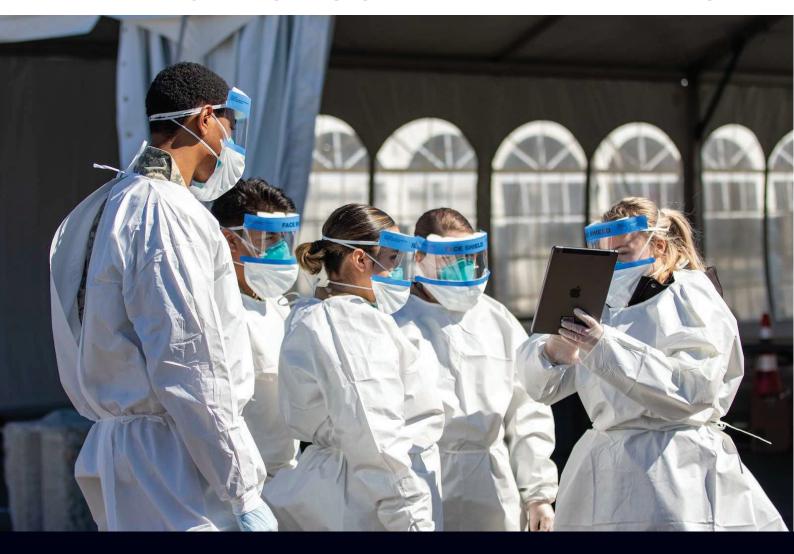


MANUAL OF COVID - 19 PREVENTION



Together we can overcome COVID - 19

NOTE

Welcome to the Arab Hospitals Federation Manual of COVID-19 Prevention

Faced with an unknown virus, sharing and collaboration are the best remedy. The publication of this Manual is dedicated to all healthcare workers in our Arab Hospitals to help them face this crisis to save the lives of the patients.

This Manual, inspired from different references and referals in the chinese hospitals who faced this challenge, is available to all AHF Members and friends for free.

Our Global enemy is named coronavirus (COVID – 19).

The first frontline in this battle is the hospital where our fighters are the medical workers. We need to make sure that this battleground is where we reduce the virus, not where the virus defeats us.

To ensure that we can win, we must first make sure that our medical staff is guaranteed sufficient resources, including experience and technologies.

Thanks to the medical staff in all the Arab Healthcare sector and to all Ministries of Health who took a huge risk in facing this crisis and treating COVID-19 patients.

Today, with the spread of the pandemic, all the worldwide experiences are the most valuable sources of information and the most important defense for medical workers on their battlefield.

This pandemic is a common challenge faced by mankind in the age of globalization. At this moment, protecting Healthcare resources, sharing experiences and lessons is our only chance to win.

The real remedy for epidemics is not isolation, but cooperation.

Together we will reach our Aim, Together we can overcome COVID – 19.

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Together we can overcome COVID - 19

PREVENTION AND CONTROL MANAGEMENT

I. ISOLATION AREA MANAGEMENT

1- Fever Clinic

1.1 Layout

- (1) Healthcare facilities shall set up a relatively independent fever clinic including an exclusive one-way passage at the entrance of the hospital with a visible sign;
- (2) The movement of people shall follow the principle of "three zones and two passages": a contaminated zone, a potentially contaminated zone and a clean zone provided and clearly demarcated, and two buffer zones between the contaminated zone and the potentially contaminated zone;
- (3) An independent passage shall be equipped for contaminated items; set up a visual region for one-way delivery of items from an office area (potentially contaminated zone) to an isolation ward (contaminated zone);
- (4) Appropriate procedures shall be standardized for medical personnel to put on and take off their protective equipment. Make flowcharts of different zones, provide full-length mirrors and observe the walking routes strictly;
- (5) Infection prevention and control technicians shall be assigned to supervise the medical personnel on putting on and removing protective equipment so as to prevent contamination;
- (6) All items in the contaminated zone that have not been disinfected shall not be removed

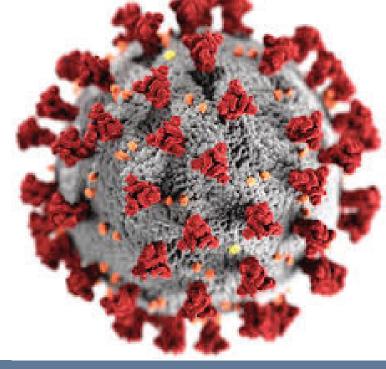
1.2 Zone Arrangement

- (1) Set up an independent examination room, a laboratory, an observation room, and a resuscitation room;
- (2) Set up a pre-examination and triage area to perform preliminary screening of patients;
- (3) Separate diagnosis and treatment zones: those patients with an epidemiological history and fever and/or respiratory symptoms shall be guided into a suspected COVID-19 patient zone; those patients with regular fever but no clear epidemiological history shall be guided into a regular fever patient zone.

