## GENERAL GASTROSTOMY TUBE CARE

The recommendations in this section refer to Percutaneous Endoscopic Gastrostomy, Radiological Inserted Gastrostomy (adults only) and Balloon Retained Gastrostomy

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<tr>
<th>ISSUE</th>
<th>STATEMENT</th>
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<tbody>
<tr>
<td>Care following initial stoma formation</td>
<td>Following initial formation of the stoma there may be slight bleeding from the wound.</td>
<td>CREST (2004) Guidelines for the Management of Enteral Tube Feeding.</td>
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<td>The stoma should be left undisturbed for 24 hours. Clean the stoma site with saline using</td>
<td>NICE (2006) Nutrition Support for Adults Oral Nutrition Support, Enteral Tube</td>
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<td>aseptic technique for the first 48 hours. Thereafter, use a clean cloth and water and dry</td>
<td>Feeding and Parenteral Nutrition</td>
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<td>During the first 14 days the patient should not have a bath or go swimming to reduce the risk</td>
<td>aftercare</td>
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<td>Wash the stoma site prior to rest of the body.</td>
<td>Complications after Gastrostomy Insertion.</td>
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<td>Paediatric advice – no swimming for 6 weeks</td>
<td>NPSA/2010/RRR010</td>
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<td></td>
<td>Care must be taken when adjusting the external fixator within two weeks following the tube</td>
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<td>insertion (PEG tubes only).</td>
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<td>To adjust - please seek advice from a nutrition nurse, medical staff or a dietitian. Leave at</td>
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<td>least a 2mm gap between skin surface and fixator.</td>
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<td>If there is pain on feeding, leakage of fluid around the tube, or new bleeding within first</td>
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<td>week of insertion, STOP FEED IMMEDIATELY and CONTACT a Nutrition Nurse Specialist or GI</td>
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<td>Registrar for urgent advice.</td>
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<tr>
<td>Daily stoma / tube care</td>
<td>Clean the area with a clean cloth and soapy water, rinse and dry thoroughly. Do not use moisturizing creams or talc around the stoma site. Reposition the external fixator after cleaning, if appropriate. The external fixator should not be moved for the first 2 weeks post procedure (PEG tubes or tubes placed with pull through technique). Refer to the manufacturer's guidelines. Once a week, the external fixator should be moved and the tube should be moved in and out by a maximum of 10mm. This prevents buried bumper syndrome occurring. Rotate the tube 360° and reposition the external fixator daily, leaving a space of at least 2mm to allow slight movement. If unsure whether a tube should be rotated, check with the person who placed the tube or refer to the manufacturer's guidelines.</td>
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<td>Stoma problems – infection</td>
<td>Infection can be minimised by scrupulous hygiene of the stoma site. Avoid occlusive dressings as these can encourage and trap moisture. Obtain a swab for microbiology if any exudate or inflammation is present. Treat with the appropriate systemic antibiotic as topical may not always be effective, as the infection is usually within the tract and not just superficial.</td>
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### Stoma problems – Candida

The tube often appears to have bobbly or bumpy appearance. A burst balloon or leaking feeding port can also be an indication of candida.

**Adults**

- If the tube is still patent continue to use tube and monitor for deterioration in tube integrity.
- If the tube is completely blocked, change the tube as soon as practicable, and contact a Nutrition Nurse for advice.

**Paediatrics**

- Presence of yeasts in the stomach should be considered if there are problems with recurrent burst balloons or leaking feeding port valves on low profile gastrostomy devices.
- A gastric aspirate should be sent to microbiology, if yeasts are confirmed they should be treated with 7-10 days of Fluconazole or Itraconazole (depending on organism sensitivity) and the tube should be changed at end of treatment.
# Lothian Enteral Tube Feeding Best Practice Statement

| Stoma problems – Overgranulation | Insufficient rotation of the tube or movement of the tube within the tract can cause granulation tissue.  
Check that the external fixator is not too loose or too tight. Correct positioning of the external retention device can reduce the risk of overgranulation.  
Adults  
See Appendix 1 - Granuloma flowchart  
Paediatrics  
- Consider the use of an absorptive dressing such as Allevyn Non-Adhesive, Allevyn Adhesive, Tegaderm Foam or Lyofoam. This should be used for a minimum of 2 weeks to determine if it has been effective.  
- A Steroid-based, Antibiotic or Antifungal cream may be prescribed e.g. Maxitrol eye ointment, Fucidin H or Timodene for paediatric patients.  
| Leakage around Gastrostomy site | Consider the following:  
- Check for infection by taking a swab of the stoma site and treat accordingly.  
- Check the internal fixator is against the inner gastric wall by gently pulling the tube outwards until resistance is felt, and ensuring the external fixator is close to the skin, leaving a space of about 2-3mm to allow slight movement.  
- For balloon-retained tubes, check the balloon is still patent and inflated.  
- The French Gauge of tube may be incorrect. Discuss with a specialist e.g. Nutrition Nurse or GI Specialist.  
- Consider the use of barrier preparation e.g. Cavillon, in conjunction with a foam dressing such as Allevyn Non-Adhesive.  
## End of the tube has perished

