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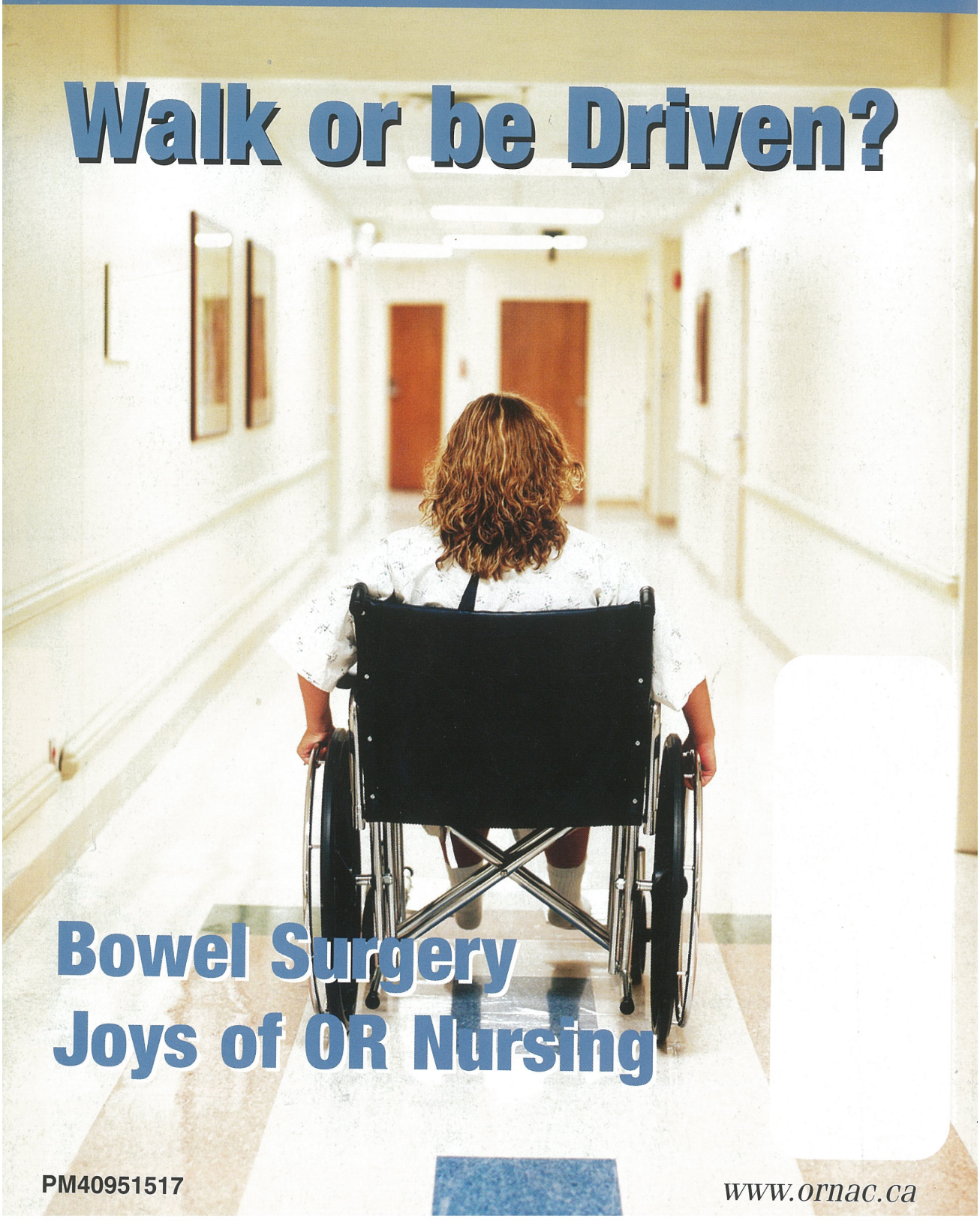

Walk or be Driven?

Bowel Surgery
Joys of OR Nursing

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President's Message

It is with mixed emotions that I write my last message as President of ORNAC. I am filled with gratitude and respect for those nurses who I have worked with on the ORNAC board. Their spirit and commitment to the organization has ensured it will continue to thrive and deliver what you, the perioperative nurse, needs.

I have had the pleasure of meeting ORNAC members and perioperative nurses from around the world and to work with them to share ideas and improve resources on a national and global scale. In the coming months and over the next few years, ORNAC will continue to improve the resources available to its members and to introduce new ideas that will assist our members in the delivery of the highest standard of care.

It is with pleasure that I share this message with your new president, Linda Socha. Linda is committed to the ideals and success of ORNAC and I know she will represent us well. She brings to the job her humour and enthusiasm as well as with a deep commitment to perioperative nursing. I respect her as both a person and a leader in the perioperative community. Being a good leader takes more than good organization skills. It involves diplomacy, a respect for others, and a democratic approach. Leaders are sought after for their abilities to reach out to everyone. By these standards Linda will be an exceptional leader. I will enjoy the next two years with her at the helm – and I suggest we all buckle up!

Marcy

Marcy McKay, RN, CPN(C), is Past-President of the Operating Room Nurses Association of Canada. She is a staff nurse at Victoria General Hospital, was Conference Co-Chair for ORNAC National 2007, and is the past ORNAC Webmaster.

I deliver my first President's message with a mixture of enthusiasm and nervous anticipation. The fantastic work and dedication to ORNAC that has been provided by previous Board members has laid a strong foundation with endless opportunities for organiza-tional growth. This groundwork is leading ORNAC into a new era that will demonstrate its commitment to improving perioperative practice and, ultimately, patient care. ORNAC is in the process of finalizing its three-year strategic plan designed to increase the focus on areas that will benefit you, the ORNAC member. Nurturing relationships with our colleagues nationally and globally, exploring new ideas for marketing ORNAC, and expanding our educational portfolio are just a few of the activities on ORNAC's agenda. Add this to the plans for continued development of the Standards document as well as expansion plans for the Journal, the website, and the national conference. Needless to say we have a lot of work to do!!

Over the past few years I have experienced firsthand the passion and fervor demonstrated by this association. It has been able to work through challenging issues while continuing to build an organization that is respected for its professional leadership in perioperative practice. I would be remiss if I didn't take this opportunity to encourage my perioperative peers to get involved with their provincial organization. Every provincial group plays an essential role in ORNAC's direction. Our collective voice can initiate change, inspire ideas, and motivate in the name of excellence. I look forward to my term as President and will strive to further the growth and development of ORNAC. Marcy said it best…buckle up!

Linda M. Socha

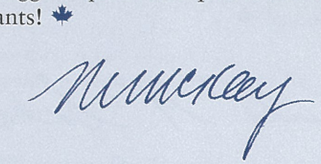
Linda M. Socha, RN, BSN, RNFA, CPN(C), CEBT, CTBS, is President of the Operating Room Nurses Association of Canada. She is Clinical Nurse Educator for the OR at Saskatoon City Hospital, Manager of the Saskatchewan Transplant Program, and the past Chair of the ORNAC Editorial Committee.

Message de la présidente

La rédaction de mon dernier message en tant que présidente de l'AIISOC provoque chez moi des émotions contradictoires. Je ressens une reconnaissance et un respect profond pour les professionnels infirmiers avec lesquels j'ai travaillé au sein du conseil de l'AIISOC. Leur enthousiasme et leur dévouement à l'organisme ont assuré sa croissance continue tout en fournissant ce dont vous, les infirmières et infirmiers périopératoires, avez besoin.

J'ai eu l'heureuse occasion de rencontrer des membres de l'AIISOC et des infirmières et infirmiers périopératoires des quatre coins de la planète et de travailler avec eux pour partager des idées et améliorer les ressources aux échelles nationale et internationale. Pendant les mois et les années qui viennent, l'AIISOC poursuivra l'amélioration des ressources auxquelles ses membres ont accès ainsi que le développement de nouvelles idées qui les aideront à fournir des soins de plus haute qualité.

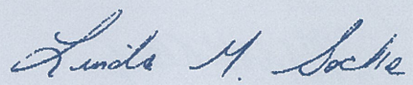
C'est avec plaisir que je partage ce message avec votre nouvelle présidente, Linda Socha. Linda s'engage aux principes et au succès de l'AIISOC et je suis certaine qu'elle représentera très bien l'association. Elle apporte au poste son sens d'humour, son enthousiasme et un dévouement profond aux soins de salle d'opération. Je la respecte comme individu et comme chef de file dans le domaine périopératoire. tre un bon leader exige bien plus que de bonnes habiletés organisationnelles; il faut aussi être diplomate, respecter les autres et suivre une approche démocratique. Un leader se distingue par sa capacité d'établir des connexions personnelles. Selon ces critères, Linda sera un leader exceptionnel. J'ai hâte aux deux prochaines années avec elle au gouvernail – et je suggère qu'on soit prêt à des changements intéressants!



