Coronavirus (COVID-19)
Management of COVID-19 positive patients living in residential aged care facilities (RACFs):

Important points:

- When a resident returns a positive result (Day 0 = day first swab positive OR date of onset clinical illness, whichever is earlier), GP should undertake telehealth (preferred initial mode of contact) or face-to-face review (use full PPE/valveless N95 mask/ face shield) to assess disease severity and inter-current illness.
- Most patients with COVID-19 will initially be well.
- Deterioration often occurs during the 2nd week (commonly day 5-10) and takes the form of progressive respiratory failure. If borderline hypoxia at baseline assessment, then deterioration may occur earlier.
- All patients with COVID-19 need a clear management plan and a plan for deterioration.
- Patients may also have non COVID-19 illness (e.g. UTI, cellulitis, constipation, falls, stroke etc.).
- It is vital that the GP comes to a collaborative agreement on ‘goals of care’ (GOC) with the patient and their medical treatment decision maker (MTDM). If the GP is unsure about recommendations for GOC, or would like assistance with a difficult situation, please contact MATS for geriatrician advice. The majority of patients from RACFs will not be admitted to ICU even if GOC document specifies GOC A or B. Hi-flow nasal oxygen is not suitable for all patients. A patient who would not tolerate simple nasal prong oxygen will not be suitable for hi-flow nasal oxygen.

Disease severity

Mild:
- No symptoms OR mild upper respiratory tract symptoms OR cough without new shortness of breath.
- Oxygen saturations (O2 sats) > 92% on room air AND respiratory rate (RR) < 24.

Moderate to severe:
- O2 sats ≤ 92% on room air (or ≤ 90% with chronic lung disease) AND/OR respiratory rate ≥ 24.
Management of COVID-19 positive patients living in residential aged care facilities (RACFs):

Goal of care categories for community patients

A: For cardio-pulmonary resuscitation (CPR), for hospitalisation if necessary.

B: Not for CPR, for hospitalisation if necessary and potential candidate for higher level of respiratory support.

C: Not for CPR, for active medical management at RACF by GP +/- MATS. Also, focus on symptomatic treatment. If further deterioration, shift goals towards symptom control. Consider referral to palliative care service.

D: Terminal phase of illness, treatment is purely focused on symptom control

Management of patients with goals of care A or B:

- Only mild disease should be managed at RACF.
- Monitor Respiratory Rate (RR) and O2 saturations QID.
- DO NOT START DEXAMETHASONE for mild disease.
- If RR ≥ 24 or O2 saturations ≤92% (or ≤90% with chronic lung disease), transfer to hospital.
- If oral intake sufficiently low, carefully consider subcutaneous (SC) fluids +/- reduce or withhold diuretics. Caution against fluid overload, which can precipitate respiratory distress and hypoxia.
- Consider oral antibiotics if concurrent mild CAP pneumonia suspected.
Management of patients with goal of care C continued.

1. Dexamethasone:
   - Evidence of **improved outcomes only for subgroup of patients that require oxygen support**.
   - Evidence of trend to harm for subgroup of patients who do not require oxygen support.
   - Daily dose (ideally mane) 6mg orally for (up to) 10 days. Main side effects: hyperglycaemia and mood changes. If patient is unable to take oral medications, reconsider GOC. Call MATS if you would like to consider injectable dexamethasone.
   - If the patient is not yet hypoxic, dexamethasone can be **PRE-PRESCRIBED on the PRN chart** and should be dispensed and ready to administer if hypoxia develops.
   - Consider additional causes of hypoxia e.g. CCF/COPD or underlying respiratory disease.
   - **All patients on dexamethasone require QID blood sugar monitoring for at least 48 hours**.
   - QID times are before breakfast, before lunch, before dinner, and before bed.
   - **All patients starting dexamethasone should have PRN Novorapid sliding scale charted**:

     | BSL       | Dose units |
     |-----------|------------|
     | ≤12       | 0          |
     | 12.1-16   | 4 (6*)     |
     | 16.1–20: 6| 6 (8*)     |
     | >20       | 8 (10*)    |

   - If baseline insulin dose >40 units
     * if all BSL in first 48 hours <12 can reduce to BD BSLs.
     * After the second BSL of greater than 12, start giving insulin as per sliding scale.
     * If there is regular use of PRN insulin, consider starting mixed insulin mane if oral intake is reliable.

