

Comments, compliments, concerns or complaints

South Tees Hospitals NHS Foundation Trust is concerned about the quality of care you receive and strives to maintain high standards of health care.

However we do appreciate that there may be an occasion where you, or your family, feel dissatisfied with the standard of service you receive. Please do not hesitate to tell us about your concerns as this helps us to learn from your experience and to improve services for future patients.

Patient Advice and Liaison Service (PALS)

This service aims to advise and support patients, families and carers and help sort out problems quickly on your behalf.

This service is available at The James Cook University Hospital and the Friarage Hospital Northallerton, please ask a member of staff for further information.

Authors / department / contact number

Website: www.websiteaddress.co.uk

The James Cook University Hospital
Marton Road, Middlesbrough, TS4 3BW. Tel: 01642 850850

Version 1, Issue Date: May 2011, Revision Date: May 2012

MICB3327

Acute Medicine - Intensive Care Unit

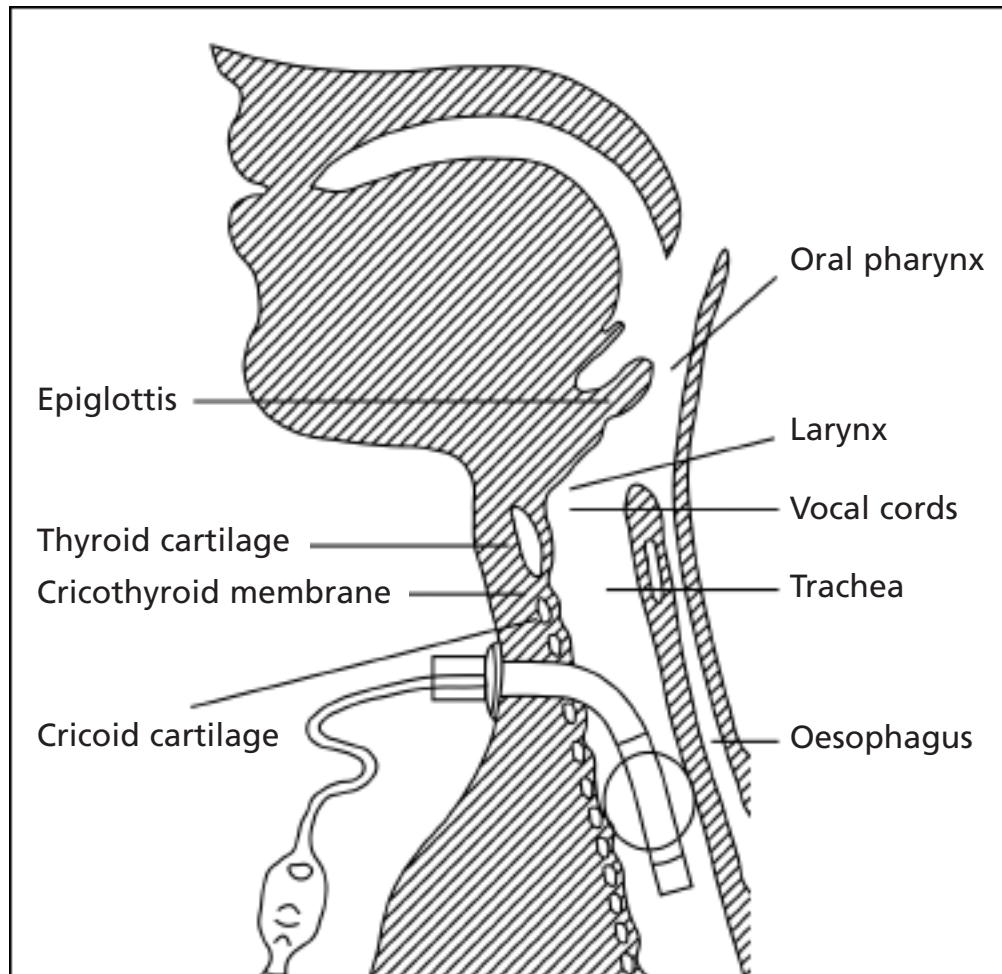
Tracheostomy

*Information for
patients & their relatives*

Many patients on the Intensive Care Unit (ICU) need a ventilator (breathing machine) to help with their breathing. This is usually done using a plastic tube (endo-tracheal tube) which passes through the mouth and throat into the windpipe (trachea) and allows the ventilator to blow air into the lungs.

What is a tracheostomy?

A tracheostomy (pronounced track-ee-oss-tome-ee) is a hole in the front of the neck into the windpipe (trachea). A curved plastic tube is then inserted through this hole through which you can breathe, or the ventilator can blow air.



