Easy technique for awake (or asleep) nasal fiberoptic intubation

By Karen S. Sibert, MD, FASA

- 1. Find a bronchoscope swivel adapter.
- 2. Soften a regular endotracheal tube (ETT) in a bottle of warm saline. (Nasal Rae ETT may be used but isn't necessary.)
- 3. Ask the patient if he/she breathes better through one nostril than the other, or has a deviated septum. This tells you which side is more patent and should be used.
- 4. IV sedation as you prefer. This technique can also be used with a patient spontaneously breathing under inhalation anesthesia, assuming that the patient has been NPO and does not require awake intubation or a rapid-sequence induction. This is ideal for patient comfort. Consider glycopyrrolate (0.2 mg IV) to reduce secretions.
- 5. Topically anesthetize and vasoconstrict the nasopharynx as you prefer: choices include nasal decongestant spray and nebulized lidocaine. Serially dilate the nostril with small-to-large nasal airways coated with lidocaine jelly.
- 6. Advance the ETT through the nostril to about 12-14 cm depending on the patient's height, less for shorter patients and further in for taller patients.
- 7. Suction out the ETT with a soft suction catheter.
- 8. Attach the bronchoscope swivel adapter to the ETT; attach the anesthesia circuit.
- 9. Turn O₂ on at around 6 l/m. Optional: turn on sevoflurane to provide additional anesthesia to airway and vocal cords as appropriate.
- 10. Look at end-tidal CO₂ waveform. If you're not seeing any ETCO₂, the tube is probably down too far. Pull it back until ETCO₂ appears. Adjust the depth until you achieve the optimal ETCO₂ waveform.
- 11. Advance the fiberoptic bronchoscope (FOB) through the adapter port. The glottis usually will be in view right away. Gentle jaw lift may improve the view if the epiglottis is obscuring it.
- 12. A bolus of IV lidocaine, 1 to 1.5 mg/kg, 30 seconds before you advance the FOB and the ETT through the glottis helps avoid coughing and airway reactivity.

The advantage of this approach is that the ETCO2 waveform helps you optimize the position of the tube before you ever put the scope in, and the ETT keeps the tongue out of your way. The oxygen flow helps keep the tip of the bronchoscope from fogging. Using the circuit for oxygen delivery leaves the suction port free for suctioning.