Countess of Chester Hospital
NHS Foundation Trust

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

Palliative care team, Countess of Chester NHS Hospital 01244 366086 (9am to 5pm)

24/7 PALLIATIVE CARE ADVICE LINE FOR HEALTH PROFESSIONALS based at Hospice of the Good Shepherd, Chester: 01244 852520

Acknowledgement to Halton, St Helens and Knowsley palliative care teams for permission to adapt their guidelines

Resources

Cheshire and Merseyside Palliative & End of Life Care Strategic Clinical Network Standards and Guidelines `Symptom control medication & the dying person (Oct 2015);
North West Coast Strategic Clinical Networks `Clinical Practice Summary for Palliative Care Symptoms`(March 2017)
Palliative Care Formulary 6th Ed (2018) Palliativedrugs.com Ltd

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

PAIN MANAGEMENT

Person established taking oral morphine or opioid naive.

Important; it is the responsibility of the prescriber to ensure that guidelines are followed when prescribing opioids. Every member of the team has a responsibility to check that the intended dose is safe for the individual person. Knowledge of previous opioid dose is essential for the safe use of these products. Advice should be sought if prescribing outside of these guidelines or when the limits of own expertise are reached (NPSA/2008/RRR05)

CONTACT THE PALLIATIVE CARE TEAM FOR ADVICE IF:

- The person has moderate to severe renal failure (ie if eGFR < 30mls/minute).
- The person has new severe pain or pain that has persisted after 24 hours on a syringe driver.

PERSON IS TAKING ORAL MORPHINE

YES

Continue with **oral MORPHINE** if tolerated **OR** if not tolerated:

- Convert total daily dose of **oral MORPHINE** to subcutaneous route by dividing by 2 and prescribe this dose subcutaneously via a syringe driver over 24 hours (see example (a) below).
- Prescribe a **breakthrough** pain dose of **MORPHINE** that is 1/6th of the calculated total **MORPHINE** dose IN SYRINGE DRIVER, SC 2 - 4 hourly PRN (see example (b) below).
- Reassess after 24 hours.

- If person has required additional **MORPHINE** for breakthrough pain calculate dose required in syringe driver for next 24 hours by:
  Adding total breakthrough doses in previous 24 hours to current syringe driver dose to give new 24 hour dose
  NOTE: the new syringe driver dose **MUST NOT** be increased by more than 50% of previous 24 hours morphine dose
- Ensure breakthrough dose remains at 1/6th of syringe driver dose.
  Maximum dose of **MORPHINE** in syringe driver is 180mg and maximum breakthrough dose is 30mg (due to volume capacity)

NO

Person has pain

YES

- If oral route tolerated give **MORPHIINE** 5mg
  OR
- Prescribe and give **MORPHINE** 2.5 mg to 5mg SC STAT
- Prescribe **MORPHINE** 10 mg via syringe driver over 24 hours
- Prescribe **MORPHINE** 2.5 to 5 mg SC 2 - 4 hourly PRN for breakthrough pain.
- Reassess after 24 hours

NO

Prescribe in anticipation of symptom
MORPHINE
2.5 mg to 5 mg SC 2 - 4 hourly PRN

KEY
SC = Subcutaneous
PRN = as required

Example (a) syringe driver dose
Converting from oral MORPHINE to syringe driver
E.g. **ZOMORPH®** 60 mg 12 hourly = 120 mg
120mg/2 = 60 mg
Dose of **MORPHINE** subcutaneously via syringe driver over 24 hours = 60 mg

Example (b) calculating breakthrough dose
The breakthrough dose is 1/6th of total daily morphine dose
E.g. Person requires 60 mg m**orphine** via syringe driver over 24 hours
60/6 = 10 mg **MORPHINE** SC PRN

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

PAIN MANAGEMENT
Persons established using fentanyl patches

Important; it is the responsibility of the prescriber to ensure that guidelines are followed when prescribing opioids. Every member of the team has a responsibility to check that the intended dose is safe for the individual person. Knowledge of previous opioid dose is essential for the safe use of these products. Advice should be sought if prescribing outside of these guidelines or when the limits of own expertise are reached (NPSA/2008/RRR05)

- **DO NOT COMMENCE** FENTANYL PATCHES FOR PAIN RELIEF IN THE DYING PHASE.
- If the person has **severe** renal dysfunction and requires additional pain relief seek advice on prescribing from the palliative care team.

FENTANYL ESTABLISHED

DO NOT remove **FENTANYL patch.** Continue and re-apply every 72 hours.

PAIN PRESENT

- Prescribe adequate dose of breakthrough opioid analgesia as table below.
- Re-assess after 24 hours
- If 2 or more doses of breakthrough opioid are required in 24 hours commence syringe driver. Prescribe up to **50%** of the total amount of breakthrough given in previous 24hrs via syringe driver **in addition** to **FENTANYL** patch.