Can I / my relative speak with a tracheostomy?

Yes, you can talk with a tracheostomy but you will not be able to make any sound when on the ventilator. This is because a cuff is inflated around the tracheostomy which prevents any air going up past the tracheostomy and through the voice box. As you improve and require less support from the breathing machine, the doctors and nurses may deflate the cuff as part of the process of coming off the ventilator and this may allow you to produce some noise. Occasionally, the tracheostomy may be changed to a special type of tube which can help with speech if it looks like you may need the tracheostomy for a longer period of time. Sometimes a valve can be attached to the tracheostomy that allows the patient to speak. This is not possible for all patients; it depends on the condition of the individual.

What happens afterwards?

Most tracheostomies in ICU are temporary and removed when no longer required. This may be before or after the patient leaves ICU. The tracheostomy is usually removed sometime after the patient is off the ventilator, but is sometimes left in longer especially if the patient is sleepy, or has difficulty in getting rid of chest secretions.

After the tracheostomy tube is removed, a dressing is applied to the hole and secured with tape. The hole will usually close fairly quickly, and within a week to ten days after removal, the hole will have sealed off, leaving only a small scar.

Why do I/my relative need a tracheostomy? The benefits

There are a number of reasons why a tracheostomy may be beneficial:

- A tracheostomy tube is far more comfortable than a tube in the mouth. Most patients with a tracheostomy require little or no sedation. This means that they can be more awake, more comfortable and may allow them to breathe for themselves at an earlier stage. This can actually reduce the time attached to a ventilator.
- A tube in the mouth can cause physical damage to the delicate structures through which it passes, including the voice box (larynx), leading to problems later on with speaking. A tracheostomy tube is inserted below the voice box and this is potentially less damaging.
- The nurse looking after you will be able to clean your mouth properly.
- A tracheostomy tube may prevent secretions or food 'going down the wrong way' into the lungs and causing an infection.
- Nursing staff and relatives may be able to understand communication better by lip reading. Some tracheostomies can allow speech although this is as a patient improves and needs less help from the breathing machine (weaning).
- Secretions lying on your chest that can block the flow of air and cause chest infections can be removed more easily by sucking them out through the tracheostomy tube.

Is it safe? Are there any risks?

Generally speaking, a tracheostomy is safe, but, like any procedure, there are some risks. Every effort will be made to minimise the risk of these complications occurring. Most of the complications are minor and of no great significance. However, very occasionally, a severe complication may arise which may necessitate intervention.

The major risks associated with the procedure are:

- **Bleeding.** The front of the neck contains several blood vessels, which may bleed during the formation of a tracheostomy. These can usually be dealt with very simply (1 in 20 patients) but occasionally require a surgical operation in the operating theatre (1 in 200 patients).
- **Lung function.** A few patients can result in a worsening of lung function after the procedure is complete. Usually this recovers within a couple of hours (1 in 50 patients). A more serious complication can occur called a pneumothorax. This is when air is in the chest but outside the lung, causing the lung to collapse. It usually requires a drain to be placed in the chest (1 in 200 patients).
- **Narrowing of the windpipe.** Patients who have had a tracheostomy are potentially at risk from developing scarring of the inside of the trachea (windpipe), which can lead to narrowing of the trachea called tracheal stenosis (1 in 25 patients). Usually this causes the patient no problem. Very rarely, patients with tracheal stenosis develop noisy breathing as the air passes through the narrowed part of the trachea and this may require refers them to an Ear, Nose and Throat surgeon for investigation and treatment.

You will have the opportunity to speak to a doctor about the benefits and risks of a tracheotomy in more detail before the procedure is performed.

Where will my tracheostomy operation be performed and who will do it?

Most tracheostomies can be performed in the ICU, but occasionally they may be carried out in the operating theatre. This will happen if we think the shape of the neck is not quite normal, or if the patient is at high risk of bleeding (but still needs the operation) or if we want to do the operation in a different way. We may also go to theatre if we think the tracheostomy will be permanent or the patient needs another operation, so we will perform the tracheostomy operation at the same time.

The operation is carried out by two doctors. One is an anaesthetist who will ensure the patient is asleep, comfortable and safe. If the operation is to be done on the ICU, it will be performed by one of the ICU doctors, who you may have met. If the operation is to be done in theatre then an Ear, Nose and Throat (ENT) surgeon will perform the operation.

Is it painful?

During the operation the patient will be under a general anaesthetic. Local anaesthetic is also inserted into the area at the front of the neck and windpipe to make it numb and painless. After the operation as the anaesthetic wears off you may feel some mild discomfort and soreness in the throat. Additional painkillers will be given as required.