Diagnostic Imaging

NHS
Greater Glasgow and Clyde

Information about having a

Percutaneous Gastrostomy

What is a Gastrostomy?

A gastrostomy (also called RIG or PEG) is the insertion of a narrow plastic tube directly into the stomach through the skin to allow you to receive liquid food and medication. The different names refer to how the gastrostomy tubes are inserted but once inserted, they do the same job. We use x-rays for guidance when inserting a RIG (Radiologically Inserted Gastrostomy). We use a small telescope through the mouth when inserting a PEG (Percutaneous Endoscopic Gastrostomy).

Who will insert the RIG?

A specially trained doctor called a Radiologist.

Where will it be done?

Usually in a screening room in the x-ray department.

When can I discuss the procedure?

You can discuss this with your referring doctor in the ward, and also the Radiologist during the consent process before the procedure.

Consent

We will ask you to sign a consent form after we have explained the procedure in detail, including the potential complications and alternative treatments.

What preparation is required before the procedure?

We will admit you to a ward the night before the procedure and insert a naso-gastric tube (NG tube) if you do not have one. We will also give you X-ray contrast (dye) through the NG tube the night before.

You must not eat or drink from midnight the night before the procedure.

You will need to undress and wear a hospital gown.

What happens during the procedure?

You will need to lie on your back on the x-ray table.

We may give you sedatives and painkillers via a needle in your arm. We will monitor your vital signs (blood pressure, pulse, oxygen intake) and will give you oxygen through a fine tube in your nose.

This is a sterile procedure and there are two ways of performing it. Which way used depends on you and the Radiology Doctor. We usually avoid passing tubes through the mouth of someone who has recently had surgery or radiotherapy to their mouth or throat. The Doctor will use x-ray equipment and an ultrasound machine to perform the procedure. Before the procedure starts, we will give you a nerve block using the ultrasound machine and inject a long acting local anaesthetic to help with pain relief after the procedure.

In the first method, the Doctor will insert two "holding" stitches that will help secure the stomach to the tummy wall. Then, after passing a wire into the stomach the tract is widened and the feeding tube is inserted. The feeding tube has a balloon which will be inflated inside your stomach to stop it falling or being pulled out.

The second method involves placing one "holding" stitch then passing a wire through the stomach up through the oesophagus (or gullet) and out through the mouth. The feeding tube is then passed back down over the wire and out through the tummy wall.

There can be some discomfort but that is helped by giving the nerve block and local anaesthetic during the procedure.

How long will it take?

Every patient's situation is different, for a variety of reasons, however, you can expect to be in the x-ray department for about one and a half hours.

What happens afterwards?

You will return to your ward and remain on bed rest for a few hours. The nursing staff will monitor you and carry out routine observations (blood pressure, oxygen intake). As the feeding tube is secured, you should be able to carry on as normal. However, it is important to avoid sudden movements to prevent the feeding tube becoming loose (i.e. dislodgement).

If you feel pain when using the tube you must tell the nursing staff. The ward staff will tell you about your nutrition.

Are there any risks?

This is generally a safe procedure and for the vast majority of our patients it is straightforward with a quick recovery. As with any medical treatment though, some risks and complications can arise. Our department performs over a 100 of these procedures every year and we regularly audit our results to continually improve our performance and our patients' experience.

Potential complications can include:

- There is a small risk of bleeding as with any procedure through the skin.
- There is a small risk of injury to the liver and the large bowel. To reduce the risk of this, the doctor will scan your tummy when they perform the nerve block so they will know where the liver edge is. The contrast given the night before will show where the bowel is so that we can avoid this. If the liver or bowel is injured there may be a need for surgery to correct any injury.
- Very occasionally it is not possible to insert the tube (in about 5 out of 100 (5%) cases). This is because there is no safe route to the stomach without going through and injuring nearby structures like the bowel.
- A small amount of patients can experience irritation or slight infection of the skin around the tube.
- In the published literature, there is a recognised mortality rate of around 7% (7 out of 100) and our local results are better than this around 5% (5 out of 100).
- Occasionally, some tubes that rely on a balloon to stay in place can get displaced if the balloon bursts or is deflated by mistake.
- If tubes do come out then, we might still be able to keep the access and put a new tube using x-ray guidance, without having to do a new procedure.

If you have any questions please telephone the number on your appointment card or letter.

Common Questions

1) Does the tube stop me swallowing?

No, the tube does not affect your swallowing.

2) Do I still need to clean my teeth?

It can be very easy to forget about this if all your food and drinks are given through a tube. Plaque can still build up quickly without good mouth-care so you should still brush your teeth twice per day.

3) Does the tube stop me eating and drinking?

No, but if you were unable to eat or drink beforehand this would still be the case afterwards.

4) Is the gastrostomy tube permanent?

The tubes themselves are not permanent but it depends on the reason you have the tube to start with. If you are able to safely eat and drink enough for a period of time then your health and nutrition team may recommend the tube be removed.

5) How long do the tubes last?

Normally the tubes have a lifespan of around 6 months. At this time the tube can usually be exchanged by one of the nutrition team either in the community or in hospital.

6) Who will look after the tube?

This is an important consideration before the tube is inserted. If you will be living at home, you, your family and carers can be taught to look after the skin, tube and equipment. We may arrange for the district nursing team to help.

7) How long will it be before I can use the tube and how will I be fed in the meantime?

For 10 hours after the procedure we will flush sterile water through the tube. If all is well after the 10 hours we will start your feed as prescribed.

A dietician will calculate your nutritional needs and tailor your feed accordingly. They will also work with you to establish a routine and method that suit you. The feed can be passed through the tube by either a syringe directly or more slowly by a machine pump.

8) What equipment will I need and how will I get it?

When you go home from hospital, you will have a week's supply of feed and equipment. The amount of this will depend on your own personal circumstance. Once you are home, the homecare company who supply the feed will arrange regular deliveries usually within a week.

9) Will I be able to bath, shower or swim with the tube?

For the first two weeks, we would advise showering or washing with a cloth or flannel. After this, when the wound has healed, bathing would be fine. If you wish to go swimming please discuss this with your nutrition nurse.

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