PAIN CONTROLLED
Prescribe opioid for breakthrough pain as needed.
See table below.

OBTAIN SPECIALIST PALLIATVE CARE ADVICE REGARDING CALCULATING SUBSEQUENT PRN DOSE OF OPIOID S/C ONCE OPIOID IS REQUIRED IN SYRINGE DRIVER.

Fentanyl patch strength	Up to 4 hourly **MORPHINE** SC PRN	Up to 4 hourly **OXYCODONE** SC PRN
12 micrograms per hour	2.5 mg	1.25mg to 2.5mg
25 micrograms per hour	5 mg	2.5 mg
50 micrograms per hour	10 mg	5 mg
75 micrograms per hour	20 mg	10 mg

When calculated syringe driver doses of morphine exceed 180mg; or morphine breakthrough doses exceed 30mg, diamorphine will need to be considered. Contact specialist palliative care team for advice.

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

PAIN MANAGEMENT
For people established taking oral oxycodone

Important It is the responsibility of the prescriber to ensure that guidelines are followed when prescribing opioids. Every member of the team has a responsibility to check that the intended dose is safe for the individual person. Knowledge of previous opioid dose is essential for the safe use of these products. Advice should be sought if prescribing outside of these guidelines or when the limits of own expertise are reached (NPSA/2008/RRR05)

- BOTH 3:2 AND 2:1 CONVERSIONS FROM ORAL OXYCODONE TO THE SUBCUTANEOUS ROUTE ARE USED.
- IN THE DYING PHASE USE 3:2 AS BELOW

CONVERT ORAL OXYCODONE TO SUBCUTANEOUS ROUTE AS BELOW

- **CALCULATE DOSE REQUIRED OVER 24 HOURS IN SYRINGE DRIVER: SYRINGE DRIVER DOSE = 2/3RD OF ORAL DAILY DOSE.**

  E.g. **OXYCONTIN®** 45 mg 12 hourly = 90 mg in 24 hours
  2/3rd of 90 mg = 60 mg
  Dose required in syringe driver = 60 mg

- **CALCULATE DOSE OF OXYCODONE REQUIRED FOR RELIEF OF BREAKTHROUGH PAIN.**
  BREAKTHROUGH DOSE = 1/6TH DOSE IN SYRINGE DRIVER.

  E.g. **OXYCODONE** 60 mg/24 hours in syringe driver = 10 mg **OXYCODONE** SC 2 - 4 hourly PRN

- **RE-ASSESS AFTER 24HRS –** if person has required breakthrough analgesia calculate total amount given in previous 24 hours and increase dose in syringe driver by up to **50%** of this amount.

- **ENSURE THAT BREAKTHROUGH DOSE REMAINS 1/6th of DOSE IN SYRINGE DRIVER**

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

NAUSEA & VOMITING – for people without heart failure

PRESENT

Not taking anti-emetics

Prescribe **CYCLIZINE** 50mg SC stat dose and commence 150 mg via syringe driver over 24 hours

If symptoms persist **ADD HALOPERIDOL** 1.5 mg to 5 mg SC via syringe driver over 24 hours

Ondansetron is an alternative antiemetic that can be given sc as well as orally but can cause constipation. Can be considered in Lewy body dementia (see below)

Established on anti-emetics – review cause, route (eg consider converting to equivalent dose to be administered parenterally), dose

If still nauseated seek advice on contact numbers on front sheet as appropriate

ABSENT

Prescribe in anticipation of symptom
CYCLIZINE 50 mg SC
8 hourly PRN

HEART FAILURE: (reference - Cheshire and Merseyside Clinical Network: Guidelines for symptom control for adults with end-stage heart failure January 2014)

CYCLIZINE IS NOT RECOMMENDED IN PEOPLE WITH HEART FAILURE (unless very short prognosis)
METOCLOPRAMIDE 10mg SC PRN plus initial dose of 30mg via syringe driver over 24 hours is first line (contra-indicated in gastro-intestinal obstruction; avoid or use with extreme caution in abdominal colic)

If chemical causes of nausea and vomiting e.g. renal failure or medication
HALOPERIDOL 0.5mg to 3mg SC PRN plus 1.5mg to 5mg via syringe driver over 24 hours, maximum 10mg / 24hours OR **LEVOMEPROMAZINE** 6.25mg SC 8 hourly PRN plus 6.25 mg to 12.5mg to 25 mg via a syringe driver over 24 hrs

LEWY BODY DEMENTIA
For people with Lewy Body dementia **AVOID** haloperidol, levomepromazine and metoclopramide.
Consider **ONDANSETRON** at dose of 4mg po/sc or in syringe driver at dose of 8 – 16mg over 24hours.

