**Infectious Disease and Pandemic Cleaning Guidelines**

26 March 2020

[**Purpose** 3](#_Toc35271409)

[**Definitions** 3](#_Toc35271410)

[**1.** **Cleaning Guidelines** 4](#_Toc35271411)

[**1.1.** **Cleaning Level Guidelines** 4](#_Toc35271412)

[**1.1.1.** **Level I: No Suspect or Confirmed Cases in Building** 4](#_Toc35271413)

[**1.1.2.** **Level II: Elevated Concern** 4](#_Toc35271414)

[**1.1.3.** **Level III: Suspect or Confirmed Case in Proximate Geographical Area** 5](#_Toc35271415)

[**1.1.4.** **Level IV: Suspected or Confirmed Case in Building** 6](#_Toc35271416)

[**2.** **LEVEL IV CLEANING GUIDANCE** 6](#_Toc35271417)

[**Appendix 1 – Location Cleaning Checklist & Products** 8](#_Toc35271418)

[**Appendix 2 – Janitorial Cleaning Guidelines and Cost Increases** 9](#_Toc35271419)

# **Purpose**

The objective of these Cleaning Guidelines are:

* to establish a systematic approach for cleaning and disinfection when dealing with an infectious disease, and
* to provide a cleaning and disinfection protocol in response to Country or World Health Organization (WHO) declaration of Pandemic.

This document is based on best practice guidelines from the Centre of Health Protection, Department of Health, Hong Kong, U.S. Centers for Disease Control and WHO Guidance on Pandemic and Infectious Disease.

These cleaning guidelines provide a systematic approach for dealing with pandemics and infectious disease from inception, i.e., pandemic notification or case identification, through closure.

# **DEFINITIONS**

**Pandemic**

A pandemic is an outbreak of an infectious disease occurring over a wide geographic area (multiple continents) and affecting an exceptionally high proportion of the population. Declaration of pandemic situation is notified by WHO, local governments and other communicable disease agencies.

**Non-Pandemic Infectious Disease**

Infectious diseases are disorders caused by organisms, such as bacteria, viruses, fungi or parasites. Many organisms live in and on our bodies. They're normally harmless or even helpful, but under certain conditions, some organisms may cause disease.

# **Cleaning guidelines**

There are five modes of transmission of infectious diseases. They are direct contact, indirect contact, air-borne, fecal-oral borne, and vector borne. The cleaning procedures required for an infectious disease are determined based on the modes of transmission and are intended to remove contamination risk by direct or indirect contact.

General Cleaning Practices: for shared equipment areas, consider:

* Educating employees about the means by which the virus is transmitted and responsibility specific to the custody and care of utilized workstation areas.
* Making hand-sanitizers, sanitizing wipes, and other hygienic supplies readily available.
* Instilling hygienic practices of wiping down common surfaces prior to touching them.
* Cleaning mice, keyboards, headphones/headsets.
* Limiting contact with shared items.

For common building food service areas, consider:

* Increasing kitchen staff personal protective equipment (PPE) requirements such as filtering face pieces, smocks and rubber gloves, as deemed appropriate
* Limiting options for self-service; restricting food service to kitchen staff wearing PPE.
* Eliminating buffet-style or similar “open” food options.
* Limiting food offerings to pre-wrapped food items that are safe from being touched by patrons or exposed to patron sneezes and coughs.

## **Cleaning Level Guidelines**

* + 1. **Level I: No suspect or confirmed cases in building**
* Follow regular daily cleaning practices
* Level II minimum cleaning requirements listed in 1.1.2 may be implemented if the OpCo requests additional cleaning, and has agreed to the additional associated cost.
	+ 1. **Level II: Elevated Concern (e.g. high prevalence in local region)**
* General office cleaning – 1 time per day
* Common area\* cleaning – 4 times per day (Recommended concentrated cleaning at peak times, i.e., every 2 hours between 9:00 am and 6:00 pm)
* Restroom cleaning – 4 times per day (every 2 hours between 9:00 am and 6:00 pm)
* Hand sanitizers in entrances and lobbies
* Touch points such as garage access buttons, door handles, elevator call buttons, turnstiles, handrails, elevator doors, touchscreens, restroom fixtures, restroom partition latches, refrigerator and microwave handles, and keypads in meeting rooms will be cleaned at least 4 times per day. (See Appendix 1 for a list of additional touch points to be considered.)
* Disinfect floor mats – daily
* Pour 1:99 bleach solution into the u-channel and floor drains on all floors.
* A daily supply of approved N95 (minimum standard) respirators for cleaning and operational staff recommended on a 2 per person per day or via site by site risk assessment, as available and upon recommended use. Training to ensure proper use is required.
* AHU’s and PAU’s sterilized – 2 x monthly or in accordance with local guidance.
* Refer to Appendix 1 for detailed cleaning practices and preferred product lists for surface cleaning.

### **Level III: Suspect or Confirmed Case in Proximate Geographical Area**

* In most cases do not need to shut down entire facility
* Wait 24 hours before cleaning and disinfecting to minimize potential for other employees being exposed to respiratory droplets. If waiting 24 hours is not feasible, wait as long as possible
* During this waiting period, open outside doors and windows to increase air circulation in these areas.
* Always wear gloves and gowns appropriate for the chemicals being used when you are cleaning and disinfecting.
* You may need to wear additional personal protective equipment (PPE) depending on the setting and disinfectant product you are using
* General office cleaning – 2 times per day
* Common area\* cleaning – 6 times per day (Recommended every 90 minutes between 9:00 am and 6:00 pm)
* Restroom cleaning – 6-8 times per day (every hour between 9:00 am and 6:00 pm)
* Temperate monitoring of all staff, visitors, vendors and service providers entering premises to be undertaken where security provision and capability in scope.
* Health corner set-up to accommodate those showing symptoms via allocation of a first aid room or isolated restroom facility under direction of local authority
* Respirator disposal through normal rubbish bins unless advised by government other disposal is required and special respirator disposal bins established
* Hand sanitizers available in pantries and meeting rooms, and entranceways to property, residential areas
* OpCo review to consider restricting access to certain floors for visitors
* Pour 1:99 bleach solution into the u-channel and floor drains on all floors
* Refer to Appendix 1 for detailed cleaning practices lists for surface cleaning

\*Common areas are defined as meeting rooms, copy rooms, corridors, pantries, visitor areas, kitchen areas, elevator lobbies, mother’s rooms, medical room, quiet room, shower rooms and reception.

