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Interim infection prevention and control guidelines for the management of COVID-19 in healthcare settings

Note: This is an interim guideline and is subject to change.

Knowledge about COVID-19 is evolving therefore Queensland Health will continue to review and update these guidelines as new information becomes available.

Highlighted sections in this guideline have changed since the last version.


Purpose

This guideline provides recommendations for infection prevention and control in managing patients with suspect, probable or confirmed COVID-19 in healthcare settings. These guidelines aim to prevent transmission of COVID-19 in healthcare settings through the implementation of appropriate infection prevention and control measures.

Scope

This guideline provides information for all Queensland Health Hospital and Health Service (HHS) employees (permanent, temporary and casual) and all organisations and individuals acting as its agents (including Visiting Medical Officers and other partners, contractors, consultants and volunteers).

Key points

- Ensure that travel history and history of contact with any suspect, probable or confirmed cases of COVID-19 are assessed early for any patients presenting with symptoms of respiratory illness and/or fever.
- Manage routine care of suspect, probable and confirmed cases of COVID-19 using droplet, contact and standard precautions.
- Use airborne, contact and standard precautions for suspect, probable and confirmed cases when providing care to:
  - patients with severe symptoms suggestive of pneumonia (e.g. fever and difficulty breathing)
  - patients with frequent, severe or productive coughing episodes
  - patients undergoing aerosol-generating procedures (AGPs)
  - clinically ill patients requiring high-level/high-volume hands-on contact outside of ICU
  - critically ill patients in ICU.
Background


Recognition of suspect and probable cases and immediate action

Early recognition and prompt implementation of appropriate infection prevention and control precautions is critical for preventing transmission of COVID-19.

Take steps to ensure that patients presenting with symptoms of respiratory infection are identified at triage and are directed to the fever clinic (where this is in place). For example:

- **place alert signage at the entrance to the healthcare campus with directions to the fever clinic**
- **place alert signage at the entrance to the emergency department redirecting patients presenting with symptoms of respiratory infection to the fever clinic or to immediately make themselves known to triage**
- **provide symptomatic patients with a surgical mask to wear**
- **ensure that relevant questions are asked at the point of triage regarding possible contact with suspect, probable or confirmed cases of COVID-19, recent travel history, and whether the person has been directed to self-quarantine or self-isolate**
- **ensure that patients presenting with respiratory symptoms do not share the same waiting area with other patients and are immediately placed in an isolation room if COVID-19 infection is suspected**
- **ensure patients are directed to perform hand hygiene on arrival and there is a means for them to do so, and ensure patients are directed to practice respiratory hygiene and cough etiquette.**

Case definition


Clinical and public health judgement should also be used to determine the need for testing in patients who do not meet the epidemiological or clinical criteria.
Immediate isolation and restriction of suspect, probable and confirmed cases

If a person is a suspect, probable or confirmed case of COVID-19, or is otherwise deemed by the attending clinician to possibly have COVID-19 infection, the following immediate infection control actions should be taken:

- **Provide a surgical mask for the patient** to put on, if they are not already wearing one.
- **At a minimum**, for routine care of suspect, probable or confirmed COVID-19 cases, use **standard, contact and droplet precautions**. Staff should wear a surgical mask, long-sleeved gown, gloves and eye protection. **Head covers and shoe covers are not required.** Immediately place the patient in a single room (ensuring air does not circulate to other areas) with the door closed.
- **Use standard, contact and airborne precautions** for suspect, probable or confirmed COVID-19 cases with the following:
  - patients with severe respiratory symptoms suggestive of pneumonia (e.g. fever and difficulty breathing)
  - patients with frequent, severe or productive coughing episodes
  - aerosol-generating procedures (AGPs)
  - care of clinically ill patients requiring high-level/high-volume hands-on contact outside of ICU
  - care of critically ill patients in ICU.
- **For standard, contact and airborne precautions** staff should wear a P2/N95 respirator, long-sleeved gown, gloves and eye protection. P2/N95 respirators must be fit checked every time they are put on. **Head covers and shoe covers are not required.**
- **Place the patient in a single room with negative pressure air handling if available, or a room from which air does not circulate to other areas.**
- **If transfer outside the room is essential**, the patient should wear a **surgical mask** during transfer and follow respiratory hygiene and cough etiquette. **If the patient is being administered oxygen, a surgical mask should be placed over the oxygen delivery device (ANZICS, 2020).**

Further investigation following recognition and isolation

**Laboratory testing for COVID-19**


Collection of respiratory specimens

- **The collection of nasopharyngeal or oropharyngeal swabs from patients with only mild symptoms of respiratory illness can be performed using standard, droplet and contact precautions.**
  - This includes placement of the patient in a single room with the door closed, and healthcare workers' use of personal protective equipment (PPE) including a surgical mask, long-sleeved gown, gloves and eye protection. Head covers and shoe covers are not required.

- **The collection of respiratory samples from patients with severe symptoms suggestive of pneumonia (e.g. fever and difficulty breathing) or frequent, severe or productive coughing episodes should be undertaken using standard, contact and airborne precautions.**
  - This includes placement of the patient in a single room with negative pressure air handling, if available, and healthcare workers' use of PPE that includes a P2/N95 respirator, long-sleeved gown, gloves and eye protection. **Head covers and shoe covers are not required.**
  - If a negative pressure room is not available, place the patient in a single room with the door closed.

- **Standard protocols should be used for sample packaging and transport. Specimens may be sent in pneumatic tubes**

Notification

Healthcare organisations must have mechanisms and policies in place to promptly alert key staff including infection control staff, infectious diseases physician (if applicable), hospital leadership, clinical laboratory staff, frontline staff and the Hospital and Health Service public health unit about suspect, probable or confirmed COVID-19 patients.

COVID-19 is a controlled notifiable condition. This means that it is mandatory for the public health unit to be immediately notified on provisional and clinical diagnosis, pathology request and pathological diagnosis.

Infection prevention and control management of suspect, probable and confirmed cases

Transmission-based precautions

All hospitalised patients meeting the case definition of suspect, probable or confirmed COVID-19 infection are managed in a single room under transmission-based precautions.

At a minimum, for the routine care of patients with suspect, probable or confirmed COVID-19, use **standard, droplet and contact precautions.**
For patients who are suspect, probable or confirmed cases of COVID-19 with severe symptoms suggestive of pneumonia (e.g. fever and difficulty breathing) or frequent, severe or productive coughing episodes use standard, contact and airborne precautions.

The rationale for a different level of transmission-based precautions for patients with severe symptoms is the higher likelihood of airborne particles propelled from the lower respiratory tract and the increased frequency and likelihood of respiratory interventions that may be aerosol generating.

**Personal protective equipment (PPE) and patient placement**

**Droplet and contact transmission-based precautions**

For droplet and contact transmission-based precautions, healthcare workers should wear PPE at all times while providing patient care. This includes:

- a surgical mask
- a long-sleeved gown
- gloves
- eye protection (face shield or goggles).