Marcy McKay, infirmière autorisée, CPN(C), est la présidente sortante de l'Association des infirmières et infirmiers de salle d'opération du Canada. Elle est infirmière au Victoria General Hospital, était la co-présidente de la conférence nationale de l'AIISOC en 2007, et était aussi la gestionnaire du site Web de l'AIISOC.

C'est avec un mélange d'enthousiasme et un peu de nervosité que je compose mon premier *Mot de la présidente*. Grâce à l'incroyable travail effectué et le dévouement à l'AIISOC démontré par les membres du conseil qui me précèdent, il existe maintes manières de continuer à faire croître l'organisme. Le terrain est prêt pour se lancer dans une nouvelle ère et faire preuve de notre dévouement envers l'amélioration des soins périopératoires et, par la suite, les soins de la santé au sens plus large. Nous sommes actuellement en train de finaliser un plan stratégique de trois ans conçu pour viser davantage les activités dont vous, les membres de l'AIISOC, profitent le plus. Tisser des liens avec nos collègues nationaux comme internationaux, examiner de nouvelles façons de faire la publicité de notre association et élargir notre portfolio en formation ne sont que quelques-unes des activités à l'agenda. À celles-ci ajoutons l'élaboration continue des normes ainsi que l'expansion de la revue, du site Web et de la conférence nationale. Il va sans dire qu'il y a beaucoup à faire!

Depuis quelques années j'ai vu de mes propres yeux la passion et la ferveur démontrées par cette association. Nous avons réussi à passer à travers des circonstances difficiles tout en continuant le travail d'épanouissement de notre organisme si respecté pour son leadership professionnel en soins périopératoires. Je ne peux me passer de cette occasion d'encourager mes collègues à s'impliquer dans leurs associations provinciales. Chaque groupe provincial joue un rôle important dans la direction que prend l'AIISOC. Notre voix collective peut inciter le changement, inspirer et motiver les autres à viser l'excellence. C'est avec plaisir que j'assume le rôle de présidente et avec enthousiasme que je viserai le développement de l'AIISOC. Comme l'a si bien dit Marcy : soyez prêts!



Linda M. Socha, infirmière autorisée, baccalauréat en sciences infirmières, RNFA, CPN(C), CEBT, CTBS, est la présidente de l'Association des infirmières et infirmiers de salle d'opération du Canada. Elle est infirmière clinique enseignante pour la salle d'opération de Saskatoon City Hospital, gérante du programme de greffe de la Saskatchewan et présidente sortante du comité de rédaction de l'AIISOC.

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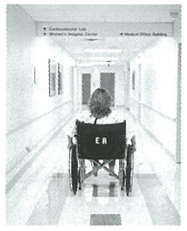
EDITORIAL CONTENTS



Walk or be Driven?

INDUSTRY HAPPENINGS

The Journal is printed on paper that is acid and chlorine free and contains 50% recycled content.

CHIRURGIE INTESTINALE PAR LAPAROSCOPIE

Auteure : Carol Shack, infirmière autorisée, CPN(C), infirmière enseignante régionale, Winnipeg Regional Health Authority (WRHA).

RÉSUMÉ :

La chirurgie intestinale est effectuée quotidiennement dans grand nombre d'hôpitaux à travers le monde. Le développement de la chirurgie laparoscopique pendant les années 1990 a fait de la chirurgie intestinale par laparoscopie une option de plus à considérer par les patients. L'article passe en revue l'anatomie générale du gros intestin et identifie les indications, les contra-indications, les préparatifs à la chirurgie, et les faits préopératoires à considérer relatifs à la chirurgie intestinale par laparoscopie. Une brève description des divers types de résection intestinale par laparoscopie est présentée accompagnée des complications et des avantages de chacun. L'avenir de la chirurgie intestinale par laparoscopie est également discuté.

LAPAROSCOPIC BOWEL SURGERY

Author: Carol Shack, RN, CPN(C), Regional Perioperative Nurse Educator, Winnipeg Regional Health Authority (WRHA).

ABSTRACT

Bowel surgery is performed on a daily basis in many hospitals around the world. With the introduction of laparoscopic surgery in the 1990s, laparoscopic bowel surgery has become an option for patients to consider. This article will briefly review the anatomy of the large bowel and identify indications, contraindications, preoperative preparations, and intraoperative considerations for laparoscopic bowel surgery. A brief description of the various types of laparoscopic bowel resection procedures will be presented along with the advantages and complications. The future of laparoscopic bowel surgery will also be presented.

INTRODUCTION

The technique for laparoscopic bowel surgery has been explored since 1991. The first published study of laparoscopic colectomy was in 1991 by Jacobs et al.[1] The procedure can be performed for an anterior resection, hemicolectomy, colostomy formation, colostomy closure, sigmoid colectomy, or abdominal perineal resection. To perform these procedures, a surgeon requires advanced skills in laparoscopic surgery. Surgeons are required to operate from multiple view points, recognize anatomy from unfamiliar aspects, be familiar with complex laparoscopic instrumentation and have dexterity in suturing.[2] In addition, surgeons need to identify the site of the lesion, mobilize the segment of the bowel, devascularize the bowel's mesenteric blood supply, and create a functional end-to-end anastomosis all without the use of tactile sensation. There is a long learning curve involved in becoming proficient in performing this procedure. The surgeon may need to perform 20-50 cases in order to become proficient. The technique of the surgeon is especially important when performing surgery for malignancies and can be perfected by performing surgery on patients with non-malignant tumours.

ANATOMY

The large intestine begins at the ileocecal valve, terminates at the anus and consists of three parts: the colon, cecum, and rectum.[3] The cecum is attached to the ileum and includes a blind pouch that extends below the ileum. Attached to this blind pouch is the appendix.[4]

The colon is divided into the ascending colon, transverse colon, descending colon, and the sigmoid colon. The ascending colon extends from the ileocecal valve to the hepatic flexure. The upper portion of the ascending colon lies posterior to the right lobe of the liver and anterior to the right kidney. The transverse colon runs from the hepatic flexure to the splenic flexure. The transverse colon lies inferior to the stomach and is attached to the transverse mesocolon. The descending colon runs from the splenic flexure to just below the iliac crest. The sigmoid colon lies on the inner surface of the left iliac muscle. The sigmoid colon lies in both the abdomen and the pelvis. The S-curve of the sigmoid colon starts in the pelvis and ends at the rectum. The rectum consists of circular and complete longitudinal muscle layers. The rectum is surrounded by the pelvic fascia and lies anterior to the sacrum and coccyx. It originates at the sigmoid and terminates in the anus. The superior mesenteric artery supplies blood to the ascending colon, hepatic flexure, transverse colon, and splenic flexure. The inferior mesenteric artery supplies blood to the descending colon, sigmoid colon, and rectum.[4]

INDICATIONS

Indications for laparoscopic bowel surgery are the same as for traditional bowel surgeries. Indications are divided into benign and malignant.[4,5]

Benign

1. Polyps and familial ademtous polyposis (growths in the large bowel that may advance to malignant lesions);
2. Localized inflammatory bowel disease such as crohn's or colitis;
3. Cecal or Sigmoid volvulus;
4. Symptomatic arteriovenous malformation;
5. Diverticular disease that causes localized inflammation, bleeding, or stricture;
6. Closure of colostomy;
7. Ischemic colitis;
8. Rectal Prolapse; and
9. Constipation.

Malignant

Laparoscopic bowel resection for colon cancer may be performed on local lesions for cure or metastatic lesions for palliation. The literature suggests that at this time laparoscopic bowel surgery should only be offered to cancer patients who are in a randomized trial.[6] Data coming in indicates short-term benefits and further study is indicating that there may also be long- term benefits. In the treatment of cancer, reliable long-term benefit data is still unavailable. Early reports indicate an increase in port site recurrence or metastases compared to open surgery, but this may be incorrectly reported.[5,7,8, 9,10,11,12,13,14] Poor initial results regarding the use of this procedure for malignant tumours may be related to poor technique and proficiency. As mentioned earlier, proficiency can be improved by performing this surgery for non-malignant tumours.

