Caution: Federal (United States) law restricts this device to sale by or on the order of a physician.
CONTACT INFORMATION

To obtain additional information regarding your GlideScope® system or GlideRite DLT Stylet, please contact Verathon® Customer Care or visit verathon.com/support.

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Information in this manual may change at any time without notice. For the most up-to-date information, see the documentation available at verathon.com/product-documentation
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PRODUCT DESCRIPTION

The GlideRite® DLT Stylet was designed to help enable the placement of an endotracheal tube (also known as an ETT or ET tube). The rigidity of this reusable stylet helps the user manipulate the tube as desired for intubation. The stylet is for use in 6.0 mm and larger double-lumen ventilation tubes.

STATEMENT OF INTENDED USE

To provide support for a double-lumen endotracheal tube during intubation.

STATEMENT OF PRESCRIPTION

Caution: Federal (United States) law restricts this device to sale by or on the order of a physician.

NOTICE TO ALL USERS

Verathon® recommends that all users read this manual before using the GlideRite DLT Stylet. Failure to do so may result in injury to the patient, may compromise the performance of the stylet, and may void the warranty. Verathon recommends that new users:

- Obtain instruction from a qualified individual
- Practice using the stylet on a mannequin before clinical use
- Acquire clinical training experience on patients without airway abnormalities

WARNINGS

Warnings indicate that injury, death, or other serious adverse reactions may result from use or misuse of the device. Please heed the following warnings.

![WARNING]

**WARNING**

Do not allow the stylet to advance past the vocal cords; the endotracheal tube should be advanced off the stylet and into the airway. The stylet must not advance into the glottis under any circumstances.

![WARNING]

**WARNING**

During use, the stylet should not protrude beyond the end of the endotracheal tube.

![WARNING]

**WARNING**

Do not use if the product appears damaged; inspect before use.
<table>
<thead>
<tr>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td>Product is shipped nonsterile. Clean and high-level disinfect or sterilize before use.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td>The stylet is considered a semi-critical device that may come into contact with the airway. It must be thoroughly cleaned and undergo high-level disinfection or sterilization after each use.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ensure that you follow the manufacturer’s instructions for handling or disposing of the cleaning, disinfection, or sterilization solutions provided in this manual.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td>Because the product may be contaminated with human blood or body fluids capable of transmitting pathogens, all cleaning facilities must be in compliance with (U.S.) OSHA Standard 29 CFR 1910.1030 “Bloodborne Pathogens” or an equivalent standard.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td>Availability of cleaning, disinfection, and sterilization products varies by country, and Verathon® is unable to test products in every market. For more information, please contact Verathon Customer Care or your local representative. For contact information, visit verathon.com/support.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td>This product may only be cleaned, disinfected, or sterilized by using the approved processes provided in this manual. Cleaning, disinfection, and sterilization methods listed are recommended by Verathon based on efficacy or compatibility with component materials.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td>To reduce the risk of cytotoxic residual when cleaning with Metrex® CaviCide®, thoroughly rinse the component as instructed in this manual.</td>
</tr>
</tbody>
</table>
INTRODUCTION

The GlideRite DLT Stylet is specifically designed to work with GlideScope® video laryngoscopes. The angle of the GlideRite DLT Stylet complements the unique angle of the GlideScope instrument to help facilitate quick placement of a DLT endotracheal tube and to help reduce patient trauma.

Figure 1. GlideRite DLT Stylet with adult size blade

FEATURES

- Provides maneuverability for placement of a double-lumen endotracheal tube.
- The angle of the stylet complements the angle of adult-sized GlideScope blades.
- Rigid stainless-steel material maintains its shape throughout the intubation.
- Length of stylet fits 6.0 mm internal diameter (ID) or larger double-lumen endotracheal tubes.
- Tracheal lumen tube pin holds the double-lumen endotracheal tube in place throughout intubation.
- Reusable, once cleaned and high-level disinfected or sterilized.
USING THE STYLET

PROCEDURE 1. USE THE GLIDERITE DLT STYLET

Do not bend or attempt to reshape the stylet. The shape of the stylet is designed to complement the curve of GlideScope® video laryngoscopes.

1. Ensure the stylet has been high-level disinfected or sterilized. For more information, see Cleaning & Disinfecting on page 5.

2. Inspect the stylet for damage. If there is any damage, discard it and contact Verathon® Customer Care or your local representative to order a new stylet.

3. Load the GlideRite DLT Stylet into the double-lumen tube through the bronchial lumen. Do not permit the stylet to extend past the distal end of the tube.

4. Rotate the double-lumen tube in order to secure the tracheal lumen on the positioning pin. This changes the natural bend of the tube. The bronchial tip should now aim posteriorly while the tracheal channel is aimed anteriorly.

