



Preface
Artificial airways



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Guest Editors

We are excited to share this issue of the *Clinics in Chest Medicine* with students of interventional pulmonology and all other specialists interested in airway management, such as critical care physicians, anesthesiologists, general and thoracic surgeons, and otolaryngologists. Artificial airways are adjuncts used to gain and secure access to the central airway, either acutely or for a longer duration. They have become a common treatment modality since the introduction of mechanical ventilation and modern intensive care units.

Artificial airways have long been placed and maintained by otolaryngologists and anesthesiologists. Ever since the introduction of these devices, airway injuries from the design and materials used for the cuffs and tubes have been a major concern. The last decade has seen a significant development in the field. Novel materials are now available for the manufacture of the devices, and newer techniques have been introduced to place tracheostomy tubes at the bedside, in a minimally-invasive fashion, without surgical interventions. These advances have made patient care easier, safer, and more cost-effective. In addition, these procedures are increasingly being performed by pulmonologists and critical care specialists. The future of artificial airways is also very exciting; bioabsorbable, radiation-emitting, and drug-coated stents are just a few of the inventions on the horizon. Self-expandable

metallic stents (which can be removed after a certain period) are also in the making, and ultrathin silicone prostheses are now available.

Application of innovative technologies will also bring new responsibilities. Appropriate training and adequate exposure will be necessary. Users will need to know indications and contraindications of given procedures for proper patient selection. Patient education material and guidelines for the long-term care of patients with artificial airways will need to be established.

In this issue of the *Clinics in Chest Medicine*, we have been fortunate to assemble international leaders of their field to contribute to the various aspects of the art and science of the artificial airway. The issue encompasses all aspects of this area, including proper timing, various means of placement, and long-term patient care. As we enter a new era of interventional pulmonology, we hope this issue will be an easy introduction for the novice and a ready reference for the expert interventionalist and airway specialist.

We are forever indebted to the teachers who gave us the insight and ability to undertake such tasks, and we are thankful to all the contributors for their timely contributions. We certainly have learned a tremendous amount while assembling this issue. We also thank W.B. Saunders for the opportunity and Sarah Barth, our editor, who has really made this endeavor possible.

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