

Letters

COMMENT & RESPONSE

Tracheostomy During COVID-19 Pandemic— In Search of Lost Timing

To the Editor Tay et al should be complimented on their Viewpoint “Surgical Considerations for Tracheostomy During the COVID-19 Pandemic: Lessons Learned From the Severe Acute Respiratory Syndrome Outbreak”¹ highlighting preoperative and perioperative recommendations for tracheostomy during the coronavirus disease 2019 (COVID-19) pandemic. The authors searched the literature for tracheostomies performed during the previous outbreak of severe acute respiratory syndrome (SARS), finding 3 case series and 2 case reports (23 procedures). Lessons learned from those experiences were summarized into 5 points. The need for adequate personal protective equipment in performing surgery, the site to perform surgery to lessen transport of infected patients, the precautions to reduce time of exposure to infective secretions, the establishment of experienced teams, and the caution in postprocedure waste disposal were discussed and translated to the current COVID-19 pandemic.

Of note, the authors’ recommendations focused on maximizing the safety of clinicians, which is undoubtedly a crucial aspect. For example, delaying tracheostomy until complete virus clearance has been proposed to minimize the risk of clinician infection.² However, there is little to no consideration of patients’ perspective. Would patients with COVID-19 benefit from tracheostomy? This question remains unanswered, and none of the studies presented data on tracheostomy best timing in these patients.

Sparse randomized clinical trials (RCTs) involving patients with different underlying conditions have compared outcomes between early vs late tracheostomy, with inconsistent results. A large Italian RCT³ reported no significant differences in ventilator-associated pneumonia, mortality, and length of intensive care unit (ICU) stay between the early (after 6-8 days from endotracheal intubation) and late (13-15 days) tracheostomy groups. Conversely, in an RCT including patients with neurological conditions in an ICU,⁴ early tracheostomy (≤ 3 days) provided significantly lower intensive care unit (ICU) mortality, 6-month mortality, and use of sedatives. In their meta-analysis comprising 222 501 adult patients with prolonged intubation, Adly et al⁵ showed that early tracheostomy (≤ 7 days) was significantly associated

with better outcomes, including mortality rate, incidence of hospital-acquired pneumonia, duration of mechanical ventilation, and length of ICU stay.

Although there is general agreement that optimizing safety protocols for tracheostomy in patients with COVID-19 is of utmost importance, data on tracheostomy best timing in these patients is still lacking. Would early tracheostomy in patients with COVID-19 improve weaning, disease clinical course, and/or reduce ICU stay? This remains nebulous, and significant variability—even regarding percutaneous vs surgical tracheostomy techniques—exists in the clinical practice.

We congratulate the authors¹ on their contribution and look forward to further research investigating safety and potential advantages for early tracheostomy in patients with COVID-19.

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