1.3 Patient Management

- (1) Patients with fevers must wear medical surgical masks;
- (2) Only patients are allowed to enter the waiting area in order to avoid overcrowding;
- (3) The duration of the patient's visit shall be minimized so as to avoid cross infections;

(4) Educate patients and their families about early identification of symptoms and essential preventative actions.



1.4 Screening, Admission and Exclusion

(1) All healthcare workers shall fully understand the epidemiological and clinical features of COVID-19 and screen patients in accordance with the screening criteria below.

Table 1 Screening Criteria for Suspected COVID-19 Cases

Epidemiological History	 Within 14 days before the onset of the disease, the patient has a travel or residence history in the high-risk regions or countries; Within 14 days before the onset of the disease, the patient has a history of contact with those infected with SARS-CoV-2 (those with a positive NAT result); Within 14 days before the onset of the disease, the patient had direct contact with patients with fever or respiratory symptoms in high-risk regions or countries; Disease clustering (2 or more cases with fever and/or respiratory symptoms occur at such places as homes, offices, school classrooms, etc. within 2 weeks) 	The patient meets 1 epidemio- logical history and 2 clinical manifesta- tions.	The patient has no epidemiological history and meets 3 clinical manifestations.	The patient has no epide-miological history, meets 1-2 clinical manifestations, but cannot be excluded from COVID-19
Clinical Manifestations	 The patient has fever and/or respiratory symptoms; The patient has the following CT imaging features of COVID-19: multiple patchy shadows and interstitial changes occur early, particularly at the lung periphery. The conditions further develop into multiple ground-glass opacities and infiltrates in both lungs. In severe cases, the patient may have lung consolidation and rare pleural effusion; The white blood cells count in the early stage of the disease is normal or decreased, or the lymphocyte count decreases over time. 			through imaging.
	Suspected Case Diagnosis	Yes	Yes	Expert consultation

- (2) Nucleic acid testing (NAT) shall be conducted on those patients who meet the screening criteria for suspected patients;
- (3) Patients who do not meet the screening criteria above, if they do not have a confirmed epidemiological history, but cannot be ruled out from having COVID-19 based on their symptoms, especially through imaging, are recommended for further evaluation and to obtain a comprehensive diagnosis;

- (4) Any patient who tests negative shall be re-tested 24 hours later. If a patient has two negative NAT results and negative clinical manifestations, then he or she can be ruled out from having COVID-19 and discharged from the hospital. If those patients cannot be ruled out from having COVID-19 infections based on their clinical manifestations, they shall be subjected to additional NAT tests every 24 hours until they are excluded or confirmed;
- (5) Those confirmed cases with a positive NAT result shall be admitted and treated collectively based on the severity of their conditions (the general isolation ward or isolated ICU).

2-Isolation Ward Area

2.1 Scope of Application

The isolation ward area includes an observation ward area, isolation wards, and an isolation ICU area. The building layout and workflow shall meet the relevant requirements of the hospital isolation technical regulations. Medical providers with negative pressure rooms shall implement standardized management in accordance with relevant requirements. Strictly limit access to isolation wards.

2.2 Layout

Please refer to fever clinic.

2.3 Ward Requirements

- (1) Suspected and confirmed patients shall be separated in different ward areas;
- (2) Suspected patients shall be isolated in separated single rooms. Each room shall be equipped with facilities such as a private bathroom and the patient's activity should be confined to the isolation ward;
- (3) Confirmed patients can be arranged in the same room with bed spacing of not less than 1.2 meters (appx 4 feet). The room shall be equipped with facilities such as a bathroom and the patient's activity must be confined to the isolation ward.

2.4 Patient Management

- (1) Family visits and nursing shall be declined. Patients should be allowed to have their electronic communication devices to facilitate interactions with loved ones:
- (2) Educate patients to help them prevent further spread of COVID-19, and provide instructions on how to wear surgical masks, proper handwashing, cough etiquette, medical observation and home quarantine.