*Head covers and shoe covers are not required.*


For patients being managed under droplet and contact precautions, aerosol-generating procedures should be undertaken using airborne and contact precautions. Refer to the section on Aerosol-generating procedures.

**Airborne and contact transmission-based precautions (for patients with severe symptoms suggestive of pneumonia or with frequent, severe or productive coughing episodes)**

For airborne and contact transmission-based precautions, healthcare workers should wear PPE at all times while in the patient room. This includes:

- a fit checked P2/N95 respirator
- a long-sleeved gown
- gloves
- eye protection (face shield or goggles).

*Head covers and shoe covers are not required.*

These patients should be managed in a single room with negative pressure air handling. Refer to the Australian Guidelines for the Prevention and Control of Infection in Healthcare for more detailed advice about managing patients under airborne and contact precautions.
A fit check is required each time a P2/N95 respirator is put on to ensure it is applied properly. Healthcare workers must be informed about how to perform a fit check. No clinical activity should be undertaken until a satisfactory fit has been achieved. Fit checks ensure the respirator is sealed over the bridge of the nose and mouth and that there are no gaps between the respirator and face.

An adequate seal may be difficult to achieve for people with facial hair. The effectiveness of a tight-fitting facepiece, such as half-face or full-face respirators that use straps, relies on getting a good seal with the wearer’s face. If the respirator does not fit properly, the wearer will not get the expected level of protection. Facial hair that lies along the sealing surface of a tight-fitting respirator will stop it sealing properly. Therefore, any hair growth between the skin and the facepiece sealing surface must be removed in order to achieve a fit. Please discuss local issues regarding any staff that decline to remove their facial hair with your local Human Resources department.

Additional considerations for critically ill patients in ICU

Patients who require admission to ICU with severe COVID-19 infection are likely to have a high viral load, particularly in the lower respiratory tract. Standard, contact and airborne precautions (as above) are required for care of these patients.

The risk of aerosol transmission is reduced once the patient is intubated with a closed ventilator circuit. There is a potential, but currently unknown, risk of transmission from other body fluids such as diarrhoeal stool or vomitus or inadvertent circuit disconnection.

Although powered air-purifying respirators (PAPR) are above the recommended standard for PPE for the management of patients with COVID-19, if a healthcare professional is required to remain in the patient’s room continuously for a long period (e.g. more than one hour) because of the need to perform multiple procedures, the use of PAPR may be considered for additional comfort and visibility.

Removal of PAPR is associated with a risk of self-contamination, therefore, if a local decision is made to use PAPR, clear procedures and training for their fitting and removal should be made available to staff prior to use. Only PPE marked as reusable should be reused, following reprocessing according to manufacturer’s instructions.

Fitting and removing PPE

PPE is one of the key elements in preventing the spread of communicable diseases to healthcare workers. Compliance with processes for fitting (putting on) and removing PPE is critical to staff safety.

The following PPE principles should be adhered to:

- Healthcare workers must have received training and instruction on the fitting and removal process and must have practiced fitting and removal.
- Healthcare workers must be given sufficient time to fit and remove PPE correctly without disturbances.
- PPE must remain in place and be worn correctly for the duration of exposure to potentially contaminated areas. PPE, particularly masks, should not be adjusted during patient care.
- The removal of used PPE is a high-risk process that requires a structured and systematic procedure. PPE must be removed slowly and deliberately in the correct sequence to reduce
the possibility of self-contamination or other exposure to COVID-19. Therefore, healthcare organisations must ensure that a step-by-step process for removal of PPE is developed and documented.

- All personal items should be removed (e.g. jewellery, watches, lanyards, mobile phones, pagers, pens etc.) before fitting PPE. Hair should be tied back out of the face and eyes.

**Fitting**

The healthcare worker should fit their PPE in the following order:

- Long-sleeved gown (and plastic apron if required in line with standard precautions)
- P2/N95 respirator (perform a fit check)/surgical mask
- Eye protection (goggles or a face shield)
- Gloves which should be pulled over the cuffs of the gown.

**Removal**

PPE should be removed in the following order, once patient/medical care is completed:

- Remove gloves, being careful to avoid contaminating bare hands underneath
- Perform hand hygiene
- Remove gown, being careful to avoid contaminating their clothing underneath
- Perform hand hygiene
- Remove the goggles/face shield
- Perform hand hygiene
- Remove the P2/N95 respirator or surgical mask being careful not to touch the front of the respirator/mask
- Perform hand hygiene.

**IMPORTANT:** Only remove respirator/mask after exiting the patient room.

**Considerations on choice of PPE**


**Masks**

Australian Standard 4381:2015 *Single-use face masks for use in health care* (AS 4281:2015) sets out the requirements for single-use face masks which are used in healthcare. Face masks are categorised based on the level of protection: level 1 barrier, level 2 barrier and level 3 barrier.

AS 4281:2015 outlines the medical face mask material’s resistance to penetration by synthetic blood, bacterial filtration efficiency and differential pressure. Medical masks that are supplied in Australia for use in healthcare must meet the requirements as set out in AS 4281:2015.

In accordance with AS 4281:2015 the following applies:
• Level 1 barrier masks are suitable for general purpose medical procedures, where the wearer is not at risk of blood or body fluid splash or to protect staff and/or the patient from droplet exposure to microorganisms.
• Level 2 barrier masks are suitable for use in emergency departments, dentistry, changing dressings on small wounds or healing wounds where minimal blood droplet exposure may possibly occur.
• Level 3 barrier masks are suitable for all surgical procedures, major trauma first aid or in any area where the healthcare worker is at risk of blood or body fluid splash.

Level 1 barrier masks are of a suitable standard and quality for routine care activities for the care of patients with suspect, probable or confirmed COVID-19 being managed under standard, droplet and contact precautions.

As above, level 1 barrier masks should not routinely be used in emergency departments, or for dentistry, surgical procedures, changing dressings, or when exposure to splash of blood or body fluid is anticipated. As in all cases, healthcare workers should perform a risk assessment when preparing to provide care to the patient, anticipate whether a blood or body fluid splash is likely, and fit the required PPE accordingly.

Gowns

Gowns are also categorised based on the level of protection. The standards referring to fluid-resistant properties of gowns used in healthcare are the ANSI/AAMI PB70:2012, which provide standards for liquid barrier performance. There are levels 1 to 4 for gowns in this standard.

The purpose of a gown used for droplet, airborne and contact precautions is to prevent direct contact between the healthcare worker’s skin or clothing and the patient/care area, in order to prevent direct transfer of micro-organisms. As in all cases, healthcare workers should perform a risk assessment when preparing to provide care to the patient, anticipate whether a blood or body fluid splash is likely, and fit the required PPE accordingly. The choice of gown should be made based on the level of risk of contamination.

If the risk of blood or body fluid exposure is low or minimal, gowns that claim minimal or low levels of barrier protection (ANSI/AAMI PB70 Level 1 or 2) can be used.

