

## Nasogastric feeding tube

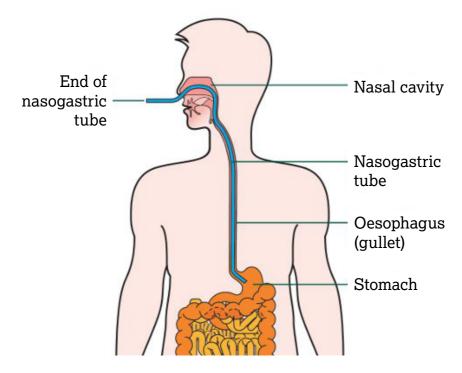
## **Nutrition and Dietetics Department**

**Patient Information** 



## What is a nasogastric tube?

A nasogastric (NG) tube is a small flexible plastic tube. It is passed down through the nose, down the back of the throat and into the stomach.



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NG tubes are often used when people are unable to eat and drink enough or are nil by mouth. While some people may only need an NG for short periods of time, others will need to use an NG throughout their treatment and may be discharged home with an NG tube.

An NG tube does not stop you from eating and drinking unless there is another medical reason why you cannot.

This booklet provides information about your NG feeding tube and answers questions you may have. We will show you how to use the NG tube and feeding equipment. There will be opportunities to practise using all the equipment with the help of the nursing staff.

## Feeding supplies at home

When you are first discharged from hospital with an NG tube, you will take a small supply of the equipment and feeds you need. If required, we will register you with a local feeding company who will deliver your ongoing supplies to your home on a monthly basis. In some cases, this will require changing to a different pump and feed (supplied by the local feeding company) once you are home. Your dietitian will discuss this with you if this applies to you, and will provide all the information and training you need. Alternatively, training may be provided by your local feeding company once home.

#### Gastrointestinal issues

Once home, if you experience symptoms such as nausea, vomiting, diarrhoea or abdominal distension, call The Royal Marsden Macmillan Hotline immediately. After discussing your symptoms, they may advise changes that need to be made.

## How do I prepare for feeding?

**Always** wash your hands with soap and water and dry them before handling the tube.

**Do not** put water, feed or medication through the tube until you have checked that the tube is in the correct position.

# Why is it important to check the position of the nasogastric tube?

It is important to check the position of the tube to make sure the end is still in the stomach and has not moved into the lungs. All tubes have measurement marks on them and you should be aware of the measurement point at which it leaves your nostril. If this moves, call The Royal Marsden Macmillan Hotline to check if it is still safe to use the tube.

## When should I check the position of the nasogastric tube?

- Before giving a feed
- Before giving medicine down the tube
- After you have vomited, retched, or had a severe coughing bout
- If the tube looks longer
- If the tapes holding it in place have come loose
- If the tube is accidentally pulled or tugged
- At least once a day.

## How do I check the position of the nasogastric tube?

You should check the position of the tube by measuring the pH (acidity or alkalinity) of your stomach contents. You can do this by using pH indicator strips and following the procedure below. There is a colour code chart on the pH strips container which shows a range of pH readings. Keep the pH strips clean and dry by storing them in a sealed container.

- Wash your hands before and after checking the tube position
- Remove a pH strip from the container, place it on a clean accessible surface and put it to one side
- Remove the cap from the end of the NG tube
- Attach an 60ml enteral syringe (purple) containing air to the NG tube and inject approximately 5–10ml air down the tube to remove any water or feed from the tube
- Draw back the syringe to obtain contents from the stomach (this is called 'aspirating' the tube)

- Place a few drops of the stomach contents (aspirate) on the pH strip
- Match the colour change of the strip with the colour code chart on the container to check the pH of the aspirate
- A pH reading of 0-5.5 is an acceptable reading. If your pH paper only uses whole numbers, a reading of 0-5 is acceptable.

# What if I cannot get any aspirate out of the nasogastric tube to check the pH?

- If you are nil by mouth, clean and rinse your mouth to help stimulate gastric secretions
- Lie on your left side for 20 minutes
- Inject air down the tube (approximately 5–10ml) and then draw back the syringe to obtain contents from the stomach.

## If there is still no aspirate:

If you are able to drink, sip on a drink (for example juice, water or fizzy drink), wait a few minutes and try drawing back from the stomach again.

## If there is still no aspirate:

Wait for 30 minutes to let the acid form in the stomach and try again.

## If there is still no aspirate:

Call The Royal Marsden Macmillan Hotline.

## What if I get a pH reading of more than 5.5?

If you have just finished a feed, then the feed in your stomach can increase the pH of the stomach contents (it can become more alkaline).

 If you are using continuous feeds, stop the feed, wait for up to one hour and test again

- If you are giving feeds at regular intervals (known as bolus feeds), wait for up to one hour after feeding and test again
- If you are on medication which reduces the acid in the stomach, such as Omeprazole and Lansoprazole, you may also get a pH reading of more than 5.5. It is important that you speak to your nurse or doctor to find out if this is normal for you.

If you are still unable to obtain an aspirate, or the pH is above 5.5, **do not** start feeding. Contact The Royal Marsden Macmillan Hotline.

#### General care

To prevent unnecessary replacement of your nasogastric tube, it is important to keep it in good condition. Regular care and flushing of the tube will help to prevent the tube becoming blocked.

The external part of the tube can be cleaned with soap and water. Some discoloration of the tube is normal and does not affect its ability to deliver feed.

Wash the rest of your face in the usual way. Check your nose for redness and any dry, sore or cracked areas. Change the tape securing the NG tube to the nose if it becomes dirty or starts to peel off.

If you are not using your NG tube, flush the tube with water at least once daily.