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

TERMINAL RESTLESSNESS & AGITATION

The intention of sedation in palliative care is to relieve distress – unconsciousness may occur but is not a desired outcome (refer to NPSA/2008/RRR011)

PRESENT

Common reversible causes of agitation include **urinary retention, constipation, nicotine withdrawal, opioid toxicity & environmental factors.** All should be excluded.

- Prescribe M**IDAZOLAM** 2.5 mg to 5 mg SC PRN until syringe driver commenced. If 2.5 mg ineffective after 30 minutes, give a further 5 mg (total 7.5 mg in 1 hour). If person remains agitated seek medical review and contact Specialist Palliative Care Team for advice.
- If agitation likely to persist commence **MIDAZOLAM** 10 mg to 20 mg SC via syringe driver over 24 hours.
- In addition prescribe **MIDAZOLAM** 2.5 mg to 5 mg SC 2 - 4 hourly PRN.
- If eGFR < 30ml/min give reduced dose of **MIDAZOLAM** eg 1 – 2.5mg SC 2 – 4 hourly PRN
- If delirious consider **HALOPERIDOL** 0.5mg SC 2 - 4hourly PRN (monitor for extrapyramidal side effects. If needed in a syringe driver dose 2.5 – 8mg over 24hours

To calculate the subsequent subcutaneous dose of **MIDAZOLAM** over 24 hours:

- Calculate and add total dose of **MIDAZOLAM** given on a PRN basis over previous 24 hours to current 24 hour dose via syringe driver.
- Increase the dose of **MIDAZOLAM** accordingly up to **30 mg** in **syringe driver** over 24 hours.
- Continue with PRN **MIDAZOLAM** – calculate dose as 1/6th of syringe driver dose.

If MIDAZOLAM 30 mg in syringe driver is reached and symptoms are not controlled, please seek advice.

ABSENT

Prescribe in anticipation of symptom **MIDAZOLAM** 2.5 mg to 5 mg SC up to 2 - 4 hourly PRN. **Maximum 30 mg in 24 hours**

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

RESPIRATORY TRACT SECRETIONS

Patient can't clear secretions from their upper respiratory tract properly causing secretions to move as they breath

Explanation of these symptoms to those important to the dying person and non-pharmacological measures eg repositioning patient are an important part of the management plan

It is important to start treatment as soon as symptoms occur

PRESENT

- **EITHER: GLYCOPYRRONIUM** 200 micrograms 6 hourly SC PRN **OR HYOSCINE HYDROBROMIDE** 400 micrograms SC PRN and
- Commence syringe driver containing **EITHER GLYCOPYRRONIUM** 600 to 1200 to 2400 micrograms over 24 hours **OR**
- **HYOSCINE HYDROBROMIDE** 1.2 to 2.4 mg over 24 hours micrograms over 24 hours.
- These are maximum doses. There is no benefit from additional PRN doses.

Anticholinergic side effects can arise, treat with frequent mouth care.

If one anticholinergic agent does not work try switching to the other after full titration to maximum dose over 24 hours. If there is still no improvement consider stopping the medication.

If not responding seek specialist advice as required

ABSENT

Prescribe **GLYCOPYRRONIUM** 200 micrograms SC 4 hourly PRN (Maximum 2400 micrograms in 24 hours) OR **HYOSCINE HYDROBROMIDE** 400 micrograms SC 4 hourly PRN

Prescribing in anticipation of this common symptom may prevent delay in commencing treatment.

PRESCRIBING GUIDELINES FOR SYMPTOM MANAGEMENT IN THE LAST FEW DAYS AND HOURS OF LIFE

BREATHLESSNESS

DISTRESSING BREATHLESSNESS

YES

- Prescribe **MORPHINE** 1.25 mg to 2.5 mg SC 2 - 4 hourly PRN and **MIDAZOLAM** 2.5 mg SC 2 - 4 hourly PRN

- **<u>State on medicine chart/authorisation to administer chart that indication is breathlessness</u>**

Or if breathlessness is constant:

- **MORPHINE** 5 mg to 10 mg via syringe driver over 24 hours (if previously taking oral opioid for breathlessness convert previous oral opioids dose - see pain algorithm)
  and
  MIDAZOLAM 5 mg to 10 mg via syringe driver over 24 hours.

- If dying person allergic or intolerant of morphine or if eGFR <30mls/min an alternative strong opioid should be prescribed
  Eg **OXYCODONE** 1 to 3mg SC up to 2 – 4 hourly PRN

NO

Prescribe PRN opioids & anxiolytic in anticipation of symptom:

MORPHINE 1.25 – 2.5mg SC 2 - 4 hourly PRN
and
MIDAZOLAM 2.5 mg SC 2 - 4 hourly PRN