If there is a medium to high risk of blood or body fluid exposure gowns that claim moderate to high barrier protection (ANSI/AAMI PB70 Level 3 or 4) can be used.

Additional recommendations

• Hand hygiene should be undertaken in accordance with the ‘5 moments for hand hygiene’.
• Gloves should be changed if they become torn or heavily contaminated, and hand hygiene should be performed.
• Gowns should be changed if they become soiled, and hand hygiene should be performed.
• If re-useable PPE is used, such as protective eyewear, these must be cleaned and disinfected prior to re-use. Staff must be trained in this process.

Patient placement options

The following patient placement options should be used in numerical order, according to facility resources:
1. Single room with ensuite facilities, negative pressure air handling and dedicated anteroom
   • Preferred where person requires airborne precautions (as noted above).
   • Patients should be placed in a single room, with a negative pressure air handling system and an anteroom, containing an unshared bathroom and be managed under standard and transmission-based contact and airborne precautions.
   • Fitting and removing of PPE is to be undertaken in the anteroom with a clear separation between clean and potentially contaminated areas.

2. Single room with ensuite facilities without negative pressure air handling
   • When option one is not available or not required, patients should be placed in a single room, with the door closed, containing an unshared bathroom and be managed under standard and transmission-based precautions as specified above.
   • An adjacent room or area for storage of and putting on clean PPE, and a separate area of adequate size for the safe removal of PPE and the disposal of clinical waste are required.

3. Single room without ensuite facilities and without negative pressure air handling
   • When options one and two are not available, patients should be placed in a single room with the door closed and be managed under standard and transmission-based precautions as specified above.
   • Consider use of a commode. If the patient needs to use shared bathroom facilities, they should wear a surgical mask at all times when outside their single room and additional cleaning measures should be considered.
   • An adjacent room or area for storage of and putting on clean PPE and a separate area of adequate size for the safe removal of PPE and the disposal of clinical waste are required.

4. Cohorting

Cohorting of suspect, probable or confirmed cases must only be undertaken following consultation with local experts, such as infectious diseases physicians and local infection prevention and control service. Where practicable, managing patients with mild illness in their own home is the preferred approach rather than cohorting patients.

Please see Appendix 2 for specific advice on cohorting suspect, probable or confirmed COVID-19 cases.

Patient care equipment

Where possible all equipment required for patient care should be dedicated for the use of an individual patient. If equipment cannot be dedicated to the patient for the duration of admission it should be thoroughly cleaned and disinfected before being used with other patients.

Aerosol-generating procedures

Some procedures may be more likely to generate higher concentrations of infectious respiratory aerosols than coughing, sneezing, talking or breathing.
Although not quantified, the procedures that might pose an increased risk to healthcare include: cough-generating procedures, administration of aerosolised/nebulised medication, turning critically ill patients to the prone position, bronchoscopy and bronchoalveolar lavage, sputum induction, tracheal intubation and extubation, tracheotomy, cardiopulmonary resuscitation, manual ventilation, non-invasive ventilation, disconnecting the patient from a closed-circuit ventilator, high-flow nasal oxygen, high-frequency oscillating ventilation and open suctioning of airways.

Aerosol-generating procedures (AGPs) should be avoided where possible.

If AGPs can’t be avoided a combination of measures should be used to reduce exposures when performing these on suspect, probable or confirmed COVID-19 patients:

- Only perform AGPs when medically necessary.
- Conduct the procedures in negative pressure rooms using airborne and contact precautions.
- Nebuliser use should be discouraged and alternative administration devices (e.g. spacers) should be used.
- Limit the number of healthcare workers present during the procedure to those essential for patient care and support
- Conduct environmental cleaning following these procedures as described in the environmental cleaning section.
- PPE should be worn as recommended. This should include an apron if high volumes of fluid are expected.
- Visitors must not be present.

**Patient movement**

The transportation and movement of patients outside of the single room should be limited to medically essential purposes only. The use of designated portable x-ray equipment and other important diagnostic equipment may make this easier.

In situations where it is necessary for the patient to be transported outside of their designated room, the **patient should wear a surgical mask** to contain secretions and routes of transport that minimise exposures of staff, other patients and visitors. **If the patient is being administered oxygen a surgical mask should be placed over the oxygen delivery device (ANZICS, 2020).**

Staff who are transporting the patient should wear appropriate PPE: long sleeved gown, gloves, surgical mask and protective eyewear (face shield or goggles). Staff transporting the patient should remove PPE in the receiving ward (e.g. prior to returning to the Emergency Department) if the staff member is not remaining with the patient.

The receiving area should be informed of the patient’s suspect, probable or confirmed diagnosis and the necessary precautions required prior to the patient being moved.

**Visitors**

Visitors should be restricted and actively discouraged. Visitors should be limited to those family members essential for patient wellbeing, e.g. a parent of a patient who is a child. The following principles should be followed in relation to essential visitors who enter the patient care area:
• Visitors should be trained on the risk of transmission and the use of infection prevention measures including the use of PPE. Visitors should also be assisted to fit and remove PPE and supervised while in the patient room to ensure compliance with infection prevention measures.

• A log of all visitors who enter the patient room should be maintained.

• Visitors should not be allowed to be present during aerosol-generating procedures.

• Visitors should be instructed to limit their movements within the facility, to monitor their health, and to report any signs or symptoms of acute illness for a period of 14 days after the last known exposure to the patient.

• Visitors should be screened for symptoms of acute respiratory illness before entering the facility.

Care of the deceased

For care of the body of the deceased in the hospital ward, continue standard, contact and droplet precautions. For mortuary care, standard, contact and droplet precautions are recommended. For autopsy, standard, contact and airborne precautions are recommended.

Transport of the deceased

When transporting the body of the deceased, the body must be placed and secured in a leak-proof body bag to prevent leakage of body fluids. Disinfect the outside of the bag with a product listed with the Therapeutic Goods Administration (TGA) as a hospital-grade disinfectant with claims against viruses.

Where the body bag or wrapping is not of a type that prevents the leakage of body fluids, the first bag must be disinfected with a TGA listed hospital grade disinfectant and placed inside a second body bag.

Viewing of the deceased

Hospital and Health Services should consider the local context in decision-making about feasibility of allowing family members to view the body of the deceased.

If a local decision is made to allow family members to view the body this should only be allowed in a single room. Family members should still be allowed to view the body. Although the infection risks are extremely low, family members should be clearly advised not to touch or kiss the body of the deceased. Family members should wash their hands with running water and liquid soap or use an alcohol-based hand rub after the viewing. Gloves are not necessary for family members.

Duration of infection prevention and control precautions

Local infection control, infectious diseases and/or public health teams (as appropriate) will advise when it is appropriate to cease droplet, airborne and contact precautions.

Duration of transmission-based precautions for suspect cases

The local infection control unit, infectious diseases team and/or public health unit (as appropriate) will advise when droplet and contact precautions may be ceased for a suspect case once a negative result for COVID-19 by PCR is obtained and they are no longer considered to be a suspect case.