CONTRAINDICATIONS

Contraindications are divided into absolute and relative. Relative indications may not preclude the patient from surgery.[4,6]

Absolute

1. Intolerance to general anaesthetic as the patient would be unable to tolerate a laparotomy;
2. Tumors larger than 8 to 10 cm.
3. Diffuse fecal or purulent peritonitis. This would prevent the complete exploration, irrigation, drainage, or debridement of the abdominal cavity in a timely fashion;
4. Uncorrectable bleeding either active or that resulting in hypovolemia;
5. Extensive metastatic spread to one or more adjacent organs;
6. Extensive previous surgery with known adhesions;
7. Surgeon inexperience;
8. Massive abdominal distention; or
9. Colonic perforation and free peritonitis.

Relative

1. Inflammatory bowel disease with a friable bowel wall;
2. Morbid obesity;
3. Large abdominal aortic aneurysm;
4. Generalized peritonitis;
5. Advanced cardiopulmonary disease; or
6. Advanced pregnancy.

PREOPERATIVE PREPARATION

Preoperatively the patient must undergo various tests and procedures. Because of the loss of tactile sensation it is extremely important that the exact locations of any tumours or polyps are identified. This can be done by means of an intraoperative ultrasound, a preoperative plain x-ray, or injection of India ink to mark the location of the lesion preoperatively. Preoperatively the patient will require a colonoscopy or barium enema to identify the lesion and have biopsies or specimens obtained and sent for microscopic analysis.[5] If the patient has cancer then Liver Function Test (LFT) and Carcinoembryonic Antigen (CEA) levels are drawn. Also for cancer patients, a computerized tomography (CT) of the abdomen and pelvis are done. Depending on the patient's age, an

electrocardiogram (EKG), chest x-ray, and serum creatine are done. Routinely glucose, electrolytes, hemoglobin, urea, a type and screen or a group and match are done and prothrombin time/partial thromboplastin time is drawn.[4]

The patient receives a bowel preparation preoperatively. Adverse effects of the bowel preparation may include serious hypocalcaemia, hyperphosphatemia, hypernatremia, hypokalemia, and metabolic acidosis. The patients with renal insufficiency or congestive heart failure, as well as frail and elderly patients are usually adversely affected by the use of two bottles of sodium phosphate as a bowel preparation. It is now recommended that no more than one bottle of sodium phosphate be used in a 24 hour period in order to prevent complications. Prophylactic antibiotics are given.

In the preop holding area it is important for the OR nurse to assess any of the patient's physical limitations that will affect positioning. The patient must not have anything to eat or drink. If the patient is diabetic, a blood sugar is checked using a glucometer. The nurse ensures that the patient has taken anti-hypertensive medication as scheduled. The circulating nurse should be prepared to assist with the insertion of an epidural and other invasive monitoring as determined by anaesthesia.

INTRAOPERATIVE CARE

Room Set-up

The surgeon stands on the side of the patient that is opposite to that being operated on. For abdominal perineal resection, anterior resection, or sigmoid resection, the surgeon usually starts on the right side, but may move from side to side throughout the procedure. The assistant will stand opposite of the surgeon. The camera operator will stand at the top or at the bottom of the surgeon depending on the portion of bowel being operated on. Depending on the procedure the scrub nurse may stand between the patient's legs or on the opposing side of the surgeon.

Equipment

Locate the main laparoscopic monitor on the side of the patient opposite to that being operated on. Locate the secondary monitor on the opposing side. If the procedure is done in the supine position, the monitors are placed at the head of the bed. Depending on the segment of the bowel being operated on, it may be necessary to move the monitors to approximately halfway down the side of the bed. If the procedure is a laparoscopic Abdominal Perineal Resection (APR), anterior resection, or sigmoid resection done in the lithotomy position, the monitors are placed at the foot of the bed. The suspension arm may be used to elevate cables off of the floor if equipment boom arms and monitors are not available in the theater. This will prevent staff tripping over cables or accidentally running over them with tables. The cautery machine is placed at the top left of the patient and is plugged into the wall outlet separate from the other equipment and monitors. This prevents interference from the electrical equipment monitors and anaesthetic equipment. A cautery pencil with smoke evacuator is opened for use during the mini laparotomy or ostomy formation part of the surgery. The vessel sealing device is placed at the top of the bed. The site of the surgery will dictate where to place this equipment. It is placed on the same side as the surgeon. The ligasure, ultrasonic device, and cautery are not used simultaneously.

Instrumentation

It is imperative that the scrub nurse be familiar with the operation and function of all laparoscopic equipment and instrumentation. The scrub nurse will have laparoscopic instrumentation and cut down instruments on the surgical table. Open trays are available in the event that you need to open. A full count of instruments, miscellaneous supplies, and laparoscopic seals is done (laparoscopic instruments are not counted). A full count is performed at closure as a mini-laparotomy is made to remove the specimen for a bowel resection or anterior resection and the perineum is opened to remove the specimen for a laparoscopic APR. A laparoscopic bowel clamp is always used. Pneumoperitoneum is initiated by introducing a Hassan trocar. For an anterior resection, sigmoid resection, or abdominal perineal resection a 5mm ligasure or ultrasonic device is used for dissection. This may also be used for right hemicolectomy or colostomy

formation. To transect the bowel low in the pelvis an Endo GIA stapler will be used.

Positioning

For a laparoscopic right hemicolectomy, high left hemicolectomy, or ostomy formation the patient is placed in supine position. Arms are extended on padded arm boards ensuring that the arms are extended less than 90 degrees. For a Laparoscopic anterior resection, laparoscopic APR, or sigmoid resection the patient is placed in lithotomy using universal stirrups. For lithotomy cases, both arms are tucked as the surgical team will be working in the lower part of the body and will need to stand facing the feet of the patient. For all cases, compression stockings, tensors, or sequential compression stockings may be applied to aid in prevention of deep vein thrombosis. Some surgeons may request insertion of a nasogastric tube. A foley catheter is inserted and a warming blanket is applied.

PROCEDURE[2]

The surgeon may request a sterile rigid sigmoidoscope, a flexible sigmoidoscope, or a colonoscope to identify the lesion intraoperatively. Additional instrumentation may include a laparoscopic doyen bowel clamp and a laparoscopic needle driver. Additional bowel clamps may be needed if any transaction takes place outside of the abdomen. Usually a Hassan trocar is the initial trocar followed by additional trocars of various sizes to allow for introduction of the various instruments. Usually 4-5 trocars are placed. A 10mm 30 degree telescope or a 5mm 30 degree telescope will be used. A wound protector is used when removing the specimen from the abdomen to prevent infection or to prevent the possibility of seeding if surgery is for a malignant lesion. If the surgery is being done for benign disease, the vessels are divided close to the bowel wall. If the surgery is being done for cancer, the vessels are transected as close to their origin as possible. This results in a wide mesenteric resection and long proximal and distal margins.[12,14] Placement of trocars is surgeon specific; however placement must ensure adequate access to all parts of the bowel.

Right Hemicolectomy

The patient is placed in reverse trendelenberg and rotated to the left or right depending on the part of the bowel being operated on. This placement allows for the best exposure during dissection. The liver is allowed to drop and the bowel that is being operated on is displaced from the field allowing better exposure. For each case, the abdomen is examined for additional pathology before proceeding with the slated case. Once the pathology is removed from the abdomen, the portion of the bowel removed is opened to ensure the pathology has been adequately removed.

Understanding of the anatomical positions of the right ureter, second and third portions of the duodenum, ascending colon, pancreas, and right kidney are important for a right hemicolectomy. Additional trocars may be inserted depending on the equipment required. The small bowel is examined from the ligament of Treitz to the ileocecal valve. Mobilization of the ascending colon begins at the cecum. Traction/counter traction and curved metz scissors are used to dissect the colon from the lateral peritoneal attachments. The distal ureter is usually identifiable as dissection approaches the hepatic flexure. Detachment of the omentum from the transverse colon facilitates colonic mobilization. The ileocecal and right branch of the middle colic vessels are divided with ligaclips, Ligasure, or an ultrasonic device. Some literature talks about dividing with a vascular stapler, but this adds substantial cost.

Following mobilization, the bowel may be transected outside of the abdomen via a mini-laparotomy or intracorporeally. The transaction is done with bowel clamps, blade, and/or a stapler. Anastomosis may also be done either externally or laparoscopic. A regular gastrointestinal anastomotic (GIA) stapler will be used if the anastomosis is done outside of the abdomen. If the anastomosis is done intracorporeally then an endo GIA stapler with cartridges will be used. If transaction and anastomosis is done outside the abdomen, a wound protector is used prior to pull the bowel segment through the mini laparotomy. After anastomosis is completed through the mini Laparotomy the bowel is reintroduced to the abdominal cavity and the fascial opening is

closed. Once the anastomosis is complete the abdomen is checked one last time, the ports are removed, and the port sites are closed.