5. Place the DLT Stylet and tube at the glottic opening with the tracheal lumen facing anteriorly and the bronchial lumen pointing down the trachea. Retract the stylet 5–6 cm (2–3 3/8 in) with the tracheal lumen facing anteriorly and the bronchial lumen pointing down the trachea as it advances.

6. Completely remove the DLT Stylet and proceed with the intubation using your preferred technique and experience.
Do not let any contaminant(s) dry on the device. Bodily contaminants tend to become securely attached to solid surfaces when dried, making removal more difficult.

When using any of the solutions listed in this manual, read and comply with product use instructions in all applications.

**IMPORTANT**

Product is shipped nonsterile. Clean and high-level disinfect or sterilize before use.

The stylet is considered a semi-critical device that may come into contact with the airway. It must be thoroughly cleaned and undergo high-level disinfection or sterilization after each use.

Ensure that you follow the manufacturer’s instructions for handling or disposing of the cleaning, disinfection, or sterilization solutions provided in this manual.

Because the product may be contaminated with human blood or body fluids capable of transmitting pathogens, all cleaning facilities must be in compliance with (U.S.) OSHA Standard 29 CFR 1910.1030 “Bloodborne Pathogens” or an equivalent standard. For more information, visit www.osha.gov.

This product may only be cleaned, disinfected, or sterilized by using the approved processes provided in this manual. Cleaning, disinfection, and sterilization methods listed are recommended by Verathon® based on efficacy or compatibility with component materials.

To reduce the risk of cytotoxic residual when cleaning with Metrex® CaviCide®, thoroughly rinse the component as instructed in this manual.
The GlideRite® DLT Stylet is a reusable device that requires cleaning and either high-level disinfection or sterilization prior to first use and between uses. This chapter provides instructions for the following:

- **Procedure 1: Clean the Stylet**—Clean the stylet and prepare it for either high-level disinfection or sterilization.
- **Procedure 2: Disinfect or Sterilize the Stylet**—High-level disinfect or sterilize the stylet.

You must complete both procedures in order to prepare the stylet for use on the next patient. Proper disinfection or sterilization is critical.

**Note:** It is understood that all items in the following table will be used as intended, and the level of disinfection or sterilization required may vary according to local regulations.

<table>
<thead>
<tr>
<th>DEVICE</th>
<th>STERILE</th>
<th>USE</th>
<th>SPAULDING’S/CDC CLASSIFICATION</th>
<th>DISINFECTION LEVEL</th>
<th>STERILIZATION</th>
</tr>
</thead>
<tbody>
<tr>
<td>GlideRite® DLT Stylet</td>
<td>Nonsterile</td>
<td>Reusable</td>
<td>Semi-critical</td>
<td>Low</td>
<td>Int.</td>
</tr>
</tbody>
</table>

*Checked boxes show minimum disinfection level requirement.

Shaded areas indicate that the disinfection/sterilization level is not required or not compatible with the device materials.

Unshaded areas show permissible levels of disinfection or sterilization based on compatibility with the device materials.

**PROCEDURE 1. CLEAN THE STYLET**

The GlideRite DLT Stylet is a reusable device that requires cleaning prior to disinfection or sterilization.

**Table 2. Cleaning Methods**

<table>
<thead>
<tr>
<th>METHOD</th>
<th>LEVEL</th>
<th>CYCLES*</th>
<th>CONDITIONS</th>
</tr>
</thead>
</table>
| Metrex® CaviCide® | Cleaner | 3000 | **Water temperature:** 33–40°C (91–104°F)  
**Exposure:** Spray all surfaces until drenched. Allow to remain wet for 3 minutes. Brush all surfaces.  
**Rinse:** Rinse for 5 minutes under running water. While rinsing, use a soft-bristled brush and a syringe to flush and brush any hard-to-reach areas. |
| Getinge® Tec Wash III | Cleaner | 3000 | **Water temperature:** 20–40°C (68–104°F)  
**Exposure:** Soak for 3 minutes. Brush all surfaces.  
**Rinse:** Rinse for 3 minutes under running water. |
| Metrex® EmPower™ | Cleaner | 3000 | **Water temperature:** 19–29°C (66–84°F)  
**Exposure:** Prepare solution at 8 mL/L (1 oz/gal). Soak component for 3 minutes. Before removing from solution, brush all surfaces and pay special attention to hard-to-reach areas.  
**Rinse:** Rinse for 3 minutes under running water. |
<table>
<thead>
<tr>
<th>METHOD</th>
<th>LEVEL</th>
<th>CYCLES*</th>
<th>CONDITIONS</th>
</tr>
</thead>
</table>
| Pro-Line Solutions EcoZyme®   | Cleaner | 3000   | **Water temperature:** 19–29°C (66–84°F)  
**Exposure:** Prepare solution at 8 mL/L (1 oz/gal) in 30–40°C (86–104°F) water. Soak component for 5 minutes. Before removing from solution, brush all surfaces and pay special attention to hard-to-reach areas. Using a syringe, flush the connectors.  
**Rinse:** Rinse for 5 minutes under running water. |
| STERIS® Prolystica® 2X Concentrate | Cleaner | 3000   | **Exposure:** Prepare solution in warm water at 1–4 mL/L (0.125–0.5 oz/gal). Soak component for at least 3 minutes. Before removing from solution, brush all surfaces, paying special attention to hard-to-reach areas.  
**Rinse:** Rinse for 3 minutes under warm running water. If component is soaked for longer than 3 minutes, increase rinse time in proportion to soak time. |