Persons that are still within a period of quarantine should remain under droplet and contact precautions whilst in hospital or quarantine at home if discharged prior to the end of the quarantine period.

Duration of transmission-based precautions for probable and confirmed cases

The local infection control unit, infectious diseases team and/or public health unit (as appropriate) will advise when droplet and contact precautions may be ceased for a probable or confirmed case. They will confirm that the case meets all of the criteria for release for isolation set out in the CDNA National Guidelines for Public Health Units: Coronavirus Disease 2019 (COVID-19) available at https://www1.health.gov.au/internet/main/publishing.nsf/Content/cdna-song-novel-coronavirus.htm

Transport considerations for patients being assessed

Patients travelling to or from a clinical facility for the purposes of COVID-19 assessment, must do so in a manner that will not increase risk of infection to others.

Suspect cases may not travel by taxi, ride-share or other public transport. Hospital and Health Services should put locally practicable arrangements in place for non-urgent transport of patients requiring infection prevention and control precautions who do not have access to private transport.

Considerations for patients who are under a quarantine order that do not have symptoms suggestive of COVID-19

Self-quarantine direction is served on those who return to Queensland from overseas, from another state under certain circumstances or if a person is a close contact of a confirmed case. There may be other instances where these notices are used. Please see the most recent information about these notices at https://www.qld.gov.au/health/conditions/health-alerts/coronavirus-covid-19/take-action/self-quarantine

The below requirements are to be applied for patients who require hospital care for reasons other than COVID-19 for the duration of the self-quarantine notice.
PPE requirements

Patients who have been served a self-quarantine direction and require treatment or admission in a healthcare facility should, in addition to standard precautions, have contact and droplet precautions applied.

Placement recommendations

Patients who are admitted while under a self-quarantine direction require placement in a single room with an unshared bathroom and cared for with the door closed. A patient who is under a self-quarantine direction should not be cohorted with confirmed, probable or suspect cases of COVID-19 unless they are confirmed to have COVID-19.

Staffing considerations


In addition, to minimise the risk of transmission of COVID-19, healthcare facilities should consider the following when allocating staff to care for patients with suspect, probable or confirmed COVID-19:

- Dedicate healthcare workers to minimise the risk of transmission and exposure to other patients and healthcare workers.
- Only allocate healthcare workers who have undergone appropriate training in the use of PPE, environmental cleaning and disinfection of equipment. This training should include all relevant categories of healthcare workers (including cleaning staff).
- Roster staff to include adequate numbers of staff to avoid staff fatigue. Wearing a P2/N95 respirator can be tolerated for only limited periods; regular breaks are required.
- Keep a log of all persons who care for or enter the room of patients with suspect, probable or confirmed COVID-19.

Healthcare worker monitoring

Healthcare workers who care for patients with COVID-19 should carefully monitor and document their own health until 14 days after the last known contact with a COVID-19 patient regardless of PPE use. If a healthcare worker who has cared for a patient with suspect, probable or confirmed COVID-19 develops any acute illness or signs or symptoms such as sore throat, fever, cough, or shortness of breath they should immediately:

- stop work or not report for work
- notify their line manager and healthcare facility infection control unit
- seek medical evaluation and call ahead to notify the facility that they have cared for a patient with suspect, probable or confirmed COVID-19
- comply with work exclusion until they are no longer considered infectious to others.
Healthcare worker uniforms or personal apparel

The PPE used in healthcare is effective; however, healthcare workers should be aware that it is still possible for their uniforms or personal apparel to become contaminated. Even under normal circumstances, it is good practice to change out of your uniform/work clothes after you finish work and launder these clothes daily on the warmest appropriate water setting for the items and dry them completely (either air dry or tumble dry as appropriate for the item).

Healthcare facilities may consider providing facility laundered scrubs as an alternative to uniforms or personal apparel for healthcare workers working in areas such as fever clinics, emergency departments, infectious diseases wards or intensive care units where they are providing care for many patients suspected or confirmed to have COVID-19. Scrubs provided for this purpose should be laundered by the hospital linen service and should not be worn outside the healthcare facility, that is, the healthcare worker should wear their uniform or personal apparel to and from the healthcare facility.

Environmental cleaning and disinfection

Environmental cleaning and disinfection is crucial to preventing transmission of infection in the healthcare environment. Coronaviruses can persist on surfaces but can be effectively inactivated by appropriate disinfectants.

Routine cleaning

Daily cleaning tasks of the COVID-19 patient care environment should be undertaken as per usual practice using an appropriate disinfectant solution. Contact and droplet precautions (as above) should be observed. Frequently touched surfaces (such as doorknobs, bedrails, tabletops, light switches, patient handsets) in the patient’s room should be cleaned at least daily.

Cleaning environmental surfaces and patient care equipment with water and detergent and applying commonly used disinfectants is an effective and sufficient procedure.

The preferred routine cleaning process should involve either a:

- 2-step clean. Physical cleaning with detergent followed by disinfection with a TGA-listed hospital-grade disinfectant with activity against viruses (according to label/product information) or a chlorine-based product such as sodium hypochlorite.
- 2-in-1 clean. A physical clean using a combined detergent and TGA-listed hospital-grade disinfectant with activity against viruses (according to label/product information) or a chlorine-based product such as sodium hypochlorite, where indicated for use, i.e. a combined detergent/disinfectant wipe or solution.

If a chlorine-based product is used, it should be made up daily to 1,000ppm from a concentrated solution, following label/product information.

Minimum frequencies for routine cleaning are outlined in Queensland Health's guideline on Environmental Cleaning Risk Levels, Frequencies and Standards which is available on the Queensland Health’s intranet site only.

Final disinfectant clean

Following discharge or transfer of the patient, prior to cleaning the room, the patient’s personal effects, privacy curtains and window curtains, if present, should be removed for laundering.
Handle used textiles and fabrics with minimum agitation to avoid contamination of air, surfaces and persons. PPE for contact and droplet precautions should still be used.

The room and all patient care equipment remaining in the room should be physically cleaned. All furniture, patient equipment items, horizontal surfaces, frequently touched surfaces (e.g. light switches and call buttons) and bathroom, toilet and shower area should be thoroughly cleaned. All consumables that are unable to be cleaned should be discarded.

**Patient care equipment**

Patient care and patient assessment devices (e.g. electronic thermometers, sphygmomanometers, glucometers, hoists, pat slides) may transmit COVID-19 if devices are shared between patients. To reduce the risk of transmission, disposable or patient-dedicated equipment is preferred. Equipment that is unable to be dedicated should be cleaned and disinfected after use, allowed to dry and stored clean. See above in the routine cleaning section for advice on cleaning and disinfectant solutions.

**Waste management**

All waste generated during the care of patients suspect, probable or confirmed to have COVID-19 should be managed as clinical waste. Existing procedures for the management of clinical waste should be used.