II. STAFF MANAGEMENT

1-Workflow Management

- (1) Before working in a fever clinic and isolation ward, the staff must undergo strict training and examinations to ensure that they know how to put on and remove personal protective equipment. They must pass such examinations before being allowed to work in these wards.
- (2) The staff should be divided into different teams. Each team should be limited to a maximum of 4 hours of working in an isolation ward. The teams shall work in the isolation wards (contaminated zones) at different times.
- (3) Arrange treatment, examination and disinfection for each team as a group to reduce the frequency of staff moving in and out of the isolation wards.
- (4) Before going off duty, staff must wash themselves and conduct necessary personal hygiene regimens to prevent possible infection of their respiratory tracts and mucosa.

2- Health Management

(1) The front-line staff in the isolation areas – including healthcare personnel, medical technicians and property & logistics personnel – shall live in an isolation accommodation and shall not go out without permission.

- (2) A nutritious diet shall be provided to improve the immunity of medical personnel.
- (3) Monitor and record the health status of all staff on the job, and conduct health monitoring for front-line staff, including monitoring body temperature and respiratory symptoms; help address any psychological and physiological problems that arise with relevant experts.
- (4) If the staff have any relevant symptoms such as fever, they shall be isolated immediately and screened with an NAT.
- (5) When the front-line staff including healthcare personnel, medical technicians and property & logistics personnel finish their work in the isolation area and are returning to normal life, they shall first be NAT tested for SARS-CoV-2. If negative, they shall be isolated collectively at a specified area for 14 days before being discharged from medical observation.

III. COVID-19 RELATED PERSONAL PROTECTION MANAGEMENT

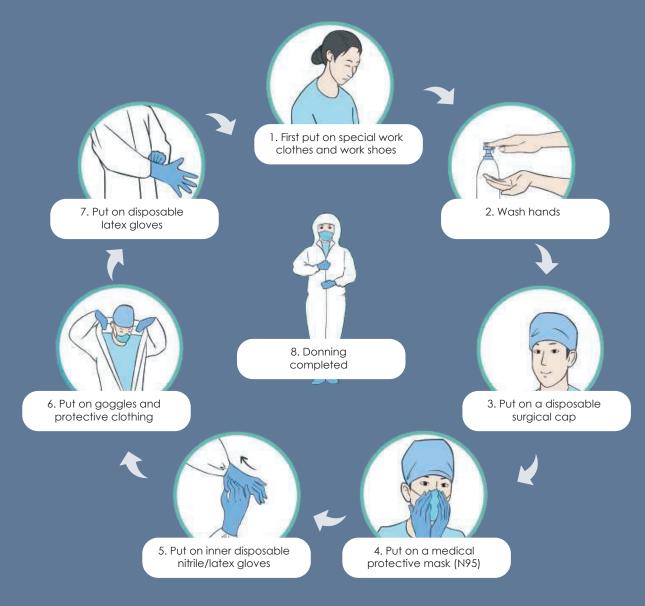
Protection Level	Protective Equipment	Scope of Application
Level I protection	 Disposable surgical cap Disposable surgical mask Work uniform Disposable latex gloves or/and disposable isolation clothing if necessary 	Pre-examination triage, general outpatient department
Level II protection	 Disposable surgical cap Medical protective mask (N95) Work uniform Disposable medical protective uniform Disposable latex gloves Goggles 	 Fever outpatient department Isolation ward area (including isolated intensive ICU) Non-respiratory specimen examination of suspected/confirmed patients Imaging examination of suspected/confirmed patients Cleaning of surgical instruments used with suspected/confirmed patients
Level III protection	 Disposable surgical cap Medical protective mask (N95) Work uniform Disposable medical protective uniform Disposable latex gloves Full-face respiratory protective devices or powered air-purify ing respirator 	 When the staff performs operations such as tracheal intubation, tracheotomy, bronchofibroscope, gastroenterological endoscope, etc., during which, the suspected/confirmed patients may spray or splash respiratory secretions or body fluids/blood When the staff performs surgery and autopsy for confirmed/suspected patients When the staff carries out NAT for COVID-19

Notes:

- 1. All staff at the healthcare facilities must wear medical surgical masks;
- 2. All staff working in the emergency department, outpatient department of infectious diseases, outpatient department of respiratory care, department of stomatology or endoscopic examination room (such as gastrointestinal endoscopy, bronchofibroscopy, laryngoscopy, etc.) must upgrade their surgical masks to medical protective masks (N95) based on Level I protection;
- 3. Staff must wear a protective face screen based on Level II protection while collecting respiratory specimens from suspected/confirmed patients.