2. DVT/PE prophylaxis with Clexane
   - Consider Clexane in patients with ‘moderate-severe’ disease if not on anticoagulation (dose 40mg, or 20mg if eGFR <30ml/min)

3. Antibiotics
   - Mild disease: only use oral antibiotics if concurrent mild CAP
   - Moderate to severe disease: recommend giving antibiotics, prescriber to consider oral vs IM
   - If using IM ceftriaxone, dose 1g, reconstitute with 3.5ml lidocaine 1%; deep injection into gluteal muscle

4. End of life care medications
   - All patients receiving ‘trial of active management’ who are Goal Of Care C should be charted for, and have dispensed, PRN subcutaneous End of Life Care (EOLC) medications (e.g. morphine 2.5-5mg Q1H, midazolam 2.5-5mg Q1H, haloperidol 0.5-1mg TDS [for nausea or second line agitation], and glycopyrrolate 200mcg Q4H) – refer to Appendix 1.
Management of COVID-19 positive patients living in residential aged care facilities (RACFs):

Management of patients with goal of care D:

A focus purely on symptom control may be appropriate when:

- Next of kin (NOK) would prefer to immediately focus on comfort rather than try active management;
- Patient on ‘trial of active management’ is deteriorating and in need of regular PRN medications for symptom control;
- Patient not tolerating ‘trial of active treatment’, e.g. unable to keep oxygen on, refusing BSLs.

Prescribe End of Life Care medications (as above) - see Appendix 1.

Consider oxygen (if tolerated and providing symptomatic benefit).

For advice or support, contact Alfred MATS, Alfred PATS (palliative care in reach, see contact details on first page) or local community palliative care service.

Disease modifying treatments

**Hydroxychloroquine/zinc:**
There is no robust scientific evidence. We do not recommend use.

**Remdesivir:**
Advanced age, limitations of activities of daily living and intercurrent illness likely to lead to the death of a patient within 12 months are relative contraindications. MATS cannot obtain and use Remdesivir.

**Convalescent plasma therapy:**
This is not in routine clinical use at Alfred Health.

This advice provided by Alfred Health is as per current treatment guidelines. Advice may change as the treatment of COVID-19 evolves and we will provide updates as required.
**Coronavirus (COVID-19)**

Management of COVID-19 positive patients living in residential aged care facilities (RACFs):

Appendix 1: Symptom management for adult patients with COVID-19 receiving end-of-life supportive care outside the ICU.
Adapted from BC Centre for Palliative Care Guidelines* (http://bit.ly/BCCentreSymptomManagementGuidelines)

**GOALS OF CARE should be clarified and documented for ALL patients**
These recommendations are consistent with: not for CPR, not for intubation and not for ICU