**Linen management**

Used linen from a person with suspect, probable or confirmed COVID-19 should be managed as foul or infectious linen (for example, immediately placed in an alginate bag and then into an appropriate laundry receptacle).

A long-sleeved gown and disposable gloves should be worn during handling of soiled linen to prevent skin and mucous membrane exposure to blood and body substances. The long-sleeved gown and disposable gloves should be removed and hand hygiene performed following the handling of used linen.

Used hospital linen must not be rinsed or sorted in patient-care areas or washed in domestic washing machines.

**Food services**

Non-essential staff should be restricted from entering the COVID-19 patient care area. Food services staff should deliver all food and beverages to the designated clean area; these should then be delivered into the patient room by healthcare workers directly caring for the patient and removed by the healthcare workers directly caring for the patient once the meal is consumed.

Standard precautions should always be used when handling used crockery and cutlery. No additional precautions are required for the reprocessing of crockery and cutlery.
Implementation of precautions in primary and community care settings

- For patients in quarantine or isolation, outpatient therapy and non-urgent appointments should be postponed until after the end of their period of quarantine or isolation.
- Alert signage should be placed in a prominent position so that patients presenting with travel history, contact with a suspect, probable or confirmed case, or who are in self-quarantine are aware they must alert staff immediately so that infection prevention and control precautions can be taken.
- **Standard, contact and droplet precautions** should be used for routine consultation with patients presenting with mild symptoms. This should include a surgical mask, long-sleeved gown, gloves, and eye protection and placement of the patient in a single room with the door closed (ensuring air does not circulate to other areas). The patient should not remain in a shared waiting area.
- Patients with severe symptoms should be managed in hospital if possible and specimens should be collected using standard, contact and airborne precautions in a negative pressure room. If this is not possible, in primary and community care settings the patient should be placed in a single room with the door closed (ensuring air does not circulate to other areas). A surgical mask should be placed on the patient, and the healthcare worker should wear the same PPE as that recommended for hospital-based healthcare workers. The room should be left vacant for at least 30 minutes after specimen collection.
- In the absence of a single room with negative pressure, the additional action of keeping a surgical mask on the patient helps prevent respiratory droplets from being disseminated.
Review

This is an interim guideline and will be reviewed as new information becomes available.

Business area contact

Communicable Diseases Branch

Definitions of terms used in the policy and supporting documents

<table>
<thead>
<tr>
<th>Term</th>
<th>Definition/Explanation/Details</th>
<th>Source</th>
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<tr>
<td>Aerosol-generating procedures</td>
<td>Any medical procedure that can induce the production of aerosols of various sizes, including small (&lt;5µm) particles</td>
<td>WHO</td>
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<td>Cohorting</td>
<td>Placing together in the same room patients who are infected with the same pathogen and are suitable roommates.</td>
<td>NHMRC</td>
</tr>
<tr>
<td>Negative pressure room</td>
<td>A single-occupancy patient care room used to isolate persons with a suspect, probable or confirmed airborne infectious disease. Environmental factors are controlled in negative pressure rooms to minimise the transmission of infectious agents that are usually transmitted from person to person by droplet nuclei associated with coughing or aerosolisation of contaminated fluids.</td>
<td>NHMRC</td>
</tr>
<tr>
<td>Personal protective equipment (PPE)</td>
<td>A variety of barriers used alone or in combination to protect mucous membranes, skin and clothing from contact with infectious agents. PPE includes gloves, masks, respirators, protective eyewear, face shields and gowns.</td>
<td>NHMRC</td>
</tr>
</tbody>
</table>
## Approval and implementation

**Document custodian:**
Public Health Incident Controller, State Health Emergency Coordination Centre COVID-19

**Approving officer:**
Dr Heidi Carroll, Specialist Public Health Advisor, State Health Emergency Coordination Centre COVID-19

**Approval date:** 23 April 2020

**Version control:** Revised document

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<td>Inclusion of advice for probable cases throughout.</td>
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<td>• Recognition of suspect and probable cases and immediate action.</td>
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<td>• Immediate isolation and restriction of suspect, probable and confirmed cases.</td>
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<td>• Considerations for patients who are under a quarantine order that do not have symptoms suggestive of COVID-19.</td>
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<td>• Linen management.</td>
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<td>• Healthcare worker uniforms and personal apparel.</td>
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<td>• Considerations on choice of PPE</td>
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<td>1.9</td>
<td>29/02/2020</td>
<td>CDIM Infection Management</td>
<td>New waste section added based on clarification from national guidance. Change made to distance required for spatial separation of cohorted patients to align with existing guidance. Staffing considerations section updated. Appendix 2 added.</td>
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<td>1.7</td>
<td>16/02/2020</td>
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References


Appendix 1 – Airborne contaminant removal

The following guidance has been adopted from the Centers for Disease Control and Prevention, Healthcare Infection Control Practices Advisory Committee (HICPAC): Guidelines for Environmental Infection Control in Health-Care Facilities, available at http://www.cdc.gov/hicpac/pdf/guidelines/eic_in_HCF_03.pdf

Table 1: Airborne Contaminant Removal. Air changes/hour (ACH) and time required for airborne-contaminant removal efficiencies of 99% and 99.9%*

<table>
<thead>
<tr>
<th>ACH+ § ¶</th>
<th>99% efficiency</th>
<th>99.9% efficiency</th>
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<td>2</td>
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* This table is revised from Table S3-1 in reference 4 and has been adapted from the formula for the rate of purging airborne contaminants presented in reference 1435. Please use the following link: http://www.cdc.gov/hicpac/pdf/guidelines/eic_in_HCF_03.pdf

§ Shaded entries denote frequently cited ACH for patient-care areas.

¶ Values were derived from the formula:

\[ t_2 - t_1 = - \left[ \ln \left( \frac{C_2}{C_1} \right) / \left( \frac{Q}{V} \right) \right] \times 60, \]

with \( t_1 = 0 \) and where:

- \( t_1 \) = initial timepoint in minutes
- \( t_2 \) = final timepoint in minutes
- \( C_1 \) = initial concentration of contaminant
- \( C_2 \) = final concentration of contaminant
- \( C_2 / C_1 = 1 - (\text{removal efficiency} / 100) \)
- \( Q \) = air flow rate in cubic feet/hour
- \( V \) = room volume in cubic feet
- \( Q / V = ACH \)

§Values apply to an empty room with no aerosol-generating source. With a person present and generating aerosol, this table would not apply. Other equations are available that include a constant generating source.

However, certain diseases (e.g., infectious tuberculosis) are not likely to be aerosolized at a constant rate. The times given assume perfect mixing of the air within the space (i.e., mixing factor = 1). However, perfect mixing usually does not occur. Removal times will be longer in rooms or areas with imperfect mixing or air stagnation. Caution should be exercised in using this table in such situations. For booths or other local ventilation enclosures, manufacturers’ instructions should be consulted.
Appendix 2 – Patient placement (cohorting) advice

Confirmed cases

Cohorting of confirmed cases of COVID-19 must only be undertaken following consultation with local experts, such as infectious disease physicians, the local infection prevention and control service and public health unit as relevant. Where practicable, managing patients with mild illness in their own home is the preferred approach rather than cohorting patients in hospital.