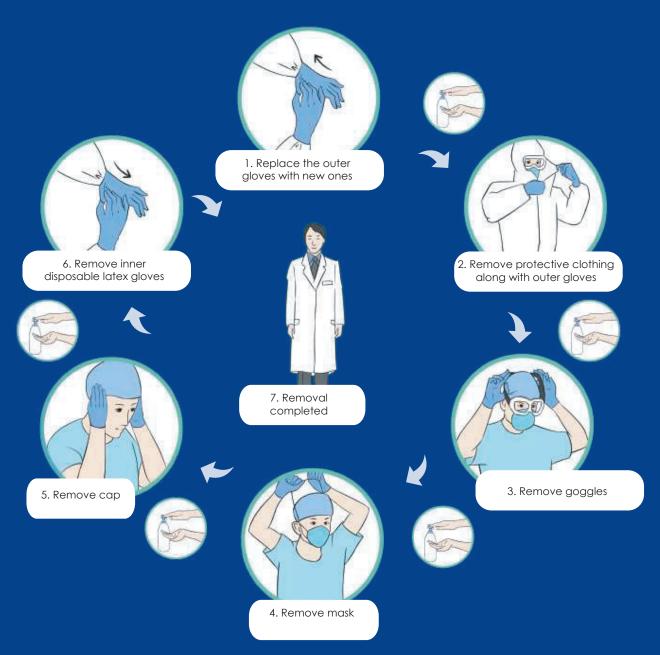
IV. HOSPITAL PRACTICE PROTOCOLS DURING COVID-19 EPIDEMIC

1-Guidance on Donning and Removing Personal Protective Equipment (PPE) to manage COVID-19 Patients



Protocol for Donning PPE:

Put on special work clothes and work shoes \rightarrow Wash hands \rightarrow Put on disposable surgical cap \rightarrow Put on medical protective mask (N95) \rightarrow Put on inner disposable nitrile/latex gloves \rightarrow Put on goggles and protective clothing (note: if wearing protective clothing without foot covers, please also put on separate waterproof boot covers), put on a disposable isolation gown (if required in the specific work zone) and face shield/powered air-purifying respirator(if required in the specific work zone) \rightarrow Put on outer disposable latex gloves



Protocol for Removing PPE:

Wash hands and remove visible bodily fluids/blood contaminants on the outer surfaces of both hands \rightarrow Wash hands replace outer gloves with new gloves \rightarrow Remove powered air-purifying respirator or self-priming filter-type full-face mask/mask (if used) \rightarrow Wash hands \rightarrow Remove disposable gowns along with outer gloves (if used) \rightarrow Wash hands and put on outer gloves \rightarrow Enter Removal Area No. ① \rightarrow Wash hands and remove protective clothing along with outer gloves (for gloves and protective clothing, turn inside out, while rolling them down) (note: if used, remove the waterproof boot covers with clothing) \rightarrow Wash hands \rightarrow Enter Removal Area No. ② \rightarrow Wash hands and remove goggles \rightarrow Wash hands and remove mask \rightarrow Wash hands and remove cap \rightarrow Wash hands and remove inner disposable latex gloves \rightarrow Wash hands and leave Removal Area No. ② \rightarrow Wash hands, take a shower, put on clean clothes and enter the clean area

2-Disinfection Procedures for COVID-19 Isolation Ward Area

2.1 Disinfection for Floor and Walls

- (1) Visible pollutants shall be completely removed before disinfection and handled in accordance with disposal procedures of blood and bodily fluid spills;
- (2) Disinfect the floor and walls with 1000 mg/L chlorine-containing disinfectant through floor mopping, spraying or wiping;
- (3) Make sure that disinfection is conducted for at least 30 minutes;
- (4) Carry out disinfection three times a day and repeat the procedure at any time when there is contamination.

