Device Facilitates EMS Blind Nasotracheal Intubation

Although the success rates for blind nasotracheal intubation (BNTI) are lower than those for orotracheal intubation, BNTI nonetheless continues to be used in some prehospital systems. These investigators prospectively evaluated the use of endotracheal tubes with trigger-activated directional distal tip control (Endotrol) in emergency BNTIs performed by paramedics. The study was conducted from 1997 through 1999 in a mixture of urban, suburban, and rural settings.

Of the 219 BNTIs performed during the study period, conventional tubes were used in 141 cases and trigger tubes in 78. Paramedics using the trigger tube were given a brief (shorter than 1 hour) demonstration of its use; all were trained in general use of BNTI. The overall success rate was 63 percent, with a limit of 2 attempts per medic per case. Success was significantly more likely when the trigger tube was used (72 percent vs. 58 percent; \( P=0.04 \)).

Comment: The abysmal success rates, regardless of the equipment used, speak volumes about why oral intubation has supplanted nasotracheal intubation in so many prehospital systems and EDs. The conclusion that the trigger tube outperforms conventional tubes is challenged by the study's many limitations, including sample size, operator variability, and the lack of control for patient characteristics.

— CV Pollack

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