

TML\MSH Microbiology Department Policy & Procedure Manual	<b>Policy # MI\LS\34\02</b>	Page 1 of 4
Section: <b>Laboratory Safety Manual</b>	Subject Title: <b>Laboratory Disinfectants</b>	
Issued by: <b>LABORATORY MANAGER</b>	Original Date: April 20, 2001	
Approved by: Laboratory Director	Revision Date: October 22, 2003	

**Policy:**

Biological hazards are present in clinical laboratories. The risk of exposure and subsequent infection by these agents can be significantly reduced through the use of specific protocols for decontamination/cleaning/disinfection of each piece of equipment after spills, before servicing, and at the end of each shift.

**Purpose:**

The principle is to clean and disinfect. Some compounds clean only, some disinfect only and some do both.

**Virox** is a new cleaner and disinfectant recommended by MSH that may be used for most disinfecting purposes. It is non-corrosive and non-irritating. It comes as a liquid and in a disposable wipe format (user friendly).

**Responsibility:**

Management and employees

**Key Elements:**

- Application
- Recommended Product(s)
- Ordering Information
- Preparation, Procedure & Precautions

**Related Documents:**

<a href="#"><u>LABORATORY SAFETY</u></a>	MI\LS\02\01
<a href="#"><u>GOOD LABORATORY PRACTICE - SUMMARY</u></a>	MI\LS\05\01
<a href="#"><u>BIOLOGICAL SPILL CONTROL</u></a>	MI\LS\27\01

TML\MSH Microbiology Department Policy & Procedure Manual	<b>Policy # MI\LS\34\v02</b>	Page 2 of 4
<b>Laboratory Safety Manual</b>		

**Procedure:**

<b>Application</b>	<b>Recommended Product(s)</b>	<b>Ordering Information</b>	<b>Preparation, Procedure &amp; Precautions</b>
<b>Benches</b>  <b>Biological safety cabinets</b>  <b>Centrifuges, metal surfaces, Autoloop</b>  <b>Microscopes</b>  <b>Telephone and keyboards / keyboard covers</b>	<b>Virox 5 Wipes RTU</b>  <b>Virox 5 RTU</b>	<b>Ready to use dispenser system</b> Virox 5 Wipes RTU (6" x 6.25") 160 / pail. Vendor code 50338 Hospital #701129  <b>Ready to use spray bottles</b> Virox 5 Ready to use (RTU). Vendor code 50309	Wipe surfaces. Allow to dry.  Spray surfaces. Wipe dry.
<b>Water baths</b>	Benzalkonium chloride 10%)	Media Room	Dilute 10mL in 4L of water. Clean and descale water bath.  Disinfect with wipes. Fill with deionized water.  Clean and disinfect a minimum of once a month.
<b>Pipettes</b>  <b>Test Tube Racks</b>	<b>Alcotab</b> Phosphate content 4%  <b>Divermax M9 Machine Dish Powder</b>	VWR  Stores	Add 2 tablets to the pipette washer. Mix and dissolve. Soak for 1 hr. Rinse with deionized water. Autoclaved if contaminated and then washed in dishwasher
<b>Floors</b>	<b>Hydrox</b>	Housekeeping orders from Stores - MSH - UHN	<b>Hydorx</b> is the hospital-approved cleaner and disinfectant for low-risk areas.

TML\MSH Microbiology Department Policy & Procedure Manual	<b>Policy # MI\LS\34\v02</b>	Page 3 of 4
<b>Laboratory Safety Manual</b>		

<b>Application</b>	<b>Recommended Product(s)</b>	<b>Ordering Information</b>	<b>Preparation, Procedure &amp; Precautions</b>
<b>Spilled (wet) or dried biological material</b>	<b>Hypochlorite 1%</b>	Stores  <b>Note:</b> Full strength sodium hypochlorite (Javax) is 5%, 50,000 mg/L free available chlorine.  Other forms of hypochlorite (e.g., Haztabs, stabilized solutions) are acceptable if they give the same amount of free available chlorine.	Dilute full strength sodium hypochlorite 1:5  Make up fresh daily <b>OR</b> Dilution is stable 1 month <b>if stored in a dark bottle.</b>  <ul style="list-style-type: none"> <li>Refer to <a href="#">BIOLOGICAL SPILL CONTROL</a> for procedure</li> </ul> <p>Hypochlorite is inactivated by organic matter. Remove as much blood / protein matter as possible before decontamination <b>or</b> use a concentration of disinfectant higher than 1%.</p>
<b>BacT/ALERT Cell Decontamination after Bottle Breakage</b>	<b>Hypochlorite 1%</b>		<ul style="list-style-type: none"> <li>Disable cell</li> <li>Insert absorbent material, such as gauze, into the cell to remove any remaining fluid</li> <li>Use caution around LED at bottom of cell</li> <li>Wipe cell with gauze soaked in <b>Hypochlorite 1%</b></li> <li>Let soaked gauze sit in cell for 15-30 minutes</li> <li>Remove gauze</li> <li>Wipe cell with gauze soaked in distilled water</li> <li>Let cell air dry</li> <li>Calibrate cell</li> <li>Enable the cell if it passes calibration</li> </ul>

TML\MSH Microbiology Department Policy & Procedure Manual	<b>Policy # MI\LS\34\v02</b>	Page 4 of 4
<b>Laboratory Safety Manual</b>		

<b>Application</b>	<b>Recommended Product(s)</b>	<b>Ordering Information</b>	<b>Preparation, Procedure &amp; Precautions</b>
<b>Broken Tube(s) in Centrifuge</b>	<b>Virox 5 RTU</b>	<b>Ready to use spray bottles</b> Virox 5 Ready to use (RTU). Vendor code 50309	<ol style="list-style-type: none"> <li>1. Turn off centrifuge</li> <li>2. If in sealed safety buckets, go to step 7; if in unsealed cups, inform others in vicinity and do not open the centrifuge for 30 minutes to allow aerosols to disperse or settle</li> <li>3. Slowly open centrifuge lid, remove all broken tubes, buckets, rotors, etc. to a basin of disinfectant which is non-corrosive; let stand for time recommended for selected disinfectant. Alternatively, these items may be autoclaved</li> <li>4. Place any unbroken capped specimens in disinfectant for 60 minutes and then remove, rinse, and process</li> <li>5. Wipe down the bowl of the centrifuge twice with disinfectant and rinse with water; dry</li> <li>6. Dispose of wipe-down cloths as infectious</li> <li>7. Remove sealed bucket to biological safety cabinet</li> <li>8. If any tubes are broken, leave in bucket, replace lid of bucket loosely and autoclave entire contents or place in disinfectant (see steps 3 &amp; 4)</li> </ol>
<b>Cleaning hands</b>	<b>Bactosol with Triclosan</b>  <b>Betadine</b> Providone iodine 7.5%  Alcohol-based antimicrobial hand rinse	Stores  Stores  Stores-various manufacturers	Use in areas where there is no hand-washing sink.