

Parastomal Hernias...

are they a compulsory, additional disfigurement for Colostomates?

Sue Hatton writes...there has been a marked increase in the number of patients contacting the Colostomy Association surrounding hernia development around the stoma. As Executive Trustee I feel compelled to find out why and to see if there is anything that can be done to improve patient outcomes and quality of life. In the first of a series of articles around 'living with a parastomal hernia' I have decided to investigate this abdominal protrusion.

What is a parastomal hernia?

The term parastomal hernia is used to describe a bulge or swelling around/under the stoma that leads to problems with stoma function and appliance security. This usually occurs gradually and the hernia may increase in size over time. When a stoma is created, the surgeon generally brings the end of the intestine out through the abdominal muscles, which provide support for the stoma. By making an incision in the muscle, a potential weakness is created. A parastomal hernia can occur when the edges of the stoma come away from the muscle, allowing abdominal contents (usually a section of bowel) to bulge out. Surveys have reported that, over time, up to 70% of ostomates develop a parastomal hernia; the longer a stoma is present, the more likely it is that a hernia will occur. Not all hernias give rise to symptoms.

What causes a parastomal hernia?

There are many factors that contribute to the development of a parastomal hernia including:

- Coughing and sneezing.
- Straining: this can happen when lifting heavy objects or during strenuous activities such as gardening.
- Infection at the site of the stoma or abdominal wound.
- Muscles becoming weaker with age.
- Being overweight.
- Poor siting of the stoma.
- Emergency surgery.

What problems can a parastomal hernia cause?

Some people complain of a dragging and dull ache around the hernia, especially at the end of the day or when they have been particularly active.

As the hernia increases in size, the shape of the stoma can change making it difficult to attach a pouch, which may cause problems with leakage. The surrounding skin can become tightly stretched and may become quite fragile making it more susceptible to breaking down or being torn when the pouch is removed. A hernia may affect stoma irrigation. It can become more difficult or time-consuming to introduce the water. The resulting output may be less satisfactory. Understandably, the larger the hernia becomes the more difficult it is to conceal beneath clothes and this can cause embarrassment.

What is the treatment for a parastomal hernia?

First line treatment is to wear a firm stoma support garment. There is a wide selection available in the form of belts, girdles, pants or boxer shorts. A stoma care nurse can advise on the most suitable support garment for you. Improvements in the tone of the abdominal wall through exercise or Pilates, aimed at strengthening the core muscles, may help. Most parastomal hernias do not require surgery. However, if the hernia is causing pain and/or becoming unmanageable, surgery can be considered. As with all operations that require an anaesthetic there are associated risks. Surgery, therefore, may not be recommended for those who are elderly and infirm or those with serious heart or breathing problems. Having a hernia repair does not guarantee it will not recur.

There are different methods of repairing a hernia: some will be carried out through an incision in the abdomen (open surgery) others can be done by keyhole surgery (laparoscopically). A tissue repair at the site of the hernia is a relatively simple procedure, but there is a high risk of the hernia recurring. Repair and re-siting of the stoma to another location on the abdomen is a bigger operation involving a larger incision, but the chance of the hernia recurring is lower. Repair and reinforcement of the hernia site with mesh carries a very small risk of infection but the chance of the hernia recurring is lower. When considering an operation to repair a

parastomal hernia always ask the surgeon about the technique that they propose to use. Only have surgery if the first-line measures have not worked or if you have been admitted to hospital with a complication.

Can parastomal hernias be prevented?

Below are some suggestions, which may reduce the likelihood of developing a hernia:

For three months after surgery...

- Avoid heavy lifting
 - Support your stoma and abdomen whilst coughing
- And then...
- Try to maintain good posture at all times, consider Pilates
 - Avoid heavy lifting whenever possible, but if you have to lift something remember to:
 - wear a support garment (Belt or underwear)
 - place your feet apart (one foot in front of the other), keep your back straight and bend your knees
 - keep the object you are lifting close to your body
 - Wear a support garment if you are doing heavy work e.g. decorating or gardening
 - Avoid gaining weight, or try to lose weight if you need to
 - Take regular exercise e.g. walking, swimming
 - Pilates is especially suitable for ostomates and particularly good for developing stronger abdominal muscles.
 - It is best to avoid high-impact exercises, which involve hard jolts to the body e.g. football or squash
 - It is important to check with your surgeon or stoma care nurse before undertaking any exercise programme

Sue continues...to learn more about patients 'living with a parastomal hernia' I have asked Salts Healthcare to write an article for Tidings based on their recent major research study amongst ostomates in the UK. (All questionnaires received and analysed were sent in from people who had diagnosed hernias from healthcare professionals). So please look out for this in a future issue. The following paragraph gives a précis of the content and direction of the survey.