**Do not** use the feeding tube for anything other than water, medications and prescribed nutritional feed.

## Can I administer medications down my nasogastric tube?

Please ensure that your medication is prescribed in a soluble or liquid form, and check with your doctor or pharmacist that all medications are suitable to be given via your tube.

The tube must be flushed with at least 30ml of freshly drawn tap water before and after giving any medication. This is to prevent the tube from getting blocked. Ensure you flush the tube with 10–15ml of water between different medications.

## What if my tube becomes blocked?

If you are confident that the tube is still in the correct position, for example the tube becomes blocked immediately after finishing your feed, try to flush the tube with warm water using a 60ml syringe.

If you can visibly see where the tube is blocked, massage the tube with your fingers and thumbs or put a warm compression on it to help break up the blockage.

If the tube remains blocked, gently draw back on the syringe and attempt to flush as before. It can take more than 30 minutes to unblock the tube, so be patient.

If unsuccessful, call The Royal Marsden Macmillan Hotline.

**Do not** attempt to unblock or administer anything down the tube if you are unsure whether the tube is in the correct position. Do not attempt to unblock the tube with any other objects. Contact The Royal Marsden Macmillan Hotline.

## What if my tube has come out?

If your tube has partially come out, slowly pull the remainder of the nasogastric tube so the whole tube is fully out.

Contact The Royal Marsden Macmillan Hotline immediately.

If it is **after** office hours or on a weekend, you may be advised to go to your local Accident and Emergency Unit. If you have a spare tube, take this with you as it will save time. If you do not have a spare tube, then take the tube which has fallen out so the staff can identify which type of tube is required. You should also take your NG passport with you.

## How do I look after my feeding equipment?

## Giving sets

You need to change the giving set every 24 hours.

If you are giving more than one feed a day, it is important that the giving set is stored correctly between feeds to keep it as clean as possible. When you have finished a feed, place the empty bottle (with the giving set still attached) in a clean plastic bag in the fridge. At the time of your next feed, disconnect the giving set from the empty bottle and immediately attach it to the new feed bottle. Dispose of the old, empty feed bottle (check with the feeding company which elements can be recycled in household waste). This applies to both gravity feeds and feeds taken via a pump.

Repeat this process at the end of each feed and remember to discard the giving set at the end of the day.

## **Syringes**

Syringes will be included in your delivery from the feed company.

Reusable syringes are used for flushing water and medication down the tube.

Some people will also use syringes to give feed down the tube (bolus feeding).

Each reusable syringe can be used 30 times and for most people the syringe will last one week (four uses per day).

Between each use, the following procedure should be taken to clean the syringe:

- Clean immediately after each administration using fresh, warm soapy water (domestic washing up liquid)
- The plunger should be removed to allow for thorough cleaning.

Other approved cleaning methods include dishwasher (tip uppermost), immersion in boiling water (three minutes), cold sterilising solution (as per manufacturer's instructions) and microwave steam-steriliser (as per manufacturer's instruction).

- Allow to air dry (parts still separate)
- Once dry, store in a clean and dry container
- Only reassemble syringe prior to use.

Please discuss with your dietitian if your supply of syringes is not adequate.

## **Pump**

- It is important to keep your pump clean
- Before cleaning, ensure you unplug it from the wall
- Clean using a damp cloth
- Wipe any spillage as soon as possible
- Stubborn stains may be removed using mild detergent and warm water
- Do not, under any circumstances, immerse the main body of the pump in water.

## For pump related issues

If you are a UK resident, please contact the feeding company that produces your pump (eg. Abbott or Nutricia).

If you are an overseas resident, please contact The Royal Marsden Macmillan Hotline.

## **Contact details**

**Abbott Hospital to Home service:** 0800 018 3799 (24 hours a day, 7 days a week)

Nutricia Homeward Helpline: 0800 093 3672 – option 4 (Monday to Friday, 8am – 8pm. Saturday, 9am – 1pm)

Fresenius Enteral Nutrition Homecare: 0808 100 1990 (Monday to Friday, 8am – 6pm)

The Royal Marsden Macmillan Hotline: 020 8915 6899 (24 hours a day, 7 days a week)

## Further information and support

**PINNT** (Patients on Intravenous and Naso-gastric Nutrition Treatment)

A support group for patients receiving artificial nutrition. www.pinnt.com/Home.aspx

## **Macmillan Cancer Support**

A charity supporting patients and loved ones at diagnosis, during treatment and beyond.

www.macmillan.org.uk/cancer-information-and-support/impacts-of-cancer/nutritional-support

## Cancer Research UK

A charity providing information on causes of cancer and coping with cancer and its side effects.

www.cancerresearchuk.org/about-cancer/coping/physically/diet-problems/managing/drip-or-tube-feeding/types

#### **Nutricia Flocare**

Further information on pumps, tubes and sets. www.nutriciaflocare.com/Flocare2020

#### **Abbott**

A nutritional feeding company that provides enteral feeding products and training. Further information on pumps, tubes and sets.

www.nutrition.abbott/uk/product/abbott-freego-pump

Notes and questions					

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#### References

This booklet is evidence based wherever the appropriate evidence is available, and represents an accumulation of expert opinion and professional interpretation.

Details of the references used in writing this booklet are available on request from:

The Royal Marsden Help Centre

Telephone: Chelsea 020 7811 8438 / 020 7808 2083

Sutton 020 8661 3759 / 3951

Email: patientcentre@rmh.nhs.uk

No conflicts of interest were declared in the production of this booklet.

Should you require information in an alternative format, please contact The Royal Marsden Help Centre.





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