



Herefordshire and  
Worcestershire  
Clinical Commissioning Group

COVID-19

**Fans, Ice & Air**

**Conditioning Guidance**

For Care Homes



## **Fans** Including Portable & ceiling fans

**Portable fans have been linked to cross infection in some health and social care facilities. Dust and debris can naturally accumulate within the internal body of the blades of fans and this provides a reservoir for micro-organisms.**

**Procurement, scheduled cleaning & decontamination and maintenance policies must be produced and kept under review.**

### **Risk Assessment**

All portable fans used should be clinically risk assessed for each use and reuse. The risk assessment should address the following:

- Portable fans are not recommended for use during airborne outbreaks of infection or when a patient is known or suspected to have an infectious agent e.g. Clostridium difficile, MRSA, Coronavirus, Norovirus. This will include the use of fans on the nurses' station and in communal areas.
- Alternative methods of cooling have been considered.
- The use of the fan is of benefit to the patient/resident/service user's clinical condition and/or comfort.

### **Portable fans should NOT be used in:**

- High risk areas including Operating Rooms.
- In areas where there are immune-compromised patients/residents.
- Areas where sterile supplies are stored.
- Areas where the reprocessing of medical devices takes place e.g. endoscope reprocessing, dental instrument reprocessing etc.

### **If a portable fan is to be used, then:**

- The fan should be positioned so the air flow is directed at the resident.
- The fan should be positioned at resident's bed/chair level or higher.
- The flow of air is positioned so as not to flow directly at the door or entrance to the room or across environmental surfaces. Ideally the flow should be directly upwards toward the ceiling avoiding aim directly at smoke detector systems.
- Ensure the flow of air does not blow directly into a resident's face or on to open wounds.
- In non-resident areas such as nursing stations ensure the airflow is directed within the area.

### **Fans must be turned off before the following activities take place:**

- Any sterile or aseptic procedure e.g. cannulation, catheterisation, dressing changes.
- Any procedure that may result in splashes of bodily fluids.

### **Cleaning & Decontamination**

**Consideration should be given to whether the fan can be adequately decontaminated for safe reuse. Any portable fans determined by a risk assessment to present an infection risk should be removed from use.**

### **All portable fans used in health and social care facilities:**

- Should be dedicated to individual use
- Should be removed from the area immediately and decontaminated after each individual use as per local Cleaning and Disinfection Policy.
- Should be on the routine cleaning schedule
- Bladeless fans contain filters which must be cleaned and replaced as per manufactures instructions.
- Should be included in planned preventative maintenance and Portable Appliance Testing.
- Hand hygiene should be performed before and after handling a fan to prevent contamination.



# ICE MACHINES

**Ice is used in healthcare for numerous purposes, e.g., cooling drinks, ice packs, for patients on restricted fluids and culinary purposes. Research has implicated ice making machines in health care associated infection. Sources of contamination are seeding from mains water supply, faulty plumbing, irregular cleaning and contaminants from hands.**

- Ideally, machines that dispense ice directly into portable containers at the touch of a control or 'Hands Free' shall be purchased to reduce potential for contamination
- Recycling of excess water into the reservoir or ice compartment is not recommended. Machines must be plumbed directly into the main water supply.
- Machines must be installed in strict accordance with manufacture's guidance and regulations.
- A U-bend and break in the drain is desirable to prevent reflux.
- There should be adequate separation of air inlet and air outlet in the heat exchange mechanism to permit efficient cooling. The placement of the machine should be such that these areas are not obstructed.
- Maintenance schedules should be in place to ensure that the machine is maintained as per manufacturer's instructions. Maintenance records should be kept.

## Use:

- Decontaminate hands prior to dispensing ice.
- Ice must not be handled with bare hands or returned to the storage compartment once removed.
- A smooth and impervious scoop must be solely available for the machine & must be kept on an impervious tray or other easily cleaned receptacle.
- Hands must be washed before handling the scoop.
- Scoops must be rinsed in clean water after each use and dried using disposable paper towel.
- For machines that dispense ice directly into portable containers at the touch of a control, hands must be decontaminated prior to dispensing ice.

## General cleaning/maintenance:

- Ice Machines must be incorporated into the cleaning schedule.
- Clean all exterior surfaces according to manufacturer's instructions.
- All parts of the ice machine that meet with water or ice, must be cleaned according to manufacturer's instructions. Any ice cubes within the storage compartment must be discarded before cleaning.
- Visually inspect ice machines daily and report any signs of mould.
- The scoop must be cleaned after each use & allowed to dry and returned to its tray/receptacle.
- Do not store food or other items in the ice machines.



# PORTABLE AIR CONDITIONING UNITS

Air-conditioning systems can be part of integrated Heating, Ventilation and Air-Conditioning (HVAC) systems or stand-alone, providing cooling/warming and dehumidification. Stand-alone systems usually recirculate the air without mixing it with outdoor air.

Direct air flow should be diverted away from groups of individuals to avoid pathogen dispersion from infected subjects and transmission.

## Best practice recommendations:

- The introduction or use of portable air conditioning units should be risk assessed prior to use following evaluation of safety, maintenance and management care requirements.
- Portable air conditioning units typically incorporate internal recirculation air filters and a drainage system to remove condensate from the cooling coil. These components can become contaminated if they are not cleaned and maintained properly. Once contaminated, air conditioning units may spread healthcare associated pathogens leading to severe infections or outbreaks.
- If portable bedside air conditioning units are used, hand hygiene must be performed when cleaning, handling, or maintaining any of the air conditioning unit components. Appropriate PPE should also be worn. Please follow the manufacturer's instructions on how to clean, disinfect and maintain the air conditioning unit on a scheduled basis (e.g., daily, weekly, monthly, etc.)
- All portable units must be inspected and thoroughly cleaned before being placed into use. Units that are to be used within areas where immuno-compromised patients/residents/service users will, unless new, need to have bacterial fumigation before being deployed.
- Units that have been used in isolation rooms, cohorted areas or areas containing symptomatic patients/residents/service users should be fumigated before being used in other locations or returned to store or the hirer.
- Air conditioning units employing an internal water reservoir and wick to promote evaporative cooling **should not** used as reservoirs of water are an infection risk.

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