Clinical Practice Procedures:
Airway management/Laryngeal manipulation

Policy code	CPP_AM_LAM_0120
Date	January, 2020
Purpose	To ensure a consistent procedural approach to laryngeal manipulation.
Scope	Applies to Queensland Ambulance Service (QAS) clinical staff.
Health care setting	Pre-hospital assessment and treatment.
Population	Applies to all ages unless stated otherwise.
Source of funding	Internal – 100%
Author	Clinical Quality & Patient Safety Unit, QAS
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Laryngeal manipulation

January, 2020

Laryngeal manipulation improves visualisation of the larynx during direct laryngoscopy. Two (2) main techniques are described in the literature:

External Laryngeal Manipulation (ELM):[1] allows for the directional movement of the larynx to improve visualisation.

Backwards, Upwards, Rightwards, Pressure (BURP) technique:[2] displaces the larynx superiorly, posteriorly and rightward laterally to improve visualisation.

ELM and BURP will usually be performed by the airway clinician until optimal visualisation has occurred, at which time responsibility will be handed over to an airway assistant.[3,4]

Indications

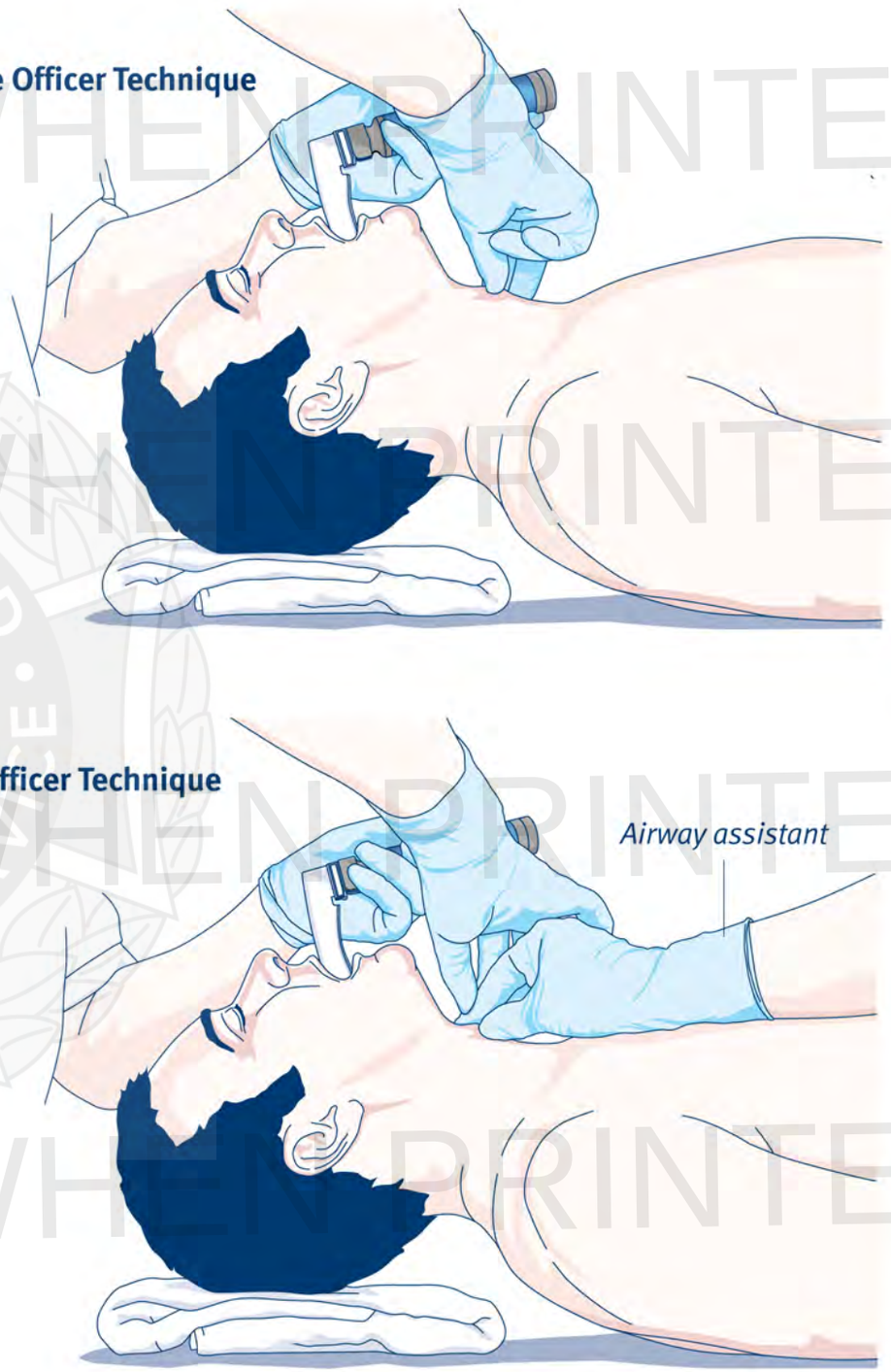
- Sub-optimal visualisation of the larynx during direct laryngoscopy

Contraindications

- Active vomiting

Complications

- Incorrect application
- May worsen visualisation of the larynx
- Potential for airway trauma

