Procedure Guidelines

<table>
<thead>
<tr>
<th>Protocol Title:</th>
<th>Gum Elastic Bougie</th>
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<td>Original Adoption Date:</td>
<td>08/2010</td>
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<tr>
<td>Past Protocol Updates</td>
<td>NOT APPLICABLE PROTOCOL NEW IN 2010</td>
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<tr>
<td>Date of Most Recent Update:</td>
<td>December 26, 2013</td>
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<tr>
<td>Medical Director</td>
<td>Chad Torstenson M.D.</td>
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**Device:**
A 15 French flexible device to be used instead of a tracheal tube stylet for the purpose of endotracheal intubation

**Indications:**
Consider for all patients over 14 years of age needing endotracheal intubation

**Procedure:**
1. Insert laryngoscope for view of glottis
2. Once the glottis is in view, pass the flexed end of the bougie through the cords and advance until resistance is met at the carina.
3. With the laryngoscope remaining in place with view of the glottis, pass an appropriately sized endotracheal tube over the bougie taking care not to tear the balloon on the patient’s teeth. Visualize the ETT passing the cords over the bougie. Advance the ETT to 23 cm in adult males and 21 cm in adult females.
4. Inflate the balloon and check external balloon pressure to rule out ETT balloon failure.
5. Remove the bougie while carefully maintaining position of the ETT.
6. Apply bag valve mask with ETCO2 monitoring.

**Complications**
Passing the bougie into the esophagus is possible.

Techniques used to limit undetected intubation of the esophagus:
- The bougie may continue to pass without marked resistance despite traveling near entire length of the bougie. If this happens, remove the bougie and reattempt visualizing the glottis.
• The anterior trachea has cartilaginous rings that if the anteriorly flexed tip of the bougie is moved back and forth over, there will be a bouncing sensation felt by the provider with the movement.

• Esophageal intubation will result in sounds over the stomach with air insufflations. If this occurs remove the ETT immediately and repeat the procedure.

• Esophageal intubation will result in low capnography levels that give poor waveform readings. This may occur in patients in cardiac arrest or those with very poor perfusion. If you feel certain that the tube passed the vocal cords, the tube can remain in cardiac arrest patients. If there is any uncertainty at all, the tube should be removed and the procedure should be reattempted.