Cohorting patients who are infected with COVID-19 confines their care to one area and prevents contact with other patients.

The following principles apply when making decisions about patient placement:

- prioritise patients who have severe pneumonia symptoms for placement in single rooms with negative pressure air handling
- consider the patient's ability to perform hand hygiene and follow appropriate cough and personal hygiene etiquette
- care should be taken to ensure that probable and suspect cases are not cohorted with confirmed cases
- care should be taken to ensure that confirmed COVID-19 cases co-infected with influenza or other respiratory viruses are not cohorted.

A suitable ward should be identified for the exclusive use of cohorting confirmed COVID-19 patients. When determining the location of the cohort ward, the following should be considered:

- the ability to isolate the ward air handling system (if aerosol-generating procedure are to be performed anywhere on the ward)
- the ability to limit entry/access to the ward
- the ward contains the necessary equipment
- spatial separation of greater than 1.5 metres between bed spaces
- patient populations of adjacent areas. The cohort ward should be separated from patients who are potentially at greater risk of complications from COVID-19 (for example, haematology, oncology and transplant services)
- whenever possible, curtains, privacy screens or barriers should be used to physically separate patients to help reduce the transmission of infection.

Management of cohort areas should incorporate the following:

- Standard and transmission-based precautions must be maintained. The following options can be used:
  1. gowns and gloves must be changed, and hand hygiene performed between contact with each patient in the cohort area
  2. a plastic apron is worn over the long sleeve gown when providing care with minimal patient contact. The plastic apron and gloves must be changed, and hand hygiene performed between contact with each patient.
Where there is extensive patient contact, in addition to the apron and gloves, the gown must also be changed at the end of the procedure and hand hygiene performed. Examples of extensive contact are providing care such as dressing large or complex wounds; hygiene cares for incontinent clients; hygiene cares or pressure area care when a client is fully dependent; urinary catheter cares).

- Whenever possible, healthcare workers assigned to cohorted patient care units should be experienced healthcare workers and should not float or be assigned to other patient care areas. Separate staffing arrangements for COVID-19 and non-COVID-19 patients may also assist in protecting patients, as well as staff members, at particular risk of COVID-19 complications.

- The number of persons entering the cohorted area should be limited to the minimum number necessary for patient care and support.

- Patient transport should be limited by having necessary equipment (e.g. portable X-ray) available in cohort areas.

- During aerosol-generating procedures, contact and airborne precautions should be followed for at least the duration of the procedure. Where available the procedure should be undertaken in a negative pressure room. Where this is not available, the procedure should be undertaken in a treatment room with the door closed, away from other patients. In all cases, leave the room vacant with the door closed for 30 minutes after the procedure and the patient has vacated the room. The room may be cleaned by a worker wearing the correct PPE during this period.

### Suspect cases

The decision to cohort suspect cases needs to be taken following consultation with local experts, such as infectious diseases physicians and infection control practitioners. **Cohorting suspect cases is not recommended if it can be avoided.**

Where suspect cases must be cohorted, epidemiological and clinical suspicion should be considered when deciding which suspect case are placed together. Social distancing measures must be adhered to with a minimum of 1.5 metres distance maintained between patients at all times.

In addition to the requirements outlined above for cohorting suspect cases, curtains, privacy screens or barriers should be used at all times to physically separate patients. This will help to reduce the potential for transmission of infection. The curtains or barriers between patients must remain in place whenever a patient is present.

Probable and suspect cases should not be cohorted with confirmed cases.

### Version control – Appendix 2

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<tr>
<td>V1.0</td>
<td>6 March 2020</td>
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</table>
Appendix 3 – PPE Quick reference guide

Please note this is a quick reference guide only on the recommended PPE for the care of confirmed, probable and suspect COVID-19 cases. Staff should be familiar with the comprehensive advice available in the Queensland Health Interim infection prevention and control guidelines for the management of COVID-19 in healthcare settings.
Always use standard precautions for all patients regardless of the known or presumed infectious status.

Table 1: Recommended PPE for the care of confirmed, probable and suspect COVID-19 cases

<table>
<thead>
<tr>
<th></th>
<th>No direct patient physical contact and &gt;1.5 metres&lt;sup&gt;1&lt;/sup&gt;</th>
<th>Patient contact &lt;1.5 metres</th>
<th>High-risk patient environment&lt;sup&gt;4&lt;/sup&gt;</th>
<th>Aerosol-generating procedures&lt;sup&gt;5&lt;/sup&gt;</th>
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<tr>
<td>Disposable gloves</td>
<td>No</td>
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<tr>
<td>Disposable plastic apron</td>
<td>No</td>
<td>No&lt;sup&gt;2&lt;/sup&gt;</td>
<td>No</td>
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<tr>
<td>Long sleeved fluid-resistant gown</td>
<td>No</td>
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<td>Yes</td>
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<tr>
<td>Surgical mask</td>
<td>No</td>
<td>Yes&lt;sup&gt;3&lt;/sup&gt;</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>P2/N95 respirator</td>
<td>No</td>
<td>No&lt;sup&gt;3&lt;/sup&gt;</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Eye protection</td>
<td>No</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
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</table>

1. Use standard precautions when a distance of >1.5 metres can be maintained between the healthcare worker and patient. In this instance, no physical patient contact is to occur, and a minimum distance of >1.5 metres from the patient is strictly observed.
2. For wards where patients with confirmed COVID-19 are being cohorted, please refer to Appendix 2 – patient placement (cohorting) for PPE advice regarding the appropriate use of plastic aprons in cohort environments.
3. For hospitalised patients requiring frequent attendance by medical and nursing staff, a P2/N95 respirator should be used for patients requiring care of clinically ill patients requiring high-level/high-volume hands-on contact outside of ICU.
4. High-risk patient environments include areas providing care to patients with severe symptoms suggestive of pneumonia outside of ICU requiring high-level/high-volume hands-on contact and care of critically ill patients in ICU.
5. Aerosol-generating procedures include tracheal intubation, non-invasive ventilation, tracheotomy, cardiopulmonary resuscitation, manual ventilation before intubation, and bronchoscopy (and bronchoalveolar lavage), high flow nasal oxygen.
References


Version control – Appendix 3

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<td>26 March 2020</td>
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COVID-19

Safe fitting and removal of personal protective equipment (PPE) for healthcare staff

CORRECT PROCESS FOR FITTING PPE

1. Perform hand hygiene

2. Put on long sleeved fluid-resistant gown
   - Ensure the gown is large enough to allow unrestricted freedom of movement without gaping.
   - Fasten the back of the gown at the neck and waist.