- There are no replacement ends for some types of gastrostomy tubes e.g. balloon retained gastrostomies - these tubes will therefore need replaced if Y-port is damaged.
- Any staff involved in changing gastrostomy tubes should have received appropriate training and maintained competency to do so.
- If a replacement end is available, order a new end for tube. Remove the existing end, trim the end of the tube, and insert a new Y-connector as per instructions.

## Frequency of changing tubes

- When a tube has been placed, document the approximate time of the next replacement.
- As a guide:
  - Gastrostomy tube with internal retention bolster: change if required or clinically indicated.
  - Balloon gastrostomy tubes: 3-6 months
  - Low profile devices (internal retention bolster): approximately 24 months
  - Balloon replacement low profile device: 3-6 months

- Life span of the tube can vary depending on medicines and stomach acidity.
<table>
<thead>
<tr>
<th>Paediatrics</th>
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<tr>
<td>If you have been trained and are competent to reinsert the tube then attempt to do so.</td>
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<td>If you encounter problems reinserting the tube, then you should attend your local A&amp;E. If you have not been trained to reinsert the tube you should attend your local A&amp;E taking your spare tube with you.</td>
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<td>Seek advice from specialists and local protocols</td>
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<td><strong>Adults</strong></td>
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<td>It is important to ensure that a spare feeding tube is readily available (correct type and size) irrespective of whether a patient is at home or in hospital.</td>
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<td>If a gastrostomy tube falls out then it should be replaced as soon as practicable, preferably within 6 hours, or the stoma will start to close. Mature stomas may take up to 48 hours or longer to heal but some will close more quickly.</td>
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<td>The permanent replacement tube or temporary tube should be the same or similar size to the tube which has fallen out.</td>
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<td>A foley urinary catheter can be used as a temporary measure and the patient may be fed through it until replaced with a suitable tube. However, note that foley catheters are licensed for urethral use only.</td>
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<tr>
<td>Any staff involved in changing gastrostomy tubes should have received appropriate training and maintained their competencies in doing so.</td>
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Fasting prior to and after permanent gastrostomy tube removal

There is no evidence to suggest that fasting is required before or after permanent tube removal, but it may be necessary for the patient to fast for up to 4 hours before the tube is removed, especially if a general anaesthetic is required.

Consider the needs of the individual patient but do NOT remove the tube immediately after food or drink.

Apply a dry dressing and secure with tape over the stoma site, a foam dressing such as Allevyn adhesive/non adhesive may be required for the first 24-48 hours. Change as required.
# BALLOON RETAINED GASTROSTOMY TUBES

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| Frequency of checking the balloon in balloon-retained tubes | Follow the manufacturer’s guidelines (usually weekly)  
Remove old water from the balloon and replace with fresh water (according to manufacturers guidelines) using a sterile syringe.  
Ideally check balloon on the same day each week.  
There is no evidence to suggest a preference for sterile water vs. sterile saline.  
Follow the manufacturer’s guidelines.  
Some manufacturers suggest cool, boiled water.  
| Unable to remove water from balloon | Check that luer slip syringe is attached to balloon port firmly.  
Try again, and if unsuccessful contact a specialist. |  |
# Radiologically Inserted Gastrostomy Tube Care

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<td>Care of sutures following insertion of Radiological Inserted Gastrostomy</td>
<td>Around the stoma there will be two to four sutures in situ. Please note that the gastrostomy tube is not held in place by the sutures. The sutures secure stomach wall to the abdominal wall to allow the stoma to be formed. These sutures should be removed seven days post procedure by a ward nurse, community nurse or outpatient nurse. Raise the metal fastener and cut the suture, then remove disc and sponge. Internal suture material will pass through the gastrointestinal tract. Some bleeding is normal when removing sutures. Appendix 2 Protocol for the care of RadioLogically Inserted Gastrostomy Medicina 14Fr G Tube</td>
<td>Early detection of complications after gastrostomy <a href="http://www.nrls.npsa.nhs.uk/resources/?entryid45=73457&amp;q=0%23%2Agastrostomy%23%2Ac">http://www.nrls.npsa.nhs.uk/resources/?entryid45=73457&amp;q=0%23%2Agastrostomy%23%2Ac</a></td>
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Appendix 1

Granuloma Flow Chart (for Adults)

Definition: A mass of inflamed granulation tissue usually associated with low grade infections

**Standard Treatment**
Observe the stoma site. Clean the area with soap and water. Rinse and dry well. Ensure the external fixator is positioned correctly – not tight or loose and is 2mm away from skin. Obtain swab for C&S if infection suspected. Treat infection as indicated by microbiology.