Sigmoid Colectomy/Anterior Resection

Once the trocars are placed, the sigmoid colon is mobilized past the sacral promontory and into the pelvis. Dissection is accomplished with the use of a ligasure, ultrasonic device, metz scissor, and cautery. The rectum and the sigmoid are retracted medially and cephalad to suspend the bowel and mesentery from the anterior abdominal wall.[5] This is done with a laparoscopic bowel clamp. The lateral ligaments are exposed and anterolateral ligaments are transected. The sigmoid colon and descending colon are mobilized and the ureter is identified. The sigmoid colon should be mobilized past the sacral promontory into the pelvis. A true low anterior resection removes all of the mesorectum and allows transection of the rectum at the top of the anal canal (5cm above the Dentate Line).[5] A GIA stapler, designed for use in laparoscopic procedures, with a 60mm x 3.5mm cartridge is required to transect the bowel in the pelvis. Usually one cartridge is adequate.

Once the bowel is transected distally, a mini laparotomy is made and the bowel is protected by the wound protector and brought up through the incision. The proximal end is transected outside of the abdomen with the use of bowel clamps and a 15 blade. The purse string suture is placed on the proximal end of the bowel. The anastomosis is accomplished with an intra luminal (IL) stapler. The anvil from the IL stapler is secured. Once the anvil is secured, the bowel and anvil are reintroduced to the abdomen and the peritoneum of the mini laparotomy is closed. At this point the surgery reverts back to the laparoscopic mode.

The bottom end surgeon inserts the handle portion of the EEA stapler into the rectum. Through laparoscopic visualization the top end surgeon attaches the anvil to the stapler. This is accomplished with the 10mm right angle. The EEA stapler is fired by the bottom end surgeon in the usual way. The surgeon may check the anastomosis with the use of a sigmoidoscope. Once the anastomosis is complete the abdomen is visualized to ensure there is no bleeding and the anastomosis is intact. Once this is done, the telescope and instrumentation are removed and the ports are closed.

Abdominal Perineal Resection[15]

The dissection for an abdominal perineal resection (APR) is similar to that mentioned for an anterior resection. Further dissection of the rectum is done to the cul-de-sac. The perineal dissection precedes the same as for an open case. The perineal incision is closed as for a conventional APR. While the perineal resection is taking place, the transected portion of the bowel is pulled up through the left rectus abdominus colostomy site and a colostomy is fashioned.[5] Drains are placed into the pelvis through the right lower port site. Ports are closed in the usual way.

COMPLICATIONS

Several articles discuss the complications of laparoscopic bowel surgery.[4,5,12,16] Complications from these procedures may be related to pneumoperitoneum, position, instrumentation, or the surgery itself. Complications related to pneumoperitoneum, positioning, and instrumentation are common to all laparoscopic procedures. Perspective and technical limitations of laparoscopic bowel surgery make injury to the ureter, urinary bladder, and duodenum most likely.

Complications of pneumoperitoneum:

1. Hypercarbia, acidosis;
2. Ventilation/perfusion mismatching;
3. Hypertension;
4. Bradyarrythmias;
5. Ventricular arrhythmias;
6. Gas Embolism;
7. Pneumothorax;
8. Pneumomediastinum;
9. Subcutaneous emphysema; and
10. Phlebothrombosis and pulmonary embolism.

Complications related to positioning:

1. Neuropathy;
2. Hypotension; and
3. Deep vein thrombosis.

Laparoscopic Bowel Surgery (cont.)

Complications related to instrumentation:

1. Trocar and verres needle injuries of the intestine or major vessels;
2. Abdominal wall bleeding;
3. Trocar site hernia;
4. Electrocautery burns;
5. Wound infections; and
6. Retractor injury.

Complications related to the surgery:

1. Trocar site recurrence in cancer patients. This is theorized to be caused by tumor cell spillage, specimen retrieval through port sites without wound protection, possible detrimental effects on the intraperitoneal immunity by CO2, mechanical inoculation from instruments, tissue trauma causing ischemia, gas turbulence, or leakage around trocar sites causing a chimney affect. Numbers are now indicating that abdominal wall recurrence is no more common in laparoscopic surgery than in open surgery; [5,7,8,9,10,11,12,13,14]
2. Bowel injury;
3. Ureteral injury related to difficulty in identification;
4. Anastomotic leak;
5. Duodenal injury;
6. Torsion of the bowel; and
7. Inability to identify exact location of the lesion.

ADVANTAGES

Reported advantages include:[4,5,6,10,11,12,13,14,17,18]

1. Improved cosmesis;
2. Quicker return to normal bowel function;
3. Shorter hospital stay;
4. Decreased post-op ileus;
5. Decreased pain and therefore less use of narcotics and ease of movement;
6. Quicker return to normal daily activities;
7. Decreased number of adhesions related to a decreased inflammatory response. Bessler et al report that in a porcine model comparing adhesion formation, after 14 days only 9% of those having a laparoscopic assisted colectomy had adhesions whereas 82% developed adhesions post laparotomy;
8. Quicker ambulation; and
9. Better immune response. Some literature suggests that the stress to the body's immune system is less resulting in stronger immune systems post laparoscopic surgery.[5,7,8,12,14] This could contribute to fewer infections, faster recovery, and better killing of circulating malignant tumor cells.

CONCLUSION

Laparoscopic bowel surgery is appropriate for the treatment of benign disease. More studies need to be conducted relating to its effectiveness in the treatment of malignant disease as early indications of metastasis and seeding may have been wrongfully reported. Advantages for the patient are numerous allowing for a faster return to normal daily activities than for an open procedure. With increasing numbers of laparoscopic bowel surgeries being performed, and with improved techniques, future reports may indicate laparoscopic bowel surgery is the standard of practice.

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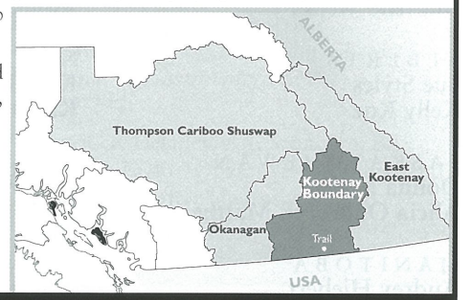

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LA JOIE DES SOINS PÉRIOPÉRATOIRES

Auteure : *Coleen Ellen Mary Newland, infirmière autorisée, CPN(C), est une Néo-Zélandaise qui travaille dans le domaine des soins périopératoires depuis 1977. Sa carrière a débuté en Australie et à Nouvelle-Zélande et elle travaille au Canada depuis mars 2004. Elle a reçu son certificat de grade supérieur en soins périopératoires en 1987, son certificat canadien en soins infirmiers en 2004 et son CPN(C) en 2005. Elle travaille actuellement à St. Paul's Hospital à Vancouver en Colombie-Britannique et s'est jointe au BCORNG en 2004.*

Cet article est adapté d'un discours du même titre présenté par l'auteure à la conférence mondiale sur les soins aux patients World Conference on Surgical Patient Care – One World – Working Together, à Barcelone en Espagne le 29 septembre 2005.

RÉSUMÉ :

Quand une infirmière commence sa carrière dans le domaine des soins périopératoires, elle entre dans la salle d'opération et elle ne quitte jamais. Est-ce qu'elle rentre chez elle?

Qu'est-ce qui nous attire?
- nos expériences d'étudiant?
- un emploi choisi plutôt au hasard?
- un désir profond de travailler dans la salled'opération?
- un changement de carrière?

Quelle que soit la raison de notre arrivée, plusieurs choses nous gardent dans la salle d'opération : le travail d'équipe, les amitiés, les défis, la camaraderie et l'apprentissage continu de nouvelles habiletés.

Pour certains, c'est la poussée d'adrénaline qui accompagne chaque individu en crise franchissant le seuil.

Ou c'est peut-être parce que nous nous sentons que nous soignons vraiment et que nous pouvons agir dans le meilleur intérêt des patients. Nous nous rendons compte que les patients se fient à nous dans un moment où ils sont vraiment vulnérables et qu'ils sont incapables de parler pour eux-mêmes.

Qu'est-ce qui crée une infirmière périopératoire, et qu'est-ce qui la garde?

Au moyen d'un questionnaire de recherche qualitative distribué à des infirmières et infirmiers assistant à une conférence nationale sur les soins périopératoires, l'auteure a analysé les commentaires de ceux-ci touchant leurs émotions, leurs attitudes et leurs connaissances afin de déterminer ce qui crée un professionnel de soins périopératoires et ce qui les garde dans le domaine pendant de nombreuses années.