2.2 Disinfection of Object Surfaces

- (1) Visible pollutants should be completely removed before disinfection and handled in accordance with disposal procedures of blood and bodily fluid spills;
- (2) Wipe the surfaces of objects with 1000 mg/L chlorine-containing disinfectant or wipes with effective chlorine; wait for 30 minutes and then rinse with clean water. Perform disinfection procedure three times a day (repeat at any time when contamination is suspected);
- (3) Wipe cleaner regions first, then more contaminated regions: first wipe the object surfaces that are not frequently touched, and then wipe the object surfaces that are frequently touched. (Once an object surface is wiped clean, replace the used wipe with a new one).

2.3 Air Disinfection

- (1) Plasma air sterilizers can be used and continuously run for air disinfection in an environment with human activity;
- (2) If there is no plasma air sterilizers, use ultraviolet lamps for 1 hour each time. Perform this operation three times a day.

2.4 Disposal of Fecal Matter and Sewage

- (1) Before being discharged into the municipal drainage system, fecal matter and sewage must be disinfected by treating with chlorine-containing disinfectant (for the initial treatment, the active chlorine must be more than 40 mg/L). Make sure the disinfection time is at least 1.5 hours;
- (2) The concentration of total residual chlorine in the disinfected sewage should reach 10 mg/L.

3-Disposal Procedures for Spills of COVID-19 Patient Blood/-Fluids

3.1 For spills of a small volume (< 10 mL) of blood/bodily fluids:

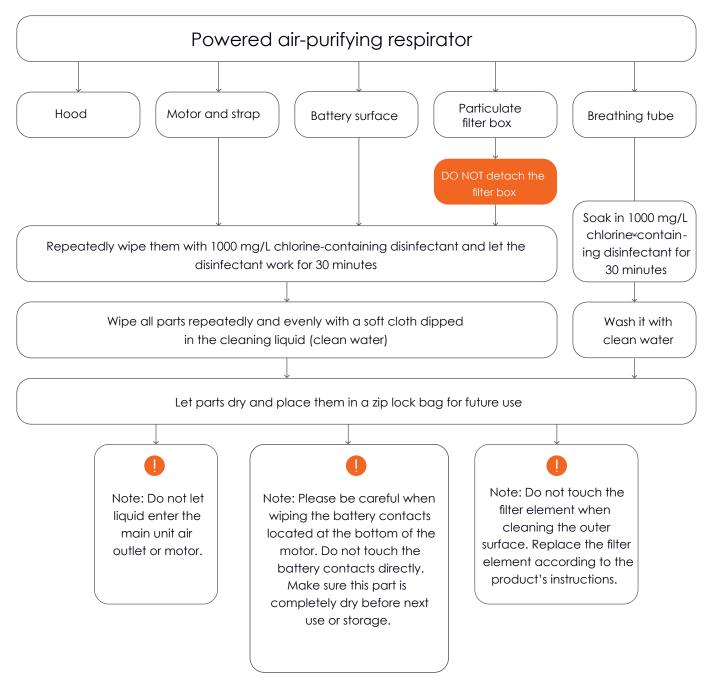
- (1) Option 1: The spills should be covered with chlorine-containing disinfecting wipes (containing 5000 mg/L effective chlorine) and carefully removed, then the surfaces of the object should be wiped twice with chlorine-containing disinfecting wipes (containing 500 mg/L effective chlorine);
- (2) Option 2: Carefully remove the spills with disposable absorbent materials such as gauze, wipes, etc., which have been soaked in 5000 mg/L chlorine -containing disinfecting solution.

3.2 For spills of a large volume (> 10 mL) of blood and bodily fluids:

- (1) First, place signs to indicate the presence of a spill;
- (2) Perform disposal procedures according to Option 1 or 2 described below:
- ① Option 1: Absorb the spilled fluids for 30 minutes with a clean absorbent towel (containing peroxyacetic acid that can absorb up to 1 L of liquid per towel) and then clean the contaminated area after removing the pollutants.
- ② Option 2: Completely cover the spill with disinfectant powder or bleach powder containing water-absorbing ingredients or completely cover it with disposable water-absorbing materials and then pour a sufficient amount of 10,000 mg/L chlorine-containing disinfectant onto the water-absorbing material (or cover with a dry towel which will be subjected to high-level disinfection). Leave for at least 30 minutes before carefully removing the spill.
- (3) Fecal matter, secretions, vomit, etc. from patients shall be collected into special containers and disinfected for 2 hours by a 20,000 mg/L chlorine-containing disinfectant at a spill-to-disinfectant ratio of 1:2.
- (4) After removing the spills, disinfect the surfaces of the polluted environment or objects.
- (5) The containers that hold the contaminants can be soaked and disinfected with 5,000 mg/L active chlorine-containing disinfectant for 30 minutes and then cleaned.
- (6) The collected pollutants should be disposed of as medical waste.
- (7) The used items should be put into double-layer medical waste bags and disposed of as medical waste.