The reasoning behind conducting the research was to improve the understanding of the experiences of patients 'living with a parastomal hernia'. The survey was particularly interested in the condition of the skin, and the changes to skin condition once a hernia has developed. The amount and frequency of leaking, the change to the size of the stoma once a hernia has developed, and whether ostomates needed to change to a different appliance because of the hernia. The project also studied the time it took a patient to develop a parastomal hernia and the incidence of further surgery to repair the hernia and re-site the stoma. Also, important to the study was to look at ways in which the parastomal hernia affects people and whether ostomates were seeking any help to manage their parastomal hernias.

I am convinced this study will provide us with a clearer picture of those 'living with a parastomal hernia'. Being an inquisitive soul and passionate patient advocate I too have a series of questions...that might provoke comment or perhaps answers from Tidings readers' and healthcare professionals alike...read on:-

- Does the patient get enough warning about the possibility of herniation?
- Should a patient be automatically fitted with a support belt and given a leaflet on prevention? (Is there opportunity for the stoma care nurse to spend enough quality time with patients, following surgery and does the patient fully absorb the information supplied).
- Can weak stomach muscles mean a parastomal hernia is inevitable - could this be prevented if the patient is given an exercise plan prior to elective surgery?
- Is a parastomal hernia due to a lack of inheritance of good genes or is it just down to luck that some of us have perfectly formed stomas and no hernias - 70 % of colostomates have to cope with this additional burden - why?
- Is the marked increase in the number of bowel operations, an indication of the surgeons meeting targets and not considering the patient's quality of life following surgery?

And to finish a thought provoking email addressed to the Colostomy Association...

Dear Chairman and Trustees of the Colostomy Association,

I write about the vexed issue of parastomal hernia. In general that the incidence of parastomal hernia is very high; it is believed that end ileostomy has 16% parastomal hernia rate, colostomy has 24% parastomal hernia rate. The recurrence after repair of parastomal hernia can range from 10% to 77%.

Even with stomas brought out through a prophylactic mesh results in 5% recurrence rate in 1 year and 13% recurrence rate in 5 years. However, what really fascinates me is that in 1977 it was published in the journal Disease of Colon and Rectum, American surgeons found that in 106 patients they had 0% parastomal hernia rate - no parastomal hernia - when the colostomy was brought out through the umbilicus (with an overall complication rate of 3.9%) (Raza SD, Portin BA, Bernhoft WH. Umbilical colostomy: a better intestinal stoma. Dis Colon Rectum. 1977 Apr;20(3):223-30).

Sometimes we forget to learn the lessons from the past. My personal view is that this is mind blowing. Given the anatomical and evolutionary fact that intake and output orifices are in the midline (including the umbilicus before we are born), it now strikes me as strange why surgeons ever thought of placing stomas away from the midline. The difficulty for open surgery in current practice would be the non-availability of the umbilicus because of the mid-line incision.

However, with the advent of laparoscopic surgery, the umbilicus is now available for stoma placement. With a published 10% to 70% parastomal hernia rate and up to 77% recurrence of repaired parastomal hernias, the resources taken up in dealing with these are enormous. The impact on patients are profound. It looks like we could have a winning situation for everyone if we placed end stomas through the umbilicus. We could have dramatically better results.

No one currently places stomas through the umbilicus. Some patients I have spoken to have said they would not mind this but others were not so sure. I wondered if the Colostomy Association was aware that a 0% parastomal hernia rate was possible in the past. I wonder what the Colostomy Association's view is on umbilical stomas.

Kind regards and best wishes,

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PS: *I have no vested interest in this issue. My aims are to explore all options for enhancing patient experience, reducing complications and sparing resources.*

A booklet is available from the Colostomy Association entitled 'Parastomal Hernias' to obtain a copy contact general enquiries on: 0118 939 1537.

If you have found the content of this article interesting or have your own questions and experiences of 'living with a parastomal hernia'. Please get in touch with the editor at: editor@colostomyassociation.org.uk or via cass@colostomyassociation.org.uk.

Note: The CA offers a 24hr Helpline run by dedicated trained volunteers who are colostomates - it is available to everyone 'living with a colostomy', and to their families and their carers, please contact: 0800 328 4257. If you have any issues or concerns about your stoma contact your GP or stoma care nurse.

Reference: Parastomal Hernias Booklet 2011 - produced by the Colostomy Association in association with Mr Ian Daniels FRCS Consultant Colorectal and General Surgeon, Royal Devon & Exeter Hospital and Jo Sica RGN, ENB216 Clinical Nurse Specialist, Stoma Care.