Les résultats, accompagnés d'observations personnelles de l'auteure, sont présentés dans l'article.

THE JOYS OF PERIOPERATIVE NURSING

Author: *Coleen Ellen Mary Newland, RN, CPN(C), is a New Zealand Registered Nurse who has been working in the Perioperative environment since 1977. She began her career in Australia and New Zealand and has worked in Canada since March 2004. She obtained a Graduate Certificate in Perioperative Nursing in 1987, her Canadian Nursing Registration in 2004 and her Canadian Perioperative Nursing (CPN(C)) certification in 2005. She currently works as a staff nurse at St. Paul's Hospital in Vancouver, BC and joined BCORNG in 2004*

This article is based on a presentation of the same title given, by the author, at the World Conference on Surgical Patient Care – One World – Working Together, Barcelona, Spain, September 29, 2005.

ABSTRACT

When we join perioperative nursing we enter the swinging doors of the operating suite and never leave. Have we come home?

Are we drawn by -
Student experience?
A job to go to by random assignment?
A long desire to work in the OR?
For a career change?

Regardless of the reason for our arrival, many

things keep us in the OR including the teamwork, friendships formed, the challenges, the camaraderie, and the constant learning of new skills.

For some it is the adrenaline rushes with each crisis and trauma that comes through the door.

Or maybe it's because we feel we truly are nursing and able to act for the patient. We realize that patients have placed their trust in our care during a very vulnerable time when they are unable to speak for themselves.

What creates and keeps a perioperative nurse?

Using a qualitative research questionnaire, given to nurses attending a national perioperative conference, the author obtained feedback from nurses on their feelings, attitudes and knowledge in an effort to determine what makes a perioperative nurse and what it is that keeps them there for so many years.

The results, along with the author's personal observations, are outlined in this article

---

30 years ago a young nurse needed a challenge and entered the world of the operating room.

Today that young nurse is somewhat older and has seen many changes over the years. Many procedures of yesterday are seldom performed today. Instruments that were commonly used are now on display in hospital museums.

As the author of this article, that nurse wondered why she, along with so many other nurses, spent her whole career in the OR. Why has she been able to avoid the burn out, exhaustion, stress, and disillusionment that we read about due to too few nurses responsible for too many patients. What of the stories you hear of lack of resources, money, and support. Why do OR nurses stay?

I enjoy all the challenges, and even some of the frustrations, involved with working in this specialty, but why do other perioperative nurses stay? Over the years I have worked with many nurses. Some have only stayed a short time but a large number have stayed for years.

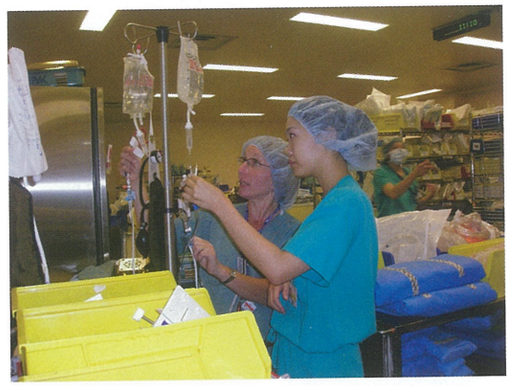


Photo by/par C. Newland

A student learns how to set up the arterial lines in the OR.

To find some answers the author submitted a questionnaire to the nurses attending a Perioperative Nurses College Conference in New Zealand. They were asked a number of questions, some requiring yes or no answers, others asking for opinions about topics. Approximately 250 nurses received questionnaires in their conference bags with a 28% response rate at the end of the conference. See Appendix 1 for the full questionnaire. Various journals were also consulted for information related to this topic.

Why do we enter through the swinging 'authorized personnel only' doors of the operating suite and never leave?

For some it was their **student days,** spent in the OR, that were made even more exciting because of the nurses they worked with. They described it as being different, fascinating, exciting, challenging, interesting, stimulating, stirring the adrenaline during emergencies, and offering lots of learning opportunities.

The best experiences seemed to be .when OR nurses mentored and preceptored, gave explanations, supported, created a friendly and helpful environment, guided, and taught. Comments provided on the questionnaire included:

'I gained so much interesting knowledge and experience and I got to work with a great group of people and had heaps of fun' [1]

'Loved it. Was part of workforce. Knew that was what I wanted to do. Was one year through my training so had to wait 2½ years to get back.' [1]

Mardell [1998] states that nurses' chose working in the operating theatre as a career because they had enjoyed their theatre allocation during their training. That the experienced nurse, when observed by the student, was well organized or well prepared very cool and calm, she had everything to hand, and she knows where everything is.[2]

But we must not forget that some students have a negative experience. This happens when we 'eat our young nurses' – in other words when we offer no explanations, create an unwelcoming and unsupportive environment, and do not take the time to teach or involve the student in patient care or the work of the OR. The result is the other type of feedback seen on the questionnaire, including:

'Only spent one day in the theatre watching a tendon repair on a hand. No one explained what was happening and I stood back and could not see anything. Did not know where to stand or what was being done' [1]

As one of the respondents to Letvak's [2003] study stated "What's gonna happen when your older nurses go out and there is just nobody here to train the new ones?" [3]

For others it was **a job to go** to as a nurse either when they first graduated or when they started at a new hospital.

'Initially I was sent there as a staff nurse – I had no choice but was told if I didn't like it after 3 months they would place me somewhere else. I loved it and stayed' [1]

Yet others **always wanted to be there**

'It was the first choice for me even before I commenced my training. My first experience of theatre only enhanced this' [1]

And for some it was a **career change**

'It is different, very different from ward work – after 12 years working in a ward setting I wanted something different.' [1]

Anderson [2002] in asking, 'What drew her to the OR?' suggested it was the sense of family that develops as teams of nurses' work together developing good relationships and communication skills.[4]

And Watson [2002] described the perioperative surgical suite as an environment unlike other areas of the hospital where team members may spend eight hours or more together on any given day. Relationships among team members develop because of this unique situation and can result in family-like interactions. Surgical team members frequently become so comfortable with each other that they discuss topics most coworkers might feel uncomfortable addressing.[5]

If you are working well together as a group every one has an understanding of what needs to be completed. As pointed out to me by a

Photo by/par C. Newland

2005 Hospital Operating Room Nurse Invitational (HORNI) Regatta crew (St. Paul's Hospital) comprising OR nurses and anaesthetists. This annual sailing regatta is a fun way to showcase the close relationship that develops between health professionals.

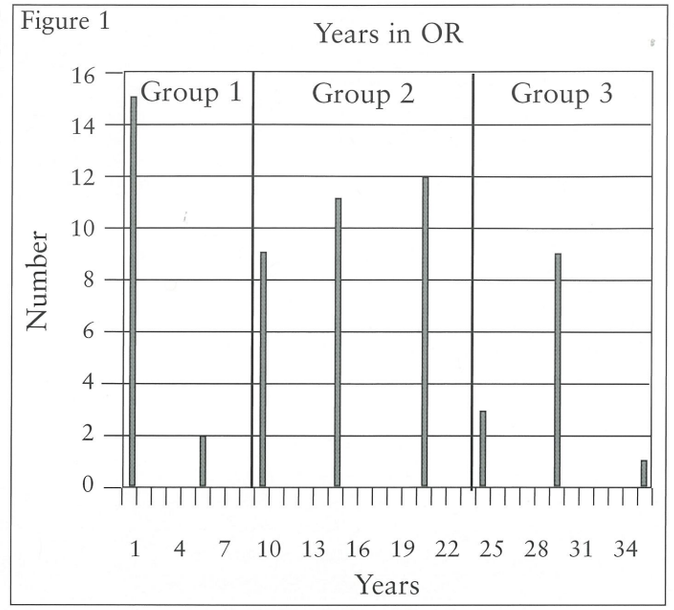
The Joys of Perioperative Nursing (cont.)

student nurse, 'You all know what to do and you all assume a role without doing what another member is doing'.