<table>
<thead>
<tr>
<th>PAIN / DYSPNOEA</th>
<th>NAUSEA / VOMITING</th>
<th>AGITATION / RESTLESSNESS</th>
<th>RESPIRATORY SECRECTIONS / CONGESTION</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>OPIOIDS</strong> are effective for the relief of pain, as well as dyspnoea and cough</td>
<td><strong>OPIOID NAÏVE</strong> Begin at low end of range for frail/elderly</td>
<td><strong>AGITATION</strong></td>
<td>Reassure and explain not usually uncomfortable for the patient, just noisy due to patient weakness / inability to clear secretions.</td>
</tr>
<tr>
<td><strong>MORPHINE</strong> 2.5 – 5 mg subcut 1hrly PRN, if ≥ 4 doses in 24hrs see below</td>
<td><strong>METOCLOPRAMIDE</strong> 10mg subcut 4hrly PRN</td>
<td><strong>RESPIRATORY SECRECTIONS</strong></td>
<td>Consider:</td>
</tr>
<tr>
<td>Starting CSCI dose: 10mg / 24 hrs</td>
<td><strong>HALOPERIDOL</strong> 0.5 – 1 mg subcut 4hrly PRN</td>
<td><strong>CONGESTION</strong></td>
<td><strong>GLYCOPYRROLATE</strong> (not available on PBS, difficult to access in community; source through hospital pharmacy)</td>
</tr>
<tr>
<td>IF eGFR &lt; 30 ml/min <strong>HYDROMORPHONE</strong> 0.5 – 1 mg subcut 1hrly PRN, if ≥ 4 doses in 24hrs see below</td>
<td><strong>OR</strong> if contraindication to dopamine antagonists</td>
<td><strong>SECRETIONS</strong></td>
<td>200 – 400mcg subcut 4hrly PRN max 1200mcg/24hrs</td>
</tr>
<tr>
<td>Starting CSCI dose: 2mg / 24 hrs</td>
<td><strong>CYCLIZINE</strong> (not available on PBS, difficult to access in community; source through hospital pharmacy)</td>
<td><strong>IF SEVERE</strong></td>
<td><strong>HYOSCINE BUTYLBROMIDE</strong> (PBS streamline for use in palliative care: 6207)</td>
</tr>
<tr>
<td></td>
<td>(25 – 50mg subcut TDS PRN max 200mg/24hrs)</td>
<td><strong>Monitor patient to promote drainage of secretions.</strong></td>
<td>20mg subcut 4hrly PRN max 1200mcg/24hrs</td>
</tr>
<tr>
<td><strong>TITRATE UP AS NEEDED</strong> If using ≥ 4 doses in 24hrs, consider regular 4hrly/6hrly dosing or CSCI <em>and</em> continue a PRN dose</td>
<td><strong>HYOSCINE BUTYLBROMIDE</strong> (PBS streamline for use in palliative care: 6207)</td>
<td><strong>IF SEVERE</strong></td>
<td>20mg subcut 2hrly PRN &amp; monitor response</td>
</tr>
<tr>
<td><strong>ALREADY TAKING OPIOIDS</strong> Continue previous opioid, consider increasing by 25% &amp; consider conversion to CSCI</td>
<td><strong>CLOZAPINE</strong></td>
<td><strong>RESPIRATORY SECRECTIONS</strong></td>
<td>Consider:</td>
</tr>
<tr>
<td>To manage breakthrough symptoms: Start opioid subcut 1hrly PRN at ~1/6th of total daily (24hr) opioid dose</td>
<td><strong>OR</strong></td>
<td><strong>CONGESTION</strong></td>
<td><strong>HYOSCINE BUTYLBROMIDE</strong> (PBS streamline for use in palliative care: 6207)</td>
</tr>
<tr>
<td><strong>FOR ADVICE</strong> e.g. refractory symptoms, severe renal/hepatic impairment, impending airway obstruction, existing oral morphine equivalent &gt; 100mg/24hrs :</td>
<td>0.5mg subling/subcut 1-2hrly PRN (for subling 0.5mg = 5 drops)</td>
<td><strong>IF SEVERE</strong></td>
<td>20mg subcut 2hrly PRN max 1200mcg/24hrs</td>
</tr>
<tr>
<td><strong>PLEASE CONTACT ALFRED HEALTH PALLIATIVE CARE SERVICE</strong></td>
<td><strong>HALOPERIDOL</strong> 0.5 - 1 mg subcut 2hrly PRN (max 5mg/24 hrs)</td>
<td><strong>RESPIRATORY SECRECTIONS</strong></td>
<td>Consider:</td>
</tr>
<tr>
<td>B/H: 0419 770 087 9-5 Mon-Fri</td>
<td></td>
<td><strong>CONGESTION</strong></td>
<td><strong>HYOSCINE BUTYLBROMIDE</strong> (PBS streamline for use in palliative care: 6207)</td>
</tr>
<tr>
<td>A/H: via switch 9076 2000</td>
<td></td>
<td><strong>SECRETIONS</strong></td>
<td>20mg subcut 2hrly PRN max 1200mcg/24hrs</td>
</tr>
</tbody>
</table>

*These recommendations are for reference and do not supersede clinical judgement. We have attempted to decrease complexity to allow barrier-free use in multiple settings. Evidence supports that appropriate opioid doses do not hasten death in other conditions like advanced cancer or COPD; dosing should be re-assessed regularly. |

*Adapted by the Alfred Health Palliative Care Service. This document is provided “as is” to allow immediate use - it is continuing to evolve as we receive feedback. Thank you for your input and understanding. |

Version: 20.04.2020. Please provide feedback to pcenquiries@alfred.org.au

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