3. Put on surgical mask or P2/N95 respirator
   - Secure ties (for surgical mask) or elastic bands (for respirator) at the middle of the head and neck.
   - Fit flexible band on nose bridge.
   - Ensure mask is fixed snugly then add below the chin.
   - For respirator use, perform a fit check according to manufacturer instructions.

4. Put on protective eyewear/face shield
   - Place protective eyewear/face shield over eyes/face and adjust to fit.

5. Put on gloves
   - Extend to cover wrist of long sleeved gown.

CORRECT PROCESS FOR REMOVING PPE

1. Remove gloves
   - The outside of gloves is contaminated. Remove gloves being careful not to contaminate hands during glove removal.
   - Discard gloves into clinical waste.
   - Perform hand hygiene

2. Only remove mask after exiting the patient room!

3. Remove gown
   - The gown’s front and sleeves are contaminated. Unpin or break fasteners and pull gown away from body, touching the inside of the gown only.
   - Discard gown into clinical waste.
   - Perform hand hygiene

4. Remove protective eyewear/face shield
   - The outside of protective eyewear/face shield is contaminated.
   - Remove eyewear/face shield by tilting the head forward and lifting the inside band of ear pieces. Avoid touching the front surface of the eyewear/face shield.
   - Reusable items should be placed in a designated receptacle for reprocessing.
   - Place disposable items in clinical waste.
   - Perform hand hygiene

5. Remove P2/N95 respirator or surgical mask
   - Properly perform 502(N)/FACEMASK (Surgical) decontamination steps.
   - Perform hand hygiene
## PPE RECOMMENDED FOR:

### Routine care (confirmed, probable or suspected cases)

<table>
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<th>Patient</th>
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| - Perform hand hygiene  
- Recommended PPE for contact and droplet precautions:  
  1. Long sleeved fluid-resistant gown  
  2. Surgical mask  
  3. Protective eyewear / faceshield  
  4. Gloves | - Place the patient in a single room with the door closed (a room from which the air does not circulate to other areas is preferred) if available  
- Move patient within facility only when medically necessary  
- Place a surgical mask on patient during transfer out of their single room if possible or when other people enter the room |

### PPE RECOMMENDED FOR:

- aerosol-generating procedures  
- care of confirmed, probable or suspected case with severe symptoms suggestive of pneumonia  
- care of confirmed, probable or suspected case critically ill in ICU  
- prolonged or very close patient contact

<table>
<thead>
<tr>
<th>Staff</th>
<th>Patient</th>
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</table>
| - Perform hand hygiene  
- Recommended PPE for contact and airborne precautions:  
  1. Long sleeved fluid-resistant gown  
  2. P2/N95 respirator  
  3. Protective eyewear / faceshield  
  4. Gloves | - Place the patient in a single room with negative pressure air handling  
- Move patient within facility only when medically necessary  
- If possible, place a surgical mask on patient during transfer out of their single room, or when other people enter the room |
Appendix 4 – Infection control guidance for fever clinics for COVID-19

Background

Hospital and Health Services (HHS) should have in place systems to rapidly assess and manage symptomatic people for COVID-19. Depending on demand and capacity, this may be through current emergency department procedures or through special assessment areas, referred to as ‘fever clinics’ in this document.

It is anticipated that public and private hospitals and general practices (GPs) may quickly exceed capacity for a potentially high volume of patients. Fever clinics may relieve the diagnostic burden on hospitals and GPs by providing rapid triage and assessment of symptomatic patients and allowing hospital emergency departments to continue to focus clinical services on patients requiring emergency care.

HHS may also consider increasing local telehealth options to decrease demand on emergency department services. Patients could be assessed via telehealth consultation with a clinician to decide whether any clinical management is required, or whether they meet the criteria for testing. This could provide reassurance to the ‘worried well’ and potentially prevent unnecessary presentations.

The criteria for establishment of a hospital fever clinic will depend on the number of patients presenting for assessment, the need and capacity for assessment and management of these patients, and the capacity of the emergency department to appropriately isolate these patients from others.

Aim of fever clinics

The aim of establishing a fever clinic is to reduce the burden on emergency departments and reduce the risk of transmission of COVID-19 to other vulnerable patients presenting to the hospital.

Objectives of fever clinics

The objectives of fever clinics are to:

- rapidly assess and refer (where indicated) people presenting with COVID-19 symptoms
- reduce the impact on scarce health resources through use of a controlled triage system
- initiate isolation for confirmed, probable or suspect cases and quarantine of close contacts
- collect clinical and epidemiological data on cases to inform clinical management and public health decisions
- identify and refer the need for home support services.
General principles

The HHS should develop clear guidance for the model of care for patients presenting to the fever clinic, including guidance for triage, assessment, management, referral and documentation.

It should be recognised that patients with varying needs may present to the fever clinic. Clear local procedures should be developed and communicated for:

- efficient transfer to the emergency department where required or directly to a dedicated inpatient unit
- referral for other health or social services.

Infection prevention and control principles

Standard precautions, particularly good hand hygiene practice and attention to appropriate environmental cleaning and disinfection, should be strictly implemented by all staff working in the fever clinic. All staff working in a fever clinic must have completed training on safe fitting and removal of personal protective equipment (PPE).

People who present for screening should be considered to be infectious and should be provided with a surgical mask on arrival and asked to perform hand hygiene with alcohol-based hand rub. The use of signage or recorded message to guide patients on expected actions should also be considered.

While the patient is wearing a surgical mask, there is no need for staff to be wearing respiratory protection if they are in the same room or greater than 1.5 metres away from the patient, or where staff do not provide direct physical care or have face-to-face consultation.


For most interaction with patients in a fever clinic the patient should be managed using contact, droplet and standard precautions. This means:

For patients:

- Patients should wear a surgical mask for their entire visit while they are in the waiting area and in consultation (unless it needs to be removed as directed by a healthcare professional to perform assessment or care, or to collect a pathology specimen).
- Hand hygiene and respiratory hygiene should be encouraged.
- Patients should maintain social distancing (at least 1.5 metres) from others in the clinic.

For staff:

- Maintain hand hygiene.
- Staff should maintain social distancing (at least 1.5 metres) from others in the clinic where possible.
- While having face-to-face contact or providing care, staff should wear a surgical mask, eye protection (goggles or face shield), gloves and long sleeved gown.
- Standard and transmission-based precautions must be maintained. The following options can be used:
  - gowns and gloves must be changed and hand hygiene performed between contact with patients in the fever clinic, or
  - a plastic apron must be worn over the long sleeved gown when providing care with minimal patient contact. The plastic apron and gloves must be changed and hand hygiene performed between contact with patients.

- When using one of the above options, surgical mask and eye protection can stay in place between patients. Once a mask is removed it must be discarded. Once eye protection is removed it must be either discarded or cleaned and disinfected appropriately (according to whether it is a single use or reusable item).