The question 'How long have you worked in Perioperative Nursing?' showed 3 distinct groups (see Figure 1):

1. The new perioperative nurse just starting his/her career. At least 25% have been in the OR from 10 months to 10 years. They have the excitement of new challenges to meet not only in their work lives but also in their personal lives.
2. The more experienced perioperative nurse. About 50% have worked in the field of Perioperative nursing from 11 to 25 years. Over time they have seen many changes, new techniques, procedures, instrumentation and more paperwork.
3. The final group is the grand dames and dons of the OR. Approximately 25% have between 26 and 37 years of perioperative experience. They have seen many changes in procedures, techniques and products, over the years. Letvak noted that the older generation of OR nurses are still challenged and energized by being in the OR. They are respected by the members of their close-knit teams.[3]

Figure 1



Now that you have arrived in the OR, **What keeps you there?**

Is it the teamwork or the sense of family and belonging? Perhaps the strength of friendships formed or the workplace camaraderie? Maybe it is the challenges or the opportunity to constantly learn new skills? In what areas does perioperative nursing fulfill your expectations? One perioperative nurse commented:

> *'It was all the drama for excitement, camaraderie of team spirit, welfare and wellbeing of both patients and colleagues to enthuse my mind to develop, learn and communicate in education.'* [1]

Do you enjoy, despite the long hours, the adrenaline rush with each crisis and trauma that comes through the door. One perspective on this was offered:

> *'I love all the drama with colleagues and patients that I could wish for. I have seen the results of the good we do and the relief we give.'* [1]

The **positive aspects** that seem to keep nurses in the OR (in order of number of survey selections) are:

- Teamwork, constant learning and challenges were the top three;
- The patient – getting to care for one person completely;
- Camaraderie and friendships formed;
- The hours;
- The atmosphere;
- The adrenaline rush;
- The supportive environment;
- The drama of the OR; and
- The opportunity to do what is felt to be <u>real</u> nursing.

But as Hunter [2004] noted in a study on what it means to be a perioperative nurse, "as long as there's a patient involved then I'd say that it is nursing."[6]

In order to keep a balanced perspective, it is important that we also address what nurses perceive to be the **negatives** of the profession.

Number one on everyone's list was staffing shortages. Shortages have an impact on many areas include time available for education/study, ability to take vacation time, homelife, and workloads/stress levels. Comments about negatives included:

'Short staffing - is a MAJOR problem leading to increased stress levels.' [1]

'Not knowing when you are going to get home.' [1]

Dunn [2003] has suggested that there may be a direct relationship between the effects of stress at work and a decline in job satisfaction. He goes on to suggest that there is a need for better therapeutic methods of communication that might be related to reductions of stress and increased success in nurse recruitment and retention.[7]

The next most common negative related to the other personalities in the OR. Comments included:

'Doctors mainly playing games but also nurses play games too' [1]

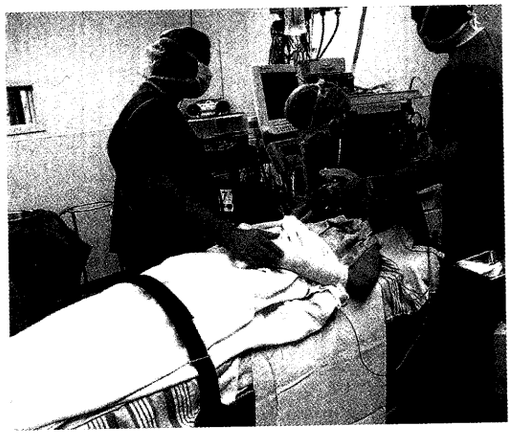
'Being in a confined area all day with some personalities can be hard work.' [1]

Other areas of complaint included:

- Lack of resources
  'Very poor resources – monetary vs. safety / patient care. Monetary always wins out.' [1]
- Lack of patient contact
- Crisis incidents and poor social life.
  'On call, weekend work + unsocial hours do not make for a harmonious lifestyle and relationships outside work.' [1]

How are we there for our patient?

Are we really nursing, acting and caring for our patients who have placed so much of their trust, in our care at their most vulnerable time?



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John caring for patient – hands-on care of the patient undergoing surgery.

Bull [2004] noted that even though the perioperative nurse has only a brief engagement with their patients, the pressure on them to act as advocate is intense, because many of their patients are unconscious or in a particularly alien environment. This means they are likely to be in greater than usual need of an advocate.

This complexity of caring for, communicating with, and advocating on behalf of a patient is complicated by what can be described as the 'disappearing patient' – the fact that in many cases the actual patient is forgotten about by scrub team members due to a focus on the surgical site.[8] One nurse reminds us of our role:

'I try to remember that each patient is someone's loved one and that if any of my loved one's ever needed to attend the OR, I'd want someone to take extra special care of them for me.' [1]

Daley-Hachey [1999] in describing her experience as a patient in the OR said:

"I became the recipient of things that cannot be scientifically measured or validated. It was in the words and actions of the nurses who dealt with me that I learned first hand that nurses do care.

I was in the process of leaving the nursing profession as the sense of purpose that once inspired me to do my best was gone. I was surprised to rediscover that purpose in the OR of all places. Somewhere I assumed the nurses were as cold and sterile as the environment in which they worked. How wrong my assumptions were.

Every touch of the hand, every smile, every word spoken whether in social chit chat or in explaining what happened next helped to alleviate much of my fear. These gestures, simple and automatic, had a tremendous significance on my personal experience. I felt cared for.

I now am sure that what 'chicken-hearted' nurses provide is far greater than any technical task. It is a human service that touches others in a way that cannot be measured objectively."[9]

Duffy in his 2004 editorial about 'The value of our practice' pointed out that we are given the ability not only to see the wonders of the body but to see the wonders of the individual patient too. Be aware that patients allow us to see and be part of their physical body. It is a special recognition to be trusted with something so personal as we make a difference in people's lives every day. We really do change the world a little bit each day.[10]

What makes, or is, a perioperative nurse?

We are the descendents of one of the oldest nursing specialties – its professional development began around 1880.

Many writers and researchers have, over years, looked at the subject of what defines a perioperative nurse. It is made more difficult because of our 'invisibility behind these doors.'

Hunter [2004] describes it as 'the hidden side of nursing' due in part to the major barrier of protecting the individuals who are undergoing surgery from potential contaminants in the outside environment. This isolates the operating room staff, and their caring actions, from others in the healthcare facility. It often leads to misinterpretations of the perioperative nursing role by managers, other nurses, the general public and even by OR nurses themselves.

Outside the theatre doors there is the theoretical assumption that, due to the greater than average degree of reliance upon technology, there is a high chance that care of the patient loses the personal touch. This assumption throws into question the personal element of other areas of nursing which also rely on technology.[11]

Chad [2000] recognizes that there are many pieces in the puzzle of an OR nurse. The role is multifaceted and some feel that the actual caring behaviour 'is just so ingrained and so easy and natural that I don't even think about what I'm doing.[11]

Perioperative nurses worldwide can argue that, as a specialty nursing group, they ensure safety, efficiency, and sterility in the OR. Arguments can also be made that they provide an ethos of holistic and humanistic care in an otherwise highly sterile and technological area.

Chad's 2000 study of how we perceive our world noted we see ourselves as members of a team and that we use teamwork to accomplish good practice and good outcomes.[11]

And Welch [2003] describes these teams as been dynamic, with flexible boundaries, and of having the ability to change to meet economic and patients' needs.[13] In theatre nursing each team member has a role to play, both individually and collectively, for the benefit of the patient.

The team dynamic in the OR is unlike any others in the hospital and should be valued, nurtured, and constantly improved to increase positive outcomes of surgical care.

Even though, from the outside, it appears that this environment is dominated by medical and technical ethos, nursing has a significant and equivalent impact upon the experience of the individual.

We see ourselves as assertive, flexible, empathetic, organized, compulsive, and caring and we are willing to accept the good and the bad parts of working in the OR.[12]

"To work in an OR is exciting, frustrating. It can be frightening and exciting.

> Sometimes, everything goes well and it's great. Sometimes nothing goes right." [12]
>
> "We are a different breed of nursing – it is different from any other, and I think that is what has made it easy to stay. There is such variety of things going on; it keeps you from getting burned out" [3]

The perioperative nurse is a time manager who experiences brief yet intense interactions with the person undergoing surgery. They assess pre-operatively for physical and psychological signs and symptoms that may have a bearing upon the surgical procedure and/or outcome in a very short timeframe, to determine the most appropriate nursing intervention, be it the use of presence, touch or humour.

As nurses our knowledge of infection control and aseptic techniques is evidence based, ensuring accountability in our practice. We require knowledge of anatomy and physiology to be able to be competent at the table. We have the ethical and professional obligation to ensure the protection of the patient from the incompetence of other members of the operating team.

McGarvey [2004] defines the role as a combination of technical knowledge and expertise associated with the sophisticated instruments, techniques and drugs in current use, and the basic nursing skills acquired through training and experience that are vital to the care, physically and mentally of the patient and to protect them from physical harm, while still considering their personal dignity.[14]

Parker [1999] describes the technological knowledge as so skillfully practiced that it seemed almost second nature to the nurses. When the nurse described situations in which they were performing technological tasks, but were focused on more complex patient care issues, the knowledge was labeled 'embodied knowledge.[15]

The calmness and the capability of many a theatre nurse in moments of crisis has undoubtedly saved many lives. The indirect care we provide is paramount, as has been demonstrated by an ability to connect with, and to respond to, patient needs in the midst of the highly technological, stressful environment of the OR.

