
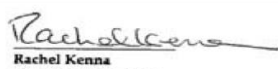


**STANDARD OPERATING PROCEDURE
FOR EQUIPMENT AND SUPPLIES REQUIRED
WHEN NURSING A CHILD WITH A TRACHEOSTOMY**


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Appendix 1: Trachi Case Picture

Appendix 2: Equipment and Supplies required when caring for a child with a tracheostomy tube

Appendix 3: Use of a Trachi—Case in OLCHC Audit Tool

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1.0 Introduction

Safely caring for a child with a tracheostomy requires the immediate availability of equipment for both routine care and emergencies. This document will outline the equipment and Supplies necessary when caring for a child with a tracheostomy in the following instances:

- a) At the bedside
- b) When transporting a child e.g. to theatre, to the X-ray department or to another hospital
- c) When parents/carer take a child with a tracheostomy out of the hospital, i.e. "Out for hours"

The equipment required in each of the above situations is outlines in **Table 1** overleaf.

2.0 Definition of Standard Operating Procedure

Safely caring for a child with a tracheostomy requires the immediate availability of equipment for both routine care and emergencies. This document will outline the equipment and supplies necessary when caring for a child with a tracheostomy in the following instances:

- d) At the bedside
- e) When transporting a child e.g. to theatre, to the X-ray department or to another hospital
- f) When parents/carer take a child with a tracheostomy out of the hospital, i.e. "Out for hours"

The equipment required in each of the above situations is outlines in **Table 1** overleaf.

3.0 Applicable to

All nursing staff employed by OLCHC that are involved in the care of children/infants with a tracheostomy tube.

4.0 Objectives of the Guidelines


To standardise the equipment for a Trachi-Case for infants/children with tracheostomy tubes in

OLCHC

To ensure and maintain patient safely for children/infants with tracheostomy tubes in

OLCHC

To ensure research based knowledge underpins nursing practice

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5.0 Definitions / Terms

Tracheostomy: A tracheostomy is an artificial opening in the trachea, into which a tube is inserted. (Macqueen 2012).

Trachi-Case: The case where emergency tracheostomy supplies are stored in OLCHC when a child who has a tracheostomy is in hospital.

Complications:

Having the necessary equipment and supplies to hand at all times is essential in dealing with the following major and potentially life threatening issues associated with a tracheostomy :

- Tracheostomy tube blockage
- Accidental decannulation

Notes:


- 1) From July 2015, **tracheal dilators** are not a routine part of the tracheostomy emergency equipment. If incorrectly used tracheal dilators can “potentially” cause trauma to the stoma or trachea. In some instances the ENT surgeon may ask for them to be part of the emergency bedside equipment for adolescents with a tracheostomy.
- 2) Bivona Flextend tracheostomy tubes are difficult to insert in an emergency, for that reason from July 2015 **standard Bivona tracheostomy tubes** will be part of the emergency equipment for children who use Bivona Flextend tracheostomy tubes.
- 3) From July 2015, a **suction catheter** (the same size as the child routinely uses) will be part of the emergency supplies. This will be used to guide a tracheostomy tube through the stoma in the unlikely event that it isn't possible to insert the same size tracheostomy tube or the smaller size tracheostomy tube. (Lyons et al 2007).
- 4) From July 2015, all children who have a tracheostomy will have a dual flow oxygen regulator at their bed space. A tracheostomy oxygen attachment tubing for one port and a re-breathe oxygen face mask for the other port will be available at the bed space.

6.0 Procedures

The Trachi Case is used to store the emergency supplies required at all times for the child who has a tracheostomy. The Trachi Case is for use in hospital only; it is not used when the child is discharged from OLCHC. Suction apparatus, suction supplies and other equipment are required in addition to the Trachi Case – these are outlined in Table 1 overleaf.

The tracheostomy equipment and supplies should be:-

- checked at the beginning of each nursing shift
- clearly visible
- in date
- within easy reach
- universal i.e. have 15mm connectors

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Cleaning and Disinfecting: As per the Guidelines on Cleaning and Disinfection (Infection Prevention and Control Department 2012), the box should be cleaned with detergent and water, rinsed and dried thoroughly between patients. If the child has an infection, in addition to cleaning with detergent and water, put the box into washer disinfectant or wipe down with 1000ppm av chloride (Actichlor 1.7g (1000ppm av chlorine) i.e. 1 tablet in litre of water) and rinse after damp cloth and dry thoroughly (Guideline on Cleaning and Disinfection (2012), should be used to disinfect the box.

Ordering Information:

Trachi Cases can be ordered as an outside order through Materials Management. Please ensure that your clinical area has adequate supplies. They are supplied by O'Neill Healthcare, cost approx. € 6. Tel no: 01 832 6509, email sales@onhealthcare.ie

Special Considerations: The Trachi Case is not to be overstocked or used as a store for tracheostomy supplies. It is important that emergency supplies are easily accessible, in date and are checked at the beginning of each shift. The Trachi Case should be clearly labelled with the child's name.