### **Level IV: Suspected or Confirmed Case in Building**

* No actions can be taken without consulting with your OpCo Chief Medical Officer or medical consultant and Human Resources Department.
* Cleaning is to be performed in consultation with the above.
* Establish a 100% stand-down of activities at the facility and control access until the site is deemed clear.

## **Relaxation of the Cleaning Guidelines**

Where sites implement alternative working polices, such as home or remote working or restricted access, cleaning guidelines can be maintained at frequencies at lower alert levels. OpCo should also be consulted. Where alert status in a country reaches “emergency,” as alternative working policies are implemented, conduct one-time office aerosol disinfection, i.e., fogging, following specific direction of local health authorities.

# **LEVEL iV CLEANING GUIDANCE**

At the direction of your OpCo or Danaher, cleaning of an employee workstation should be conducted for employees and building users who are highly suspected of or confirmed to be infected with a pandemic virus. The employee’s workstation, mice, keyboard, phone or headset and desk should be cleaned and disinfected. This should include cleaning and disinfection of the immediate surrounding area. Additional disinfection of common areas which have had potential contact by an employee or building user who is a highly suspected or a confirmed case, i.e., washrooms, shower room.

At the direction of your OpCo and Danaher, and for highly suspected cases of pandemic virus or infectious diseases, apply the following disinfectants: \*

* Use 1:49 bleach solution or other approved disinfectant to be used to clean the area, including workstation and desk phone and other property/office furniture or
* Use 1:99 bleach solution or 70% alcohol or other approved disinfectant to clean the property/office area general surfaces.
* Soft furnishings i.e. curtain and sofa cushion in a property/office use 70-80C/158-176F hot water with normal cleansing agent to wash.
* Pour 1:99 bleach solution into the u-channel and floor drains on all floors.

For carpet cleaning use a high efficiency vacuum cleaner with filter media e.g. HEPA, to clean. If carpet is obviously contaminated, use 70% alcohol or other approved disinfectant to soak the contaminated area and further clean by steam cleaner.

**Soft (Porous) Surfaces:** For soft (porous) surfaces such as carpeted floor, rugs, and drapes, remove visible contamination if present and clean with appropriate cleaners indicated for use on these surfaces. After cleaning:

* If the items can be laundered, launder items in accordance with the manufacturer’s instructions using the warmest appropriate water setting for the items and then dry items completely.
* Otherwise, use products [that are EPA-approved for use against the virus that causes COVID-19external icon](https://www.epa.gov/pesticide-registration/list-n-disinfectants-use-against-sars-cov-2) and that are suitable for porous surfaces

**Electronics**: For electronics such as tablets, touch screens, keyboards, remote controls, and ATM machines, remove visible contamination if present.

* Follow the manufacturer’s instructions for all cleaning and disinfection products.
* Consider use of wipeable covers for electronics.
* If no manufacturer guidance is available, consider the use of alcohol-based wipes or sprays containing at least 70% alcohol to disinfect touch screens. Dry surfaces thoroughly to avoid pooling of liquids.

**Linens, Clothing, and Other Items That Go in the Laundry**

* In order to minimize the possibility of dispersing virus through the air, do not shake dirty laundry.
* Wash items as appropriate in accordance with the manufacturer’s instructions. If possible, launder items using the warmest appropriate water setting for the items and dry items completely. Dirty laundry that has been in contact with an ill person can be washed with other people’s items.
* Clean and disinfect hampers or other carts for transporting laundry according to guidance above for hard or soft surfaces

\* spray disinfection can be 0.2% to 0.5% peroxyacetic acid solution, 500mg/L to 1000mg/L (1:100-1:50) chlorine disinfectant solution or 200mg/L to 500mg/L or chlorine dioxide spray, sprayed with chlorine solution or other approved disinfectant.

#

# **Appendix 1 – Location cleaning Checklist & Products**

Always implement measures to minimize the transmission of the virus through environmental sources, specifically hard surfaces or “touch points”.

Touch points may include:

* Garage access buttons
* Hand rails
* Door knobs/handles
* Elevator buttons
* Sinks and Faucets
* Counter tops
* Window Sills
* Light Switches
* Equipment controls
* Cabinet and file drawer knobs/handles.
* Vending machines
* Chair arms
* Copier/printer/fax control buttons

For common areas sanitizing commonly touched surfaces such as:

* arms on chairs
* tabletops
* doorknobs
* countertop
* coffee pots
* refrigerator / microwave /dishwasher handles
* vending surfaces
* water dispensers

See [US EPA](https://www.epa.gov/coronavirus) for a list of approved cleaning agents for viral pathogens including Human Cornavirus and SARS-CoV-2.

Associates outside the US should check with their national environmental agency for a similar list of locally-available products.

#

# **Appendix 2 – janitorial Cleaning guidelines and cost increases**

Below is a guide to potential cost increases associated with each level of cleaning. OpCo’s should apply DBS principles and Indirect Sourcing best practices to minimize cost increases.