Siefert [2000] acknowledges that it is well known that perioperative nurses not only have challenges, but that they also have the capability to deal with them using the unique knowledge base that is necessary for achieving successful surgical outcomes. In the world of ever-increasing sophistication of technology employed to treat patients OR nurses have maintained high levels of critical thinking skills.

In addition to the necessary capabilities of flexibility, knowledge of technology and effective delegation, perioperative nurses have also developed, and refined, skills of coordination and facilitation of care.[16] We also show a sense of professional responsibility toward our practice that is expressed in our desire to be competent, responsible, self-directed, and independent.

Ulmer [2000] states that perioperative nurses are uniquely suited to turn chaos into clarity as they assemble a myriad of supplies, equipment, and people for a single patient event – an

Photo by/par C. Newland

Spring Bonnet 2005 offers a bit of light relief to welcome spring and showcase the nurses' hidden talents. All bonnets were made out of items found in the OR.

Continued on Page 36

MARCHER OU ROULER? UNE ÉTUDE SUR LES PATIENTS QUI MARCHENT JUSQU'À LA SALLE D'OPÉRATION

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RÉSUMÉ

L'objectif de cette étude fut d'identifier les attitudes de patients envers le remplacement possible d'une pratique traditionnelle par une stratégie leur conférant plus de contrôle, ce qui démontrera que le personnel infirmier peut faire une différence en fournissant un environnement plus centré sur les patients. L'étude révéla que les patients eux-mêmes voulaient participer au processus décisionnel et activement intégrer ce changement.

WALK OR BE DRIVEN? A STUDY ON WALKING PATIENTS TO THE OPERATING THEATRE

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ABSTRACT:

The objective of this study was to determine patients' perception on the possibility of changing a tradition-based practice to a more patient empowering service, thus demonstrating that nurses can make a difference in providing a more patient-centred environment. The study revealed that the patients themselves wanted to be included in the decision-making process and actively embrace change.

INTRODUCTION:

Nurses, as well as other healthcare professionals, must have a vision for the future. They must continually examine ways to improve quality of care for patients, take action and evaluate the results as a cyclical process. It is evident from the available literature that active patient participation is essential in reducing stress levels in healthcare.

Changing practice among healthcare professionals can be difficult, so it was obvious from the outset that development of an evidence base as well as embracing an all-inclusive approach was going to be important to the success of this project.

Bon Secours Health System, within its mission statement, is defined as 'all of us working together to deliver the best healthcare we can to people in need'. In every organisation and workplace quality improvements amount to the foremost objectives and, in professional nursing, quality assurance relies heavily on measurement and evaluation (Koch 1992). We strive to meet and exceed the standards of good service, while supporting, protecting and empowering the patients with a right to choice (Bon Secours 2002).

According to Beyea and Nicoll (1997) if the nursing profession is to survive its current challenges, nurses must collect and analyse data that reflects nursing-sensitive outcomes.

I was encouraged by the enthusiasm and eagerness of the theatre, ward and consultant medical staff to change the trolley transport to theatre system, thereby indicating that, in the spirit of a partnership approach, this is an achievable objective. The notion that all patients come to theatre on trolleys is a tradition-based practice and often 'takes the form of a ritual and is performed with little thought to the rationale behind it' (Parahoo 1997). As a result, nursing care is failing the patient because it is institution-driven rather than patient-driven (Walsh & Ford 1989).

Literature search

A search of literature on walking patients to the operating theatre and the surgical patients' experience was conducted in the National University of Ireland library, An Bord Altranais library, with electronic searches on the AfPP website, CINAHL, Healthstar and Medline.

Literature review

The review of the literature on the topic of walking the patients to theatre did not yield much documented evidence and this is one of the reasons why this study was chosen to be undertaken. Of the studies uncovered which dealt directly with the specified topic, Porteous and Tyndall (1994) concluded that, given a choice, the majority of surgical clients prefer to walk to the operating theatre.

While Birch and Miller (1994) concentrated more on the medication aspect, their research confirmed that most patients (98%) did not mind walking to or from the operating theatre. Due to the paucity of literature available on the subject of walking patients to theatre, the literature review was extended to include the total experience of the surgical patient. This yielded interesting articles with the focus and emphasis on individual patient care and empowerment:

- Time for change
- Making a difference
- Patient-centred approaches to healthcare.

Nurses and other healthcare professionals need to relinquish some of their control and empower their clients, encouraging them to partake in decision-making in relation to their care (Gibson & Cheryl 1991).

Time for change

In order to bring about change in a successful manner, there must be general consensus and willingness to change. Without this, progress is doomed before its implementation. New ideas, therefore, must be research-based, the importance of which has probably only emerged in recent decades. Formerly nurses and other healthcare professionals relied primarily on trial and error and expert opinion to guide their clinical practice (Beyea & Nicoll 1997).

Although nursing as a profession has undergone enormous change we must strive to be advocates of an evidence-based practice derived from the philosophy and shared values of the organisation (Baxter 1998). Pedani (1991) recognises that staff should be 'part of the process and not just tools of it'.

The current normal practice in this country is to take patients to theatre via trolley or wheelchair and as suggested by Turnbull, Wood and Kester (1998) it can be argued that this practice is out of date and often unnecessary. Turnbull, Wood and Kester (1998) also highlighted the significance of the health and safety regulations on manual handling, stating that the above practices should be avoided as far as is practicable, and that accompanied walking of patients to theatre reduces the amount of manual handling.

Making a difference Today's world is a different world. Technology is different. Society is different. Expectations are different too (Williams 2000). Perioperative nurses need to develop individual strategies to overcome challenges to change and use 'research findings to advance the art and science of perioperative nursing' (Hind & Wicker 1998).

Today's patients are more actively involved in all aspects of their care, choosing in many instances to undergo surgery and not considering themselves as being ill preoperatively. Porteous and Tyndall (1994) ask why nurses should expect these 'well' clients to accept a 'sick' role upon entering a healthcare facility.

The main focus of implementing evidence-based practice must be to improve care for all clients, empowering them by actively encouraging participation in the decision-making process for their care. Obviously any patient finds the surgical experience stressful. Therefore any areas where alteration of procedure could aid in decreasing or eliminating that stress must be examined.

Patient-centred approaches

In order to become more patient-centred, focus needs to be shifted so it does not assume that the expectations of the patient are already known. According to Gibson and Cheryl (1991) patients who are allowed to exert some level of control

WALK OR BE DRIVEN? (cont.)

over their treatment viewed the surgical experience as positive, while those with limited control yielded a negative experience.

Research has shown that the efficacy of music therapy in stress reduction post-anaesthesia as described by O'Neill (2002) is significant and further asks 'can the impact of a surgical procedure be simplified?'. We need to ask patients their opinion of services (Westwood 2000) and we need to 'change the pattern that is nursing if we are to meet the demands of the future' (Montgomery 2001). Porteous and Tyndall (1994) in their study 'Yes, I Want to Walk to the OR', suggest that both client and nurse exchange information to agree on goals and the means to achieve these, as professionals tend to assume control with minimal input from clients.

The Irish government's Health Strategy (2002) states that 'a health system should encourage you to have your say, listen to you and ensure that your views are taken into account'. It further goes on to state that 'the patient is at the centre in planning care delivery'. Encouraged by this approach we can now feel assured that the patient is at the core of decision-making, thus achieving the ultimate goal: a more patient-centred approach.

Literature conclusions

It is important to continually evaluate our practices to ensure that they meet changing patient requirements. The process of bringing about change is important and must be dealt with carefully and collaboratively. Trial and error is no longer acceptable in current nursing practices. While it is clear that there must be a general consensus and willingness to bring about change with an evidence-based approach, we must at all times be cognisant of allowing the patient to have their say.

Research design and methodology

The research focus was on eliciting views from patients with regard to the preferred mode of transfer to the operating theatre. This study set out to include the concept of change and patients' perceptions of the service provided, while all the time ensuring continued quality of care as service providers. This survey was based on a quantitative research method with an anonymous patient questionnaire, using a random controlled selection process. A covering letter was attached outlining the purpose of the study.

Research objectives

- Evaluate present mode of transfer of patients to theatre.
- Review literature currently available on surgical patients' experiences.
- Reach a consensus among patients of the possible changes or offering of choice to current practice.
- Identify any changes required to implement change.