4-Disinfection of COVID-19 Related Reusable Medical Devices

4.1 Disinfection of powered air-purifying respirator



Note: The disinfection procedures for protective hood described above are only for reusable protective hoods (excluding disposable protective hoods).

4.2 Cleaning and Disinfection Procedures for Digestive Endoscopy and Bronchofibroscopy

- (1) Soak the endoscope and reusable valves in 0.23% peroxyacetic acid (confirm the concentration of the disinfectant before use to make sure it will be effective);
- (2) Connect the perfusion line of each channel of the endoscope, inject 0.23% peroxyacetic acid liquid into the line with a 50 mL syringe until fully filled, and wait for 5 minutes;
- (3) Detach the perfusion line and wash each cavity and valve of the endoscope with a disposable special cleaning brush;
- (4) Put the valves into an ultrasonic oscillator containing enzyme to oscillate it. Connect the perfusion line of each channel with the endoscope. Inject 0.23% peroxyacetic acid into the line with a 50 mL syringe and flush the line continuously for 5 minutes. Inject air to dry it for 1 minute;
- (5) Inject clean water into the line with a 50 mL syringe and flush the line continuously for 3 minutes. Inject air to dry it for 1 minute;
- (6) Perform a leakage test on the endoscope;
- (7) Put in an automatic endoscopic washing and disinfection machine. Set a high level of disinfection for treatment;
- (8) Send the devices to the disinfection supply center to undergo sterilization with ethylene oxide.

4.3 Pre-treatment of Other Reusable Medical Devices

- (1) If there are no visible pollutants, soak the device in 1000 mg/L chlorine -containing disinfectant for at least 30 minutes;
- (2) If there are any visible pollutants, soak the device in 5000 mg/L chlorine -containing disinfectant for at least 30 minutes;
- (3) After drying, pack and fully enclose the devices and send them to the disinfection supply center.

5-Disinfection Procedures for Infectious Fabrics of Suspected or Confirmed Patients

5.1 Infectious fabrics

- (1) Clothes, bed sheets, bed covers and pillowcases used by patients;
- (2) Ward area bed curtains;
- (3) Floor towels used for environmental cleaning.

5.2 Collection methods

- (1) First, pack the fabrics into a disposable water-soluble plastic bag and seal the bag with matching cable ties;
- (2) Then, pack this bag into another plastic bag, seal the bag with cable ties in a gooseneck fashion;
- (3) Finally, pack the plastic bag into a yellow fabric bag and seal the bag with cable ties;
- (4) Attach a special infection label and the department name. Send the bag to the laundry room.

5.3 Storage and washing

- (1) Infectious fabrics should be separated from other infectious fabrics (non-COVID-19) and washed in a dedicated washing machine;
- (2) Wash and disinfect these fabrics with chlorine-containing disinfectant at 90 oC for at least 30 minutes.

