Cricoid Pressure During Intubation: What's Best?

Cricoid pressure during intubation reduces the risk of aspiration and has become standard during "full stomach" intubations, but some have suggested that it makes intubation more difficult by compromising the laryngoscopic view. This study, from Gloucestershire Royal Hospital in the U.K., compared the laryngoscopic view with standard cricoid pressure, backward and upward cricoid pressure (argued to enhance laryngoscopic exposure), or no cricoid pressure. Each technique was measured with two types of foam-rubber pillow; one pillow provided posterior neck support (argued to enhance glottic visualization) and one did not.

Fifty fasted women undergoing elective pelvic surgery (median age, 30; range, 18 to 52) were assigned to these different combinations in random order. Cricoid pressure was standardized and averaged 3.2 kg (range, 2.5 to 3.7 kg). Visualization was more likely to be better with backward and upward cricoid pressure than with standard pressure (P<0.01), and each was better than no pressure. Overall, the best visualization was most often obtained without neck support, regardless of the technique used.

Comment: Overall, backward and upward cricoid pressure without neck support was most likely to yield the best view, but in certain patients no cricoid pressure at all was better than any other combination. The take-home point is to try backward and upward pressure first, but if it doesn't afford a good view of the larynx, try standard pressure, then nothing. Neck support appears to offer little benefit and requires additional equipment or hands.

— RM Walls

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