



May 6, 2020

## DISINFECTION USING A HANDHELD SPRAYER STANDARD OPERATING PROCEDURES

### I. APPLICABLE TO:

This Standard Operating Procedure is applicable to the inmate workers.

### II. PROCEDURES:

- A. The Department of Public Safety and Correctional Services (DPSCS) continues to follow guidance from The Centers for Disease Control and Prevention (CDC), the Maryland Department of Health (MDH), and the Occupational Safety and Health Administration (OSHA).
- B. The Infection control guidance below is applicable to all types of correctional facilities.
1. The handheld sprayer is to be used when disinfecting “affected” areas where an individual who is suspected of having, or has tested positive for a contagion such as COVID-19 or influenza has been held, housed, worked, showered, or otherwise entered.
  2. The handheld sprayer may be used to disinfect non-porous surfaces and mattresses (e.g. Common non-porous materials include stainless steel, laminate, glass, varnished wood, porcelain, and a wide variety of tile and ridged plastic materials.)
- C. **Prior to entering the affected area, the worker must:**
1. **Perform proper hand hygiene** using soap and water, or if not available, an alcohol-based hand sanitizer.
  2. Identify and gather the proper personal protective equipment (PPE) to don.
  3. **Put on isolation gown.** Ensure choice of gown size is correct (based on training). Tie all of the ties on the gown. Assistance may be needed by other personnel.
  4. **Put on a facemask.** Mask ties should be secured on crown of head (top tie) and base of neck (bottom tie). If mask has loops, hook them appropriately around your ears.
  5. **Put on face shield or approved goggles.** Face shields provide full face coverage.

Goggles also provide excellent protection for eyes, but fogging is common.

6. **Perform hand hygiene** before putting on gloves. Put on glove. Gloves should cover the cuff (wrist) of gown.
7. Once the PPE has been properly donned, the worker may now enter the area to be cleaned.

**D. Operation of the Handheld Sprayer.**

1. Filling the sprayer's tank:
  - a. Turn the pump handle counterclockwise and remove pump;
  - b. Prepare spray solution following all directions and safety warnings on the chemical label;
  - c. Fill the tank to no more than the proper gallon marker—**DO NOT OVERFILL**;
  - d. Check the pump to ensure that no debris is stuck to the barrel; and
  - e. Replace pump in tank and tighten securely.
2. Pressurize the Pump and Spray.
  - a. Turn pump handle clockwise to tighten. Push handle down, turn ¼ turn counterclockwise to release;
  - b. Pump until you feel resistance;
  - c. Push handle down, turn clockwise to lock;
  - d. Begin spraying the affected area(s); and
  - e. Re-pump sprayer as required to maintain spray force.
3. Fatigue-Free Spraying.
  - a. For constant spraying, push down on the shut-off handle and move locking mechanism away from you.
  - b. To release, squeeze handle and moving the locking mechanism back toward you.
4. No sooner than 10 minutes after application of the disinfecting agent, wipe down the hard surfaces, as appropriate.
5. To Release Pressure:

- a. Use the pressure release valve, lift and hold the cap until air is completely exhausted, OR, turn the valve slowly counterclockwise until you hear air escaping and wait until air is completely exhausted; and
  - c. Stay away from the sprayer until all air has escaped.
6. Attach the wand to the appropriate dock clip.
7. When the disinfection procedures are completed for the day, the worker shall:
- a. Rinse the tank thoroughly with water only, empty, and refill with water. Follow Filling, Pressurizing and Spraying Instructions, except pump unit only 8-10 strokes.
  - b. Rinse the wand and nozzle are thoroughly with water after each use.
  - c. Open the shut-off and allow water to run through the discharge assembly.
  - d. Release pressure (Follow Pressure Release Instructions in # 5), remove pump, and empty sprayer.
  - e. Store sprayer tank upside down, with pump removed, in a warm dry location.
  - f. Periodically oil the pump by dropping 10-12 drops of light oil down pump rod through opening in cover.

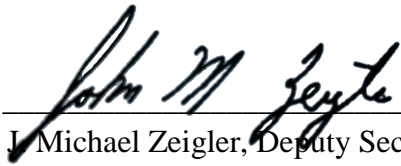
**E. After exiting the affected area:**

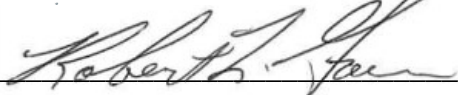
1. **Remove gloves.** Ensure glove removal does not cause additional contamination of hands. Gloves can be removed using more than one technique (e.g., glove-in-glove or bird beak).
2. **Remove gown.** Untie all ties (or unsnap all buttons). Some gown ties can be broken rather than untied. Do so in gentle manner, avoiding a forceful movement. Reach up to the shoulders and carefully pull gown down and away from the body. Rolling the gown down is an acceptable approach. Dispose in trash receptacle.
3. **Perform proper hand hygiene.**
4. **Remove face shield or goggles.** Carefully remove face shield or goggles by grabbing the strap and pulling upwards and away from head. Do not touch the front of face shield or goggles.
5. **Remove and discard respirator** (or facemask if used instead of respirator). Do

not touch the front of the respirator or facemask.

- a. **Respirator:** Remove the bottom strap by touching only the strap and bring it carefully over the head. Grasp the top strap and bring it carefully over the head, and then pull the respirator away from the face without touching the front of the respirator.
- b. **Facemask:** Carefully untie (or unhook from the ears) and pull away from face without touching the front.

6. **Perform proper hand hygiene again** after removing the respirator/facemask and before putting it on again if your workplace is practicing reuse

III. **APPROVED BY:**   
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V. **DISTRIBUTION**

- A
- D – Housing Officers
- L
- S – Senior Executive Team, Occupational and Employee Health, Office of Clinical Services