









BALLARD LIBERATOR®, ET TUBE CLEARING SYSTEM

The Ballard™ Liberator can be used to clear the endotracheal tube of residual mucus, tenacious secretions, and biofilm, and when used daily as part of a preventative protocol, may give the patient an improved opportunity to pass their SBT by significantly reducing airway resistance and work of breathing. Daily use in conjunction with standard of care protocols may allow the patient to be liberated from the vent sooner^{1,2}

INSTRUCTIONS FOR USE

Before beginning procedure, perform closed suction according to your hospital protocol

<p>1 PREPARATION</p>  <ul style="list-style-type: none"> • Don appropriate PPE, per hospital protocol, and remove Liberator from packaging. • Verify that the stopcock on the manifold attached to the ET tube is in the ventilator only position. 	<p>2 VERIFY BALLOON INFLATION</p>  <ul style="list-style-type: none"> • Secure the ETT and manifold with one hand and detach the closed suction catheter (CSC) from the manifold. • Place cap from Liberator onto CSC and set CSC aside. • Rotate the control handle to wiper position, depress red button and verify balloon inflation. 	<p>3 CONNECT LIBERATOR</p>  <ul style="list-style-type: none"> • Attach the Liberator between the patient and the ventilator circuit by inserting the catheter into the manifold and twisting. • Attach the control handle to the suction tubing and adjust the vacuum regulator to the desired level. <p><i>Most experts suggest a negative pressure of 80 to 120 mmHg (-10.7 to -15.9 kPa). See IFU for full warnings and instructions.</i></p>
<p>4 ADVANCE CATHETER</p>  <ul style="list-style-type: none"> • Open the stopcock on the manifold to the catheter position. • Stabilize the ET tube and the manifold with one hand. • Advance the wiper catheter with the other hand until the markings on the catheter match the markings on the ET tube. 	<p>5 DEPRESS HANDLE AND WITHDRAW CATHETER</p>  <ul style="list-style-type: none"> • Depress and hold the control handle. • Gently withdraw the catheter until the black ring is visible inside of the cleaning chamber. • Release the handle and rotate the stopcock back to the ventilator only position. 	<p>6 IRRIGATE TIP</p>  <ul style="list-style-type: none"> • Open the cap on the irrigation port and insert a 15 mL saline vial. • Rotate the control handle to the suction position and depress the thumb valve until the vial is empty and the chamber and catheter are clear. • Remove the saline vial and replace the cap.
<p>7 DAY STICKER USAGE AND RECONNECT CSC</p>  <ul style="list-style-type: none"> • Rotate the control handle to the locked position. • Apply appropriate day sticker to the control handle. • <i>Example:</i> if catheter is opened on Monday and intended to be changed after 72 hours, place the Thursday sticker on the control handle. 	<p>8 RECONNECT CSC</p>  <ul style="list-style-type: none"> • Verify that the manifold is in the ventilator only position, and detach the Liberator catheter from the manifold. • Remove the cap from the Liberator CSC and replace it onto the wiper. • Reconnect the Liberator CSC to the manifold. • Place the Liberator wiper catheter in the ziplock bag and set aside until next use. 	<p>ICON KEY:</p> <ul style="list-style-type: none"> DEVICE LOCKED WIPER CAN BE ACTIVATED WITH RED BUTTON SUCTION CAN BE ACTIVATED WITH WHITE BUTTON <p><i>There are inherent risks in all medical devices. Please refer to the product labeling for indications, cautions, warnings and contraindications. Availability of these products might vary from a given country or region to another, as a result of specific local regulatory approval or clearance requirements for sale in such country or region. Non contractual document. The manufacturer reserves the right, without prior notice, to modify the products in order to improve their quality.</i></p> <p>REFERENCES:</p> <ol style="list-style-type: none"> Schofield L., The endOclear® Liberator Cleaning Device in Decreasing Airway Resistance, AARC Annual Meeting (Indianapolis, IN) October 4-7, 2017 Wicker B., et. al., A Two Year Study to EVALUATE DAILY ENDOTRACHEAL TUBE (ETT) CLEANING PROTOCOL, SCCM Annual Meeting (San Diego, CA) February 17-19, 2019