Respondent profile

The research subjects were surgical patients, of both sexes, ranging in age from twenty to eighty years inclusive. Only patients who met the predetermined criteria and were deemed suitable by their primary care nurse were asked to participate in the study.

Ethical and moral considerations

Permission was sought in writing from the director of nursing and chief executive officer. All patients selected were given a choice to either 'walk to theatre' or be 'conveyed by trolley', and if they would like to participate in the study by completing a questionnaire postoperatively. In the actual study positive responses were received from all approached; the response rate was 90%.

Pilot study

I undertook the pilot study to ensure that the participants clearly understood the questionnaire and no ambiguity existed. The response rate to the pilot study was 100% and indicated that the questionnaire was clearly understood.

Data collection

The method of data collection was by anonymous questionnaire, using both open-

ended and closed questions. As Parahoo (1997) highlights, the closed questions yield data that allows for comparisons between respondents, as all the responses are in the same format, thereby simplifying analysis. The open-ended questions give respondents the opportunity to participate in and interact with the questionnaire in a way which closed questions do not.

Any patients that the primary nurse care provider deemed unsuitable were excluded as were surgical patients who required:

- pre-medication
- preoperative dilating ophthalmic drops
- total hip arthroplasty
- total knee arthroplasty
- arthroscopy of knee or ankle, foot or leg surgery
- discectomy or laminectomy.

Discussion

This study elicited views from both male and female patients using a random control selection process (see Figure 1). The study aimed to reduce and eliminate bias by providing a covering letter, thus extracting the need for a person-to-person discussion regarding the protocol. All participants were requested to read the covering letter and questionnaire preoperatively and complete same postoperatively.

All patients who walked to theatre were given a cloth theatre gown, dressing gown and a pair of theatre socks. Participants used their own shoes to walk to the theatre reception area. Patients were then asked to take a seat and replace shoes with theatre footwear. Usual anaesthetic nurse/ward nurse handover procedure was carried out, with the patient then walking into the operating theatre. Dressing gown and footwear were removed only when patients were being transferred to operating table. As illustrated, 96% of respondents indicated a very positive outcome from the whole experience and would wish to continue the practice if future procedures were required.

Patient comments included:

'much less stressful, didn't feel ill'
'was delighted to be given the choice'
'felt more in control of what was happening'.

It is interesting that Porteous and Tyndall (1994) reported that the patients also perceived the surgical experience to be:

'less threatening and felt more in control'.

Similarly Birch and Miller (1994) found that 98% of patients did not mind walking to (and in their study, from) the theatre, with many patients expressing the idea that it made surgery seem:

'less threatening and less serious'.

Four percent of respondents in this study felt that the surgical experience was a negative one for them on this occasion, stating:

'I would prefer to go on a trolley'.
'I walked to theatre today, hated it, please use wheelchairs'.

Any surgical experience is a very vulnerable time in a patient's life, so it could be argued that the results of a study such as this one could be affected by a willingness to please and a feeling of gratitude towards medical and nursing staff. However, the results in this study yielded that 96% of respondents would prefer to walk for future surgical procedures (see Figure 5), indicating that their views did not reflect a 'Halo' or 'Hawthorne effect', but were a direct result of their individual experience. It was interesting also to note that this was found to be the case in a similar study conducted by Turnbull, Wood and Kester (1998).

It will be obvious to the reader that there are limitations to this study. While a lack of empirical evidence exists, more analysis of themes like 'Time for change', 'Patient-centred approaches' and 'Making a difference' could be carried out. I acknowledge that the results may be different using a larger sample of patients from different socio-economic backgrounds and the results could not be deemed to be representative of the views of all patients treated in the totality of the Irish healthcare system.

Conclusion

This study was designed to see how patients at one hospital viewed an alternative mode of transfer to the operating theatre for their surgery. At the outset of this study it was felt that the older patient might find walking to theatre less acceptable than the younger clients. However, following analysis of the data received it transpired that the change was equally well received between all age groups.

Overall the results were very positive and it was interesting to analyse the patients' views in an area that they traditionally have no involvement. Acknowledging the amount of stress and anxiety associated with the preoperative phase of surgery is an important factor in the overall management of patients. Identifying methods of relieving some of the associated stressors can result in a more cost-effective use of resources available thus providing a better service for all involved.

The results of this study would indicate in this instance that the time for change is right, with the patient willing and eager to be part of that evolving system. Nurses can make a difference at their workplace with the introduction of evidence-based research practices and it is felt that this alteration in practice is a very good example of a realistic, achievable advance. The constant questioning of approaches is required, asking whether there is a better way to do what we are doing.

The overall conclusion that can be drawn from this study is that inclusion of a choice for patients of walking or being transported by trolley to theatre can reduce preoperative stress. Theatre porters spent more time in the actual theatre department and were more available for assisting with patient positioning and postoperative patient transfer to recovery room.

Recommendations

There should be:

- a full set of written guidelines
- acknowledgement of issues that influence change
- health and safety issues – ergonomics.

'Vision without action is merely dreaming. Action without vision is just passing the time of day. But combine vision with action and you can change the world.' Nelson Mandela

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Continued on Page 38

uncomplicated surgical procedure. We are vitally essential to the process.[17]

As Knight noted in 1988, and again in 2004, the concepts of total patient care and continuity of nursing care are irrelevant if the patient's surgical experience is eliminated from the study of the practice of nursing.[18]

> "I'm mad because you won't take credit for the role your care plays in my well-being, and I'm mad because you continue to undervalue your contributions to me. Just before I fell asleep it was you who took my hand and told me you would make sure everything went well, and I believed you. You have meant so much to so many. Everyone will come to understand that you are the keeper of the standards of quality of my surgical care." [1999][19]

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APPENDIX 1

This questionnaire was conducted at a Perioperative Nurses College Conference in Wellington New Zealand in 2003. Participants were given opportunity to add comments after each question and statistical information was also collected. Approximately 250 nurses received questionnaires with a 28% response.

THE JOYS OF PERIOPERATIVE NURSING

1. Can you remember your student days in the operating room? Was it a good experience? Yes ❑ No ❑
   Why and how?

   If not a good experience can you tell me what the OR Nurse did to prevent you enjoying it?

2. What attracted you to Perioperative Nursing as a field of nursing to work in?

3. How long have you worked in Perioperative Nursing?

4. Has this been continuous or have you had time out? Continuous ❑ Time out ❑
   Reason:

5. Has it fulfilled your expectations? Yes ❑ No ❑ Why and how?

6. Do you intend spending the rest of your Nursing Career working in Perioperative Nursing?
   Yes ❑ No ❑

7. What has kept you working in Perioperative Nursing [**the positives**]?

The teamwork ❑	Friendships formed ❑	The challenges ❑	The camaraderie ❑
Constant learning ❑	The hours ❑	Adrenaline rush ❑	The patient ❑
Real nursing ❑	Supportive environment ❑	The drama ❑	The atmosphere ❑

8. What are **the negatives** about working in Perioperative Nursing?

The hours ❑	Personalities ❑	Crisis incidents ❑	Poor resources ❑
Short staffing ❑	Lack of patient contact ❑	Affect on home life ❑	Poor social life ❑

9. What has changed since you came to Perioperative Nursing? Procedures ❑ Equipment ❑

10. Are you a specialist or generalist in Perioperative Nursing? Specialist ❑ Generalist ❑
    If a specialist what field do you work in and why?

11. If a general Perioperative Nurse what field do you most enjoy working in?

12. How are you there for the patient?

13. Have you worked in other fields of nursing before coming to Perioperative Nursing?
    Yes ❑ No ❑ What fields?

14 Did you have a mentor / preceptor / role model who has encouraged you to develop and expand?
   Yes ❑ No ❑ How ?

15 Have you travelled and used your perioperative skills? In New Zealand ❑ Overseas ❑ Where?

16. It has been stated by the ill informed that Perioperative Nursing is not nursing and that we are running away from life. Do you agree ❑ Disagree ❑

17.

That you are a technician	Agree ❑	Disagree ❑
Isolated from the world	Agree ❑	Disagree ❑
Not using your nursing skills	Agree ❑	Disagree ❑
Not using your nursing skills	Agree ❑	Disagree ❑
Prefer patients asleep/non entity	Agree ❑	Disagree ❑
Limits friendships formed	Agree ❑	Disagree ❑
Decreased communication skills	Agree ❑	Disagree ❑
Don't challenge yourself	Agree ❑	Disagree ❑
What you do is task orientated	Agree ❑	Disagree ❑
You are the patient advocate	Agree ❑	Disagree ❑

Walk or be driven? (cont.)

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