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**First Line Treatment**
Clean as box 1. Apply 1% Hydrocortisone Cream daily for one week.

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**Second Line Treatment**
Clean as box 1. Apply prontasan soaks for ten minutes daily. Apply foam dressings as above. Tighten the external fixator snug up to the foam dressing. If no improvement after one week try Third Line Treatment. Change dressing daily.

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**Third Line Treatment**
Clean as box 1. Apply Honey e.g. Actilite® and foam dressing. Tighten the external fixator snug up to the foam dressing. If no improvement after 1-2 weeks try Fourth Line Treatment. Change dressing daily.

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**Fourth Line Treatment**
Clean as box 1. Apply Honey e.g. Actilite® and foam dressing. Tighten the external fixator snug to the foam dressing. Can remain in situ for up to one week. If, after using a Honey product for 1-2 weeks and no improvement in the wound is seen, then further advice should be sought.

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**Clinical indication of infection – bacteria/fungal**
- Erythema, tenderness, purulent discharge, pain, swelling, malodour, elevated temperature
- A combination of the above could indicate infection
- Swab the stoma and treat with systemic antibiotics/antifungals

Please contact Nutrition Nurse Specialist via Hospital switchboard for further advice.

Further information can be found in the Lothian Joint Formulary [Lothian Joint Formulary (LJF)](https://www.lothianjointformulary.nhs.uk).
CARE OF PATIENT FOLLOWING TUBE INSERTION

Observations: The patient will be given sedation and analgesia - therefore monitor TPR, BP and Oxygen saturations every ½ hr for the first 2 hours then 4 hourly for 24 hours.

Pain management: A RIG procedure can be very painful for the first 24hrs. Patients must be regularly assessed for pain and adequate analgesia given.

Wound: Observe the abdominal insertion site for signs of leakage. The site may be covered with a dressing, which should be removed 24hrs post procedure.

Stoma site: Clean stoma site with saline using aseptic technique for the first 48 hours, thereafter clean with a clean cloth and water and dry thoroughly.

Tube: Observe the position of the tube on return to the ward and note any outward/inward movement. If there is any outward/inward movement gently move external bumper nearer to skin, leaving at least 2mm from skin surface. The tube is retained by water filled balloon (5mls). The tube should be rotated 360° once a day to allow tract formation.

Sutures: Around the stoma there will be two or three sutures in situ. Please note the gastrostomy tube is not held in place by the sutures. The sutures secure the stomach wall to the abdominal wall (gastropexy) to allow the stoma to be formed. Nursing staff should remove these sutures seven days post procedure. Lift sponge and cut at skin level. The remaining portion (T fastener in stomach) will be passed out in a bowel movement, or remain embedded in the stomach wall.

Reviewed Aug 2010- Review date may 2012/LMcV

Balloon: An internal water filled balloon holds the tube in place. The water volume should be checked and replaced once a week, after the tube has been in situ for 2 weeks. Attach 5ml luer slip syringe to balloon port and withdraw all the fluid. Discard liquid Re-inflate balloon with 5ml sterile water *NEVER ADMINISTER ANYTHING ELSE DOWN THE BALLOON PORT

Flushing: Flush the tube with 50mls of sterile water (hospital) or tap water community. If tap water identified as high risk use cooled boiled water. Flush before and after commencement of the feed and administration of medicines.

Eating: Patients must remain nil by mouth for 4 hours after procedure and until sedation has fully worn off.

Tube-feeding: Nil via the tube for the first 4 hours. After 4 hours, commence feeding with feed at 50ml per hour or as per dietitian’s regimen.

Medicines: Medication given via the tube should be given in liquid form where possible. Dispersible medicines may be given if dissolved well and flushed with 30 – 50mls of sterile water (hospital). In community use either tap or cooled boiled water. Crushed tablets should never be given and capsules should not be opened and administered via the tube. Please refer to the pharmacist or nurse specialist for advice. The tube is narrow (14fr) and can block easily. Never administer medicines down the balloon port.

Hygiene: The patient should not have an immersion bath for 2 weeks following the procedure. Showers are permitted after 24 hours. Ensure that the stoma site is washed first.

Additional information is available on intranet under policies and guidelines “Tube Feeding”