* Value indicates number of compatibility cycles tested. Exceeding the recommended number of cycles may affect the potential life of the product.

† After using STERIS® Prolystica® 2X Concentrate to clean a component, you must disinfect or sterilize the component as described in this manual. The disinfection or sterilization step neutralizes any remaining enzymes and prevents cytotoxicity.

1. Using the water temperature specified in Table 2, rinse the stylet in clean tap water and scrub it with a soft-bristled brush until all visible contamination has been removed.
2. Prepare one of the approved cleaning solutions in Table 2 according to the solution manufacturer’s instructions.
3. Expose the components to the cleaning solution according to the instructions in Table 2.  
   *Note: If you are using Metrex® CaviCide®, spray additional solution as needed in order to ensure that the stylet remains visibly wet for the duration of the exposure period(s).*
4. Rinse the stylet according to the instructions in Table 2.
5. Visually inspect the stylet for contamination. If there is any sign of contamination, restart the procedure.
6. Using a clean, lint-free cloth, hospital-grade clean air, or a low-temperature dryer, dry the stylet.

The component should now be clean and free of contamination. Handle the product carefully to avoid recontamination, and continue to the following procedure, Disinfect or Sterilize the Stylet.
PROCEDURE 2. DISINFECT OR STERILIZE THE STYLET

The GlideRite DLT Stylet requires high-level disinfection prior to use. You may elect to sterilize the stylet, depending on your local protocols or facility preferences. For more information about the risk classification of the stylet, see Table 1 on page 6.

In this procedure, the term *pure water* refers to water that is suitable for disinfection according to local regulations and your medical facility.

Table 3. Disinfection and Sterilization Methods

<table>
<thead>
<tr>
<th>METHOD</th>
<th>LEVEL</th>
<th>CYCLES*</th>
<th>CONDITIONS</th>
</tr>
</thead>
</table>
| Metrex® MetriCide® 28       | High  | 3000    | Conditioning: 23–27°C (73–81°F)  
  Water temperature: 33–40°C (91–104°F)  
  Exposure: Soak for 20 minutes, ensuring that all air bubbles are removed from the surface of the component.  
  Rinse: (3) 3-minute immersions in pure water, while agitating, flushing, and brushing with a sterile, soft-bristled brush. |
| ASP® Cidex® OPA             | High  | 3000    | Conditioning: 20°C (68°F) or higher  
  Water Temperature: 20°C (68°F) or higher  
  Exposure: Soak for 12 minutes, ensuring that all air bubbles are removed from the surface of the component.  
  Rinse: (3) 1-minute immersions with agitation in pure water. |
| STERIS® Revital-Ox™        | High  | 3000    | Conditioning: 20°C (68°F) or higher  
  Water Temperature: 20°C (68°F) or higher  
  Exposure: Soak for 8 minutes, ensuring that all air bubbles are removed from the surface of the component.  
  Rinse: (1) 1-minute immersion with agitation in pure water. |
| Medivators® Rapicide® PA 30°C | High | 100    | Concentration: 750–950 parts per million  
  Conditioning: 28–32°C (82–90°F)  
  Exposure: 5 minutes in a Medivators® Advantage Plus AER reprocessing system with the following configuration:  
  • Hookup: 2-8-002HAN Rev. B  
  • Parameter: 1-24-010 C DISF |
## Operations & Maintenance Manual: Cleaning & Disinfecting