7.0 Implementation Plan

Communication and Dissemination

SOP will be posted on hospital Intranet

Hard copies of this SOP available in the Nurse Practice Committee Folder in each clinical area

Training

Education and training will be delivered in each clinical area

Education is included in induction packages for nursing staff in each clinical area

8.0 Evaluation and Audit


Evaluation and Audit includes:

- Information in relation to the safe management of the Trachi-Case
- Feedback from the clinical area on this SOP to contribute to ongoing SOP development.
- Periodic audits of the Use of the Trachi-Case will be performed (See Appendix 2: Trachi-Case Audit Tool)

Monitoring of compliance is an important aspect of procedural documents. However, it is not possible to monitor all procedures.

The operation of the SOP is to be reviewed on a two yearly basis or when indicated by a change in best practice using the following methods:

- Document Audit Tool
- Monitoring Near Misses/ Adverse Incidents in accordance with OLCCH
- A record of these monitoring/auditing processes will be collected by the CNS (Airway Management) as evidence of the review process on quarterly basis.

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11.0 Appendices

Appendix 1: Trachi Case Picture



Table 1: Equipment and Supplies required when caring for a child with a tracheostomy tube

Appendix 2

Contents of Trachi-case	Trachi-case		
	At bedside	Transporting patient	If patient is going out of the hospital
Spare tracheostomy tubes with velcro ties attached and the introducer in situ, in a sterile package with the tube bar code & expiry date visible - 1 same size and 1 a size	✓		
Scissors - double round ended	✓		
Water soluble lubricant	✓		
Heat & Moisture Exchanger or Humid Mini Vent x 1	✓		
Spare tracheostomy tube holder x 1, same style being routinely used by the child	✓		
Suction Catheter x 1, same size as currently being used for the child	✓		
Laerdal Valve x 1	✓		
Sterile gauze squares x 1 packet, 0.9% Sodium Chloride 10 ml ampoule x 1	✓		
Bivona disconnect wedge	✓		
Replacement inner cannula - if the tracheostomy tube insitu has an inner cannula	✓		
Sterile tracheal dilator, if ordered by the ENT surgeon specifically	✓		
Suture cutter - if the tracheostomy tube is sutured in	✓		
Syringe - for deflation of cuff if a cuffed tracheostomy tube is used - Size of syringe is dependent on amount of water used to inflate cuff. Please refer to medical/nursing	✓		
Additional Equipment	✓		
Bed Head sign and Emergency Algorithm			
Double outlet High flow Oxygen with tracheostomy tubing and non rebreath face mask	✓	✓ If clinically indicated	✓ If clinically indicated
High vacuum suction apparatus (fully charged)	✓	✓ ❌❌❌	❌❌❌❌
Suction catheters (appropriate size) Suction connecting tubing	✓	✓	✓
Suction measurement guide – to indicate the insertion depth of the suction catheter	✓	✓	✓
Gloves – non-sterile, non-powdered	✓	✓	✓
Goggles (if indicated, OLCHC 2006)	✓	✓	✓
Galipot and water for irrigating the suction tubing	✓	✓	✓
Bag-Valve-Mask (Ambu bag) or Anaesthetic Circuit (MIE set, only used in ICU,TCU, Operating Theatre/Recovery)	✓	✓	✓
Waste bin	If clinically indicated	If clinically indicated	If clinically indicated
Waste bag	✓		
Box of tissues - optional		✓	✓
Heated Humidification system	✓	✓	✓
Nebuliser unit, wall mounted via compressed air, portable	✓ If clinically indicated		
T piece nebuliser		✓ If clinically indicated	✓ If clinically indicated
Tracheostomy dressing	✓	✓	✓
Speaking Valve	✓	✓	✓
Pulse oximeter	✓ If clinically indicated	✓ If clinically indicated	✓ If clinically indicated
©2015 OLCHC. Apnoea monitor	✓ If clinically indicated	✓ If clinically indicated	✓ If clinically indicated
Nursing	✓	✓	✓
	✓ If clinically indicated	✓ If clinically indicated	✓ If clinically indicated

The Trachi-case must be kept with the child at all times when in hospital. The equipment outlined below is in addition to the Trachi-case.

Appendix 3: Use of Trachi-Case in OLCHC Audit Tool

Use of Trachi-Case in OLCHC Audit Tool

Date of Audit: _____ Audit Completed by: _____

Tick the relevant Yes, No, – One answer for each question. To score the self-audit, the answer **YES = 1**, the answer **No = 0**, and the total number of criteria then equals 8. **No.** = the number of times the answer is Yes or No. Yes% or No% = the percentage of Yes or No answers per question. The score equals the number of yes answers divided by the number of criteria (8) x 100%

Audit #	Criteria	No.				Comment
1	How many Trachi-Cases are in use in OLCHC?	No.				
		Yes No.	Yes %	No No.	No %	Comment
2	Have the contents been checked at the beginning of this shift	/	/	/	/	
3	Is the Trachi Case clearly visible?	/	/	/	/	
4	Are the contents in date?	/	/	/	/	
5	Is the Trachi Case within easy reach?	/	/	/	/	
6	Are the essential equipment/supplies present as per check list?	/	/	/	/	
7	Are the additional equipment/supplies present as per check list?	/	/	/	/	
8	Is the Trachi case overstocked?	/	/	/	/	
Individual Score						Total Score %

Quality Improvement