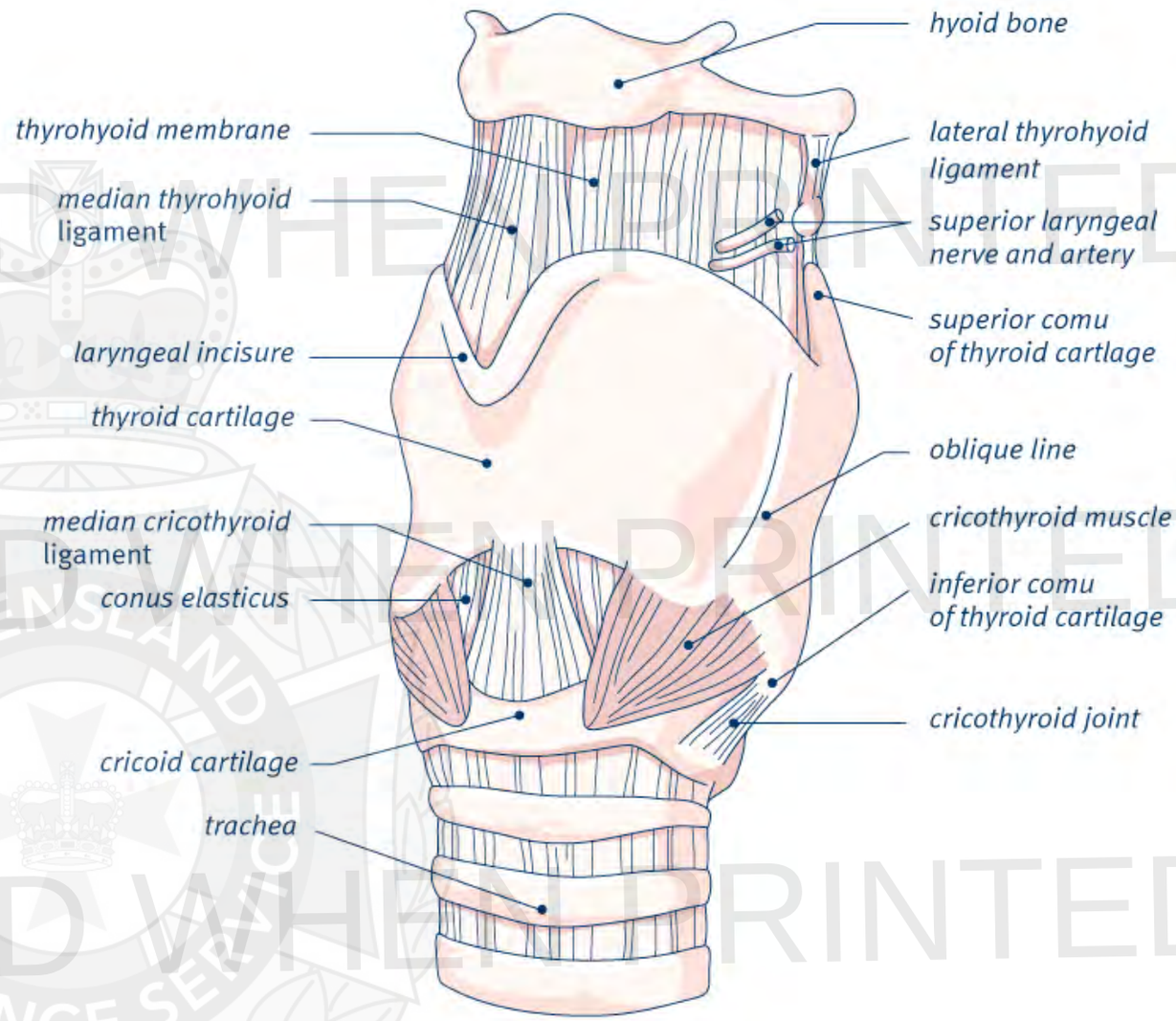


ELM

1. Whilst performing laryngoscopy, the intubating officer gently grasps the thyroid cartilage between the thumb and index and/or middle finger.
2. The thyroid cartilage is directed posteriorly and cephalad[1] until optimal visualisation has been achieved.
3. Responsibility for the maintenance of laryngeal pressure is then delegated to the airway assistant.
4. Following confirmation of successful endotracheal tube placement (appropriate $EtCO_2$ detection) and on direction of the intubating officer, ELM may be removed.

BURP

1. Whilst performing laryngoscopy the intubating officer gently grasps the thyroid cartilage between the thumb and index and/or middle finger.
2. Smooth, gentle pressure is applied in the following manner until optimal visualisation has been achieved:
   - **Backwards** (to abut the larynx against the cervical vertebrae)
   - **Upwards** until mild resistance is felt
   - **Rightwards** (0.5–2 cm).
3. Responsibility for the maintenance of laryngeal pressure is then delegated to the airway assistant.
4. Following confirmation of successful endotracheal tube placement (appropriate $EtCO_2$ detection) and on direction of the intubating officer, BURP may be removed.



Additional information

- Cricoid pressure is a technique performed to reduce gastric content aspiration during intubation. It involves placing firm pressure over the patient's cricoid cartilage to occlude the oesophagus. Due to the lack of supporting evidence the QAS does not recommend the routine use of cricoid pressure during intubation.[3]