to all patients who take strong opioids.
◆ Tell patients that treatment for constipation takes time to work and adherence is important.
◆ Give laxative treatment at optimal doses before considering switching strong opioids.
Nausea
◆ Transient nausea may occur when starting strong opioid treatment or when the dose is increased.
◆ If nausea persists, give optimal anti-emetic treatment before considering switching strong opioids.
Drowsiness
◆ Transient mild drowsiness or impaired concentration may occur when opioid treatment is started or when the dose is increased.
◆ Warn patients that impaired concentration may affect their ability to drive* and undertake other manual tasks.
◆ In patients with either persistent or moderate to severe central nervous system side effects consider:
  ➢ dose reduction if pain is controlled, OR
  ➢ switching opioids if pain is not controlled.
◆ If adverse effects remain uncontrolled despite optimising treatment:
  ➢ seek specialist advice.

*The DVLA has guidance on the current medical standards of fitness to drive www.dft.gov.uk/dvla/medical/ataglance.aspx
**See Summary of Product Characteristics for full prescribing information.

Do NOT:
◆ offer fast-acting fentanyl as first-line rescue medication.
◆ give transdermal patch formulations as first-line maintenance treatment if oral opioids are suitable.

Supporting documents
NICE has developed implementation tools and resources to support this guidance: http://guidance.nice.org.uk/CG140
A booklet for patients and carers is available: Opioids in palliative care: understanding NICE guidance.
Visit the NICE Pathway: Opioids in palliative care

Additional resources

UKMi Medicines Q&A: What are the equivalent doses of oral morphine to other oral opioids when used as analgesics in adults in palliative care?

National Patient Safety Agency:
Reducing dosing errors with opioid medicines
Promoting safer use of injectable medicines

This bulletin summarises key prescribing points from NICE guidance. Please refer to the full guidance at www.nice.org.uk for further detail.
This is an NHS document not to be used for commercial purposes.