**Staffing considerations**


In the fever clinic setting, it is recommended that healthcare workers are dedicated to fever clinics to minimise risk of transmission and exposure to other patients and healthcare workers. That is, staff should not alternate between the fever clinic and other clinical areas where vulnerable patients are managed.

Review influenza vaccination status of staff providing direct care and encourage seasonal influenza vaccination and COVID-19 vaccination when available.

**Site and layout of fever clinic**

The site and layout of the space used for the fever clinic should be carefully considered and planned. The layout should allow enough space to maintain social distancing.

- The location of the fever clinic should have direct external access and not require presenting patients to travel through a hospital or healthcare facility. Careful consideration should be given to ensuring patients presenting to the fever clinic do not have contact with other vulnerable patients.

- Consider the use of markings on the floor (e.g. tape) to indicate physical distancing requirements.

- The reception station should be the first point of contact for patients presenting to the clinic. There should be clear signage directing patients to stand at least 1.5 metres back from the reception desk.

- Chairs in the waiting area should be placed greater than 1.5 metres apart. Patients should be directed not to move the chairs.

- Alcohol-based hand rub should be placed at all stations and made available to patients. Wall-mounted or free-standing alcohol-based hand rub dispensers should be considered. Facilities for hand washing (using running water and liquid soap, and paper towels to dry hands) should also be available to staff with visually contaminated hands.

- The space should not be carpeted and all surfaces should be impermeable and easily cleaned.
• Unless aerosol-generating procedures are being undertaken, there are no specific air-conditioning or air-handling requirements. However, if a space is used that is not air-conditioned there should be good natural ventilation. For further information about management of aerosol-generating procedures refer to the Queensland Health interim infection prevention and control guidelines for the management of COVID-19 in healthcare settings.

Clinic flow

Reception

This station should be situated at the entrance to the clinic and provide the first point of contact with healthcare personnel.

The role of this station is to:

• provide a surgical mask and alcohol-based hand rub upon entry
• identify people presenting for non-COVID-19-related issues and redirect to appropriate services
• collect and record initial identifying information
• provide information to clients on clinic operations, requirements for social distancing within the clinic and wearing of surgical mask throughout the assessment process.
• provide a waiting number to ease processing through triage and registration
• direct the person to the triage station.

Staff in this area could be non-health-professional staff with good communication skills and basic training in infection control. These staff will need to be able to gather initial health information and personal details using a consistent tool/script.

Triage and nursing assessment

All people presenting to the fever clinic should be triaged on arrival by a specifically trained member of a clinical assessment team.

Staff in this area should be registered nurses who are skilled in triage and clinical assessment.

Further consultation

Depending on the physical and human resources available and the volume of patients being seen in the fever clinic, the functions of the fever clinic could be combined into one consultation (i.e. one healthcare worker who performs the assessment, testing and referral) or separated for further efficiency.

Clinical assessment

Following triage, patients may require further prompt clinical assessment. These patients should be seen for assessment according to local procedures as soon as possible. If required, transfer to the emergency department, or direct transfer to a designated inpatient unit should be arranged as soon as possible.
Testing


Samples for testing may be collected by a registered nurse. Training in the collection of nasopharyngeal and oropharyngeal swabs may be required.

Registered nurses in Queensland Hospital and Health Services may request and order testing for COVID-19.

Patient information following testing

**Patients who have samples collected for testing must be advised to self-isolate until they are notified of their results.**


Referral for social support or community-based home assistance

People presenting to the fever clinic may require healthcare assistance at home or access to social support while unwell or in isolation. If so, established processes for referral to these services should be followed.

Staff responsible for assessing and referring patients for home health support or social support could come from a variety of nursing or allied health background.

A clear local referral process is needed for communication with community services and to ensure a timely response.

Notification of COVID-19 testing results

Positive results

Patients who test positive to COVID-19 will need to be notified by telephone and directed to self-isolate immediately. This means they must:

- stay indoors
- monitor symptoms and contact their doctor or 000 if symptoms are worsening
- reduce the chance of spread to others in their household by staying in a different bedroom/bathroom, not sharing household items and wearing a mask where necessary.
Further details on self-isolation requirements can be found here:

The patient should be advised that they will be contacted by their local public health unit for further management.

**Negative results**

Telephone or SMS communication can be used to convey results to those patients who have tested negative to COVID-19. The following examples can be used to notify individuals of their negative result.

**Template SMS script**

**COVID-19 was not detected in your test.** Call (insert number) if further information is needed.

*If you have been issued with a self-quarantine direction, you must remain in self-quarantine until the end date written on the direction regardless of this result. This is because you may still develop COVID-19 infection.*

*If you have any concerns about your symptoms, call your doctor or 13 HEALTH (13 43 25 84). Call 000 if you have serious symptoms such as difficulty breathing and please tell them if you are in quarantine.*

**Template telephone call flow chart**

1. **Confirm patient details:**
   
   Hi (name), **COVID-19 was not detected in your test.** Have you been issued with a self-quarantine direction?

2. **Yes**
   
   You must remain in self-quarantine until the end date written on the direction because you may still develop COVID-19 infection. If you have any concerns about your symptoms during this time, you must call your doctor or 13 HEALTH. Call 000 if you have serious symptoms such as difficulty breathing and please tell them if you are in quarantine.

3. **No**
   
   Are you currently unwell?

4. **Yes**
   
   You must stay home until all your symptoms have resolved. You may then return to work. Continue to practice social distancing and good hand hygiene.

5. **No**
   
   You are able to return to work. Continue to practice social distancing and good hand hygiene.
Bibliography and further information


Supporting and related documents


## Definitions

<table>
<thead>
<tr>
<th>Term</th>
<th>Definition</th>
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<tbody>
<tr>
<td>CDB</td>
<td>Communicable Diseases Branch</td>
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<tr>
<td>CDIM</td>
<td>Communicable Diseases Infection Management</td>
</tr>
<tr>
<td>CE</td>
<td>Chief Executive</td>
</tr>
<tr>
<td>CHO</td>
<td>Chief Health Officer and Deputy Director General</td>
</tr>
<tr>
<td>DG</td>
<td>Director General</td>
</tr>
<tr>
<td>HHS</td>
<td>Hospital and Health Service</td>
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<tr>
<td>PHU</td>
<td>Public health unit</td>
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<tr>
<td>Standard precautions</td>
<td>They are the basic level of infection control precautions which are to be used, as a minimum, in the care of all patients.</td>
</tr>
<tr>
<td>Transmission based precautions</td>
<td>Transmission-based precautions are applied in addition to standard precautions. Transmission-based precautions are applied to patients confirmed, probable or suspect to be infected with agents transmitted by the contact, droplet or airborne routes.</td>
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### Version control – Appendix 4

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<td>23 April 2020</td>
<td>Revised: Objectives of fever clinic.</td>
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<td></td>
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<td>Revised: Clinical assessment.</td>
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<td>Revised: SMS template.</td>
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<td>V1.0</td>
<td>3 April 2020</td>
<td>New appendix</td>
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