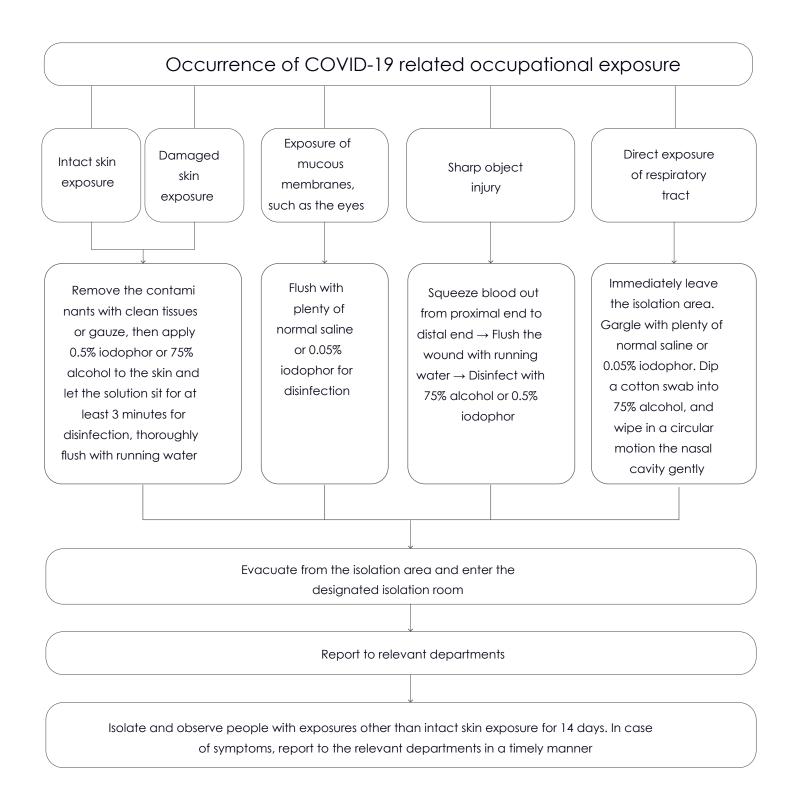
5.4 Disinfection of transport tools

- (1) Special transport tools should be used specifically for transporting infectious fabrics;
- (2) The tools shall be disinfected immediately each time after being used for transporting infectious fabrics;
- (3) The transport tools should be wiped with chlorine-containing disinfectant (with 1000 mg/L active chlorine). Leave disinfectant for 30 minutes before wiping the tools clean with clean water.

6-Disposal Procedures for COVID-19 Related Medical Waste

- (1) All waste generated from suspected or confirmed patients shall be disposed of as medical waste;
- (2) Put the medical waste into a double-layer medical waste bag, seal the bag with cable ties in a gooseneck fashion and spray the bag with 1000 mg/L chlorine containing disinfectant;
- (3) Put sharp objects into a special plastic box, seal the box and spray the box with 1000 mg/L chlorine-containing disinfectant;
- (4) Put the bagged waste into a medical waste transfer box, attach a special infection label, fully enclose the box and transfer it;
- (5) Transfer the waste to a temporary storage point for medical waste along a specified route at a fixed time point and store the waste separately at a fixed location;
- (6) The medical waste shall be collected and disposed of by an approved medical waste disposal provider.

7- Procedures for Taking Remedial Actions against Occupational Exposure to COVID-19



- (1) Skin exposure: The skin is directly contaminated by a large amount of visible bodily fluids, blood, secretions or fecal matter from the patient.
- (2) Mucous membrane exposure: Mucous membranes, such as the eyes and respiratory tract are directly contaminated by visible bodily fluids, blood, secretions or fecal matter from the patient.
- (3) Sharp object injury: Piercing of the body by sharp objects that were directly exposed to the patient's bodily fluids, blood, secretions or fecal matter.
- (4) Direct exposure of respiratory tract: Falling off of a mask, exposing the mouth or nose to a confirmed patient (1 miter away) who is not wearing a mask.

8-Surgical Operations for Suspected or Confirmed Patients

8.1 Requirements for Operation Rooms and Staff PPE

- (1) Arrange the patient in a negative pressure operating room. Verify the temperature, humidity and air pressure in the operation room;
- (2) Prepare all required items for the operation and use disposable surgical items if possible;
- (3) All surgical personnel (including surgeons, anesthesiologists, hand-washing nurses, and charge nurses in operating room) should put on their PPE in the buffer room before entering the operating room: Put on double caps, medical protective mask (N95), medical goggles, medical protective clothing, boot covers, latex gloves, and powered air-purifying respirator;
- (4) The surgeons and the hand-washing nurses should wear disposable sterile operating clothes and sterile gloves in addition to the PPE as mentioned above:
- (5) Patients should wear disposable caps and disposable surgical masks according to their situation;
- (7) The charge nurses in the buffer room are responsible for delivering items from the buffer area to the negative pressure operating room;
- (8) During the operation, the buffer room and the operating room shall be tightly closed, and the operation must be carried out only if the operation room is under negative pressure;
- (9) Irrelevant personnel shall be excluded from entering the operating room.