### METHOD

<table>
<thead>
<tr>
<th>METHOD</th>
<th>LEVEL</th>
<th>CYCLES*</th>
<th>CONDITIONS</th>
</tr>
</thead>
<tbody>
<tr>
<td>STERIS® S40™ or S20™</td>
<td>High</td>
<td>675</td>
<td>Standard cycles in the following processors: STERIS® SYSTEM 1® (outside U.S.) SYSTEM 1E® (in U.S.) SYSTEM 1 EXPRESS (outside U.S.) SYSTEM 1 PLUS (outside U.S.)</td>
</tr>
<tr>
<td>ASP® Hydrogen Peroxide Gas Plasma</td>
<td>Sterilization</td>
<td>500</td>
<td>STERRAD® 100S (in U.S.) STERRAD® 100S short cycle (outside U.S.) STERRAD® NX standard cycle STERRAD® 100NX standard cycle STERRAD® 50 STERRAD® 200 short cycle</td>
</tr>
<tr>
<td>STERIS® Vaprox® HC</td>
<td>Sterilization</td>
<td>500</td>
<td>Non-lumen cycle in any STERIS® Amsco® V-PRO® low-temperature sterilization system.</td>
</tr>
<tr>
<td>Autoclave (steam cycle)</td>
<td>Sterilization</td>
<td>300</td>
<td><strong>Minimum:</strong> 3 minutes at 134°C (273°F) or 4 minutes at 132°C (270°F) <strong>Maximum:</strong> 18 minutes at 137°C (279°F)</td>
</tr>
</tbody>
</table>

* Value indicates number of compatibility cycles tested. Exceeding the recommended number of cycles may affect the potential life of the product.

† This chemical may discolor metal, but the discoloration does not affect efficacy or functionality.

1. Ensure the stylet has been properly cleaned according to the previous procedure, [Clean the Stylet](#) on page 6.
2. Prepare and condition the disinfection or sterilization solution according to the solution manufacturer’s instructions and the conditions stated in Table 3.
3. Disinfect or sterilize the stylet according to the conditions stated in Table 3.
4. Rinse the stylet according to the conditions stated in Table 3.
5. Dry the stylet by using a sterile cloth, hospital-grade clean air, or a low-temperature dryer.
6. Visually inspect the stylet and ensure that there are no signs of damage or cracking. If the stylet is damaged, discard it and contact Verathon® Customer Care to order a new stylet.
7. Store the stylet in an environment appropriate for disinfected or sterilized equipment.
PRODUCT SPECIFICATIONS

SPECIFICATIONS

Table 4. GlideRite DLT Stylet Specifications

<table>
<thead>
<tr>
<th>General Specifications</th>
</tr>
</thead>
<tbody>
<tr>
<td>Expected product life:</td>
</tr>
<tr>
<td>Operating conditions:</td>
</tr>
<tr>
<td>Temperature: 10–40°C (50–104°F)</td>
</tr>
<tr>
<td>Relative humidity: 0–95%</td>
</tr>
<tr>
<td>Atmospheric pressure: 540–1060 hPa</td>
</tr>
<tr>
<td>Shipping and storage conditions:</td>
</tr>
<tr>
<td>Temperature: -20–45°C (-4–113°F)</td>
</tr>
<tr>
<td>Relative humidity: 0–95%</td>
</tr>
<tr>
<td>Atmospheric pressure: 440–1060 hPa</td>
</tr>
</tbody>
</table>

DIMENSIONS

Figure 2. GlideRite DLT Stylet Dimensions

Handle width: 40 mm (1.6 in)

Handle length: 31 mm (1.2 in)

Stylet rod length: 394 mm (15.5 in)

Distal tip diameter: 5 mm (0.2 in)
The following table provides definitions for specialized terms used in this manual or on the product itself. For a full list of caution, warning, and informational symbols used on this and other Verathon® products, please refer to the *Verathon Symbol Directory at verathon.com/symbols*.

<table>
<thead>
<tr>
<th>TERM</th>
<th>DEFINITION</th>
</tr>
</thead>
<tbody>
<tr>
<td>AER</td>
<td>Automated endoscope reprocessor</td>
</tr>
<tr>
<td>C</td>
<td>Celsius</td>
</tr>
<tr>
<td>CFR</td>
<td>Code of Federal Regulations (U.S.)</td>
</tr>
<tr>
<td>cm</td>
<td>Centimeter</td>
</tr>
<tr>
<td>CSA</td>
<td>Canadian Standards Association</td>
</tr>
<tr>
<td>ETT</td>
<td>Endotracheal tube</td>
</tr>
<tr>
<td>F</td>
<td>Fahrenheit</td>
</tr>
<tr>
<td>hPa</td>
<td>Hectopascal</td>
</tr>
<tr>
<td>ID</td>
<td>Internal diameter</td>
</tr>
<tr>
<td>in</td>
<td>Inch</td>
</tr>
<tr>
<td>L</td>
<td>Liter</td>
</tr>
<tr>
<td>mL</td>
<td>Milliliter</td>
</tr>
<tr>
<td>mm</td>
<td>Millimeter</td>
</tr>
<tr>
<td>OSHA</td>
<td>Occupational Safety and Health Administration (federal agency in U.S.)</td>
</tr>
<tr>
<td>Pure water</td>
<td>Water that is suitable for high-level disinfection according to local regulations and your medical facility</td>
</tr>
</tbody>
</table>