An Endotracheal Suctioning Guideline for adults with an artificial Airway

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Purpose:

Endotracheal suctioning is particularly important for patients that may not adequately cough out secretions by themselves. The suction procedure is associated with complications and risks of atelectasis. The purpose of this study was to make available the literature regarding endotracheal suctioning for adult intubated patients and to provide evidence-based recommendations for endotracheal suctioning and the prevention of atelectasis.

Methods:

The process for this guideline consists of 4 stage was as follows: 1) The PICO format was used to find questions; 2) a computer literature search was conducted for ascertaining the best evidence and syntheses for the guideline. ; 3) the next strategies for an appropriate guideline were public hearings at the hospital. ; 4) Last, all processes of this guideline were proved by expert nurses.

Key words	Database	Finding	Synthesis
Population -Endotracheal suction in Adult **Intervention** - Interventions Endotracheal suction, Suction, Endotracheal suction, Guideline, Close suction, Open suction, Tracheal suction **Control** - **Outcome** - Ventilator associated pneumonia (VAP), mucosa damage, hypoxia	Cochrane	1	1
	CINAHL	3	2
	Proquest	4	1
	Pubmed	10	6
	Total	18	10

Figure 1. The results of electronic literature searching

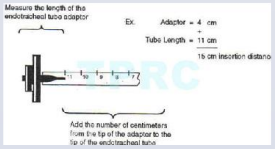
Results:

An electronic literature search for articles published between 2008 – 2012 was conducted using the Cochrane, CINAHL, ProQuest, and PubMed databases. From the 18 citations found 10 studies were selected. The guideline came from the process of synthesizing 10 studies.

This guideline has three parts:

1) patient preparation,
especially close suction,
- clean and sterile technique
- assessment: breath sound, oxygenation: skin color, pulse oximeter, respiration rate, pulse rate, blood pressure

2) the suction procedure using the shallow suctioning technique: the insertion of a catheter just into the hub of the tube.



3) follow-up care: improvement in breath sound, ABG, removal of pulmonary secretion, oxygenation: skin color, pulse oximeter, respiration rate, pulse rate, blood pressure.

Conclusion:

This study revealed strong evidence to support endotracheal suctioning, which requires further evaluation and needs to keep up with the changes in technology.

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