8.2 Procedures for Final Disinfection

- (1) Medical waste shall be disposed of as COVID-19 related medical waste;
- (2) Reusable medical devices shall be disinfected according to the disinfection procedures of SARS-CoV-2 related reusable medical devices;
- (3) Medical fabrics shall be disinfected and disposed of according to the disinfection procedures for SARS-CoV-2 related infectious fabrics;
- (4) Surfaces of objects (instruments and devices including device table, operating table, operating bed, etc.);
- 1) Visible blood/bodily fluid pollutants shall be completely removed before disinfection (handled in accordance with disposal procedures of blood and bodily fluid spills).
- 2 All surfaces shall be wiped with a disinfectant containing 1000 mg/L active chlorine and allowed to sit for 30 minutes with the disinfectant.
- (5) Floors and walls:
- ① Visible blood/bodily fluid pollutants shall be completely removed before disinfection (handled in accordance with disposal procedures of blood and bodily fluid spills).
- ② All surfaces shall be wiped with a disinfectant containing 1000 mg/L active chlorine and allowed to sit for 30 minutes with the disinfectant.
- (6) Indoor air: Turn off the fan filter unit (FFU). Disinfect the air by irradiation by ultraviolet lamp for at least 1 hour. Turn on the FFU to purify the air automatically for at least 2 hours.

9-Procedures for Handling Bodies of Deceased Suspected or Confirmed Patients

- (1) Staff PPE: The staff must make sure they are fully protected by wearing work clothes, disposable surgical caps, disposable gloves and thick rubber gloves with long sleeves, medical disposable protective clothing, medical protective masks (N95) or powered air purifying respirators (PAPRs), protective face shields, work shoes or rubber boots, waterproof boot covers, waterproof aprons or waterproof isolation gowns, etc.
- (2) Corpse care: Fill all openings or wounds the patient may have, such as mouth, nose, ears, anus and tracheotomy openings, by using cotton balls or gauze dipped in 3000-5000 mg/L chlorine-containing disinfectant or 0.5% peroxyacetic acid.
- (3) Wrapping: Wrap the corpse with a double-layer cloth sheet soaked with disinfectant, and pack it into a double-layer, sealed, leak-proof corpse wrapping sheet soaked with chlorine containing disinfectant.
- (4) The body shall be transferred by the staff in the isolation ward of the hospital via the contaminated area to the special elevator, out of the ward and then directly transported to a specified location for cremation by a special vehicle as soon as possible.
- (5) Final disinfection: Perform final disinfection of the ward and the elevator.

V. DIGITAL SUPPORT FOR EPIDEMIC PREVENTION AND CONTROL

1-Reduce the Risk of Cross Infection when Patients Seek Medical Care

- (1) Guide the public to get access to non-emergency services such as chronic diseases treatment online so as to decrease the number of visitors in healthcare facilities. Doing so minimizes the risk of cross infection.
- (2) Patients who must visit healthcare facilities should make an appointment through other means, including Internet portals, which provides necessary guidance in transportation, parking, arrival time, protective measures, triage information, indoor navigation, etc. Collect comprehensive information online by patients in advance to improve the efficiency of diagnosis and treatment and limit the duration of the patient's visit.
- (3) Encourage patients to take full advantage of digital self-service devices to avoid contact with others so as to lower the risk of cross infections.

2- Lower Work Intensity and Infection Risk of Medical Personnel

- (1) Collect shared knowledge and experience of experts through remote consultation and multidiscipline team (MDT) to offer the optimum therapeutics for difficult and complicated cases.
- (2) Take mobile and remote rounds to lower unnecessary exposure risks and work intensity of medical personnel while saving protective supplies.
- (3) Access the patients' latest health conditions electronically through health QR codes
- (note: everyone is required to obtain a GREEN code through the health QR system to travel around the city) and online epidemiological questionnaires in advance to provide triage guidance to the patients, especially those with fever or suspected cases, while effectively preventing the risk of infection.
- (4) Electronic health records of patients in fever clinics and the CT imaging Al system for COVID-19 can help reduce the work intensity, quickly identify highly-suspected cases and avoid missed diagnoses.

3- Rapid Response to Emergency Needs of COVID-19 Containment

- (1) Basic digital resources required by a cloud-based hospital system allows for immediate usage of the information systems needed for emergency response to the epidemic, such as the digital systems equipped for newly established fever clinics, fever observation rooms and isolation wards.
- (2) Utilize the hospital information system based on the Internet infrastructure frame to conduct online training for healthcare workers and one-click deployment system, and to facilitate the operation and support engineers to perform remote maintenance and new functions update for medical care.



