outlook

the official journal of the National Emergency Nurses' Affiliation Inc.

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Volume 33, Number 2, Fall 2010

In This Issue:

Are "natural" products really that safe: A case of poisoning in the ER.....

Would standardized best practice guidelines to help patients, families and caregivers making end-of-life decisions for care be beneficial?

The importance of surge capacity for emergency departments



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Guidelines for submission

Editorial Policy

1. **Outlook** welcomes the submission of clinical and research articles, case studies, and book reviews relating to the field of emergency nursing.

2. Statements or opinions expressed in the articles and communications are those of the authors and not necessarily those of the editor, publisher or NENA. The foregoing disclaim any responsibility or liability for such material and do not guarantee, warrant or endorse a product or service advertised in this publication, neither do they guarantee any claim made by the manufacturer of such product or service.

3. Authors are encouraged to have their articles read by others for style and content before submission.

Preparation of Manuscripts

1. The original copy of manuscripts and supporting material should be submitted to the **NENA Outlook** editor. The author should retain one complete copy.

2. Manuscripts must be typed, doublespaced (including references), on $8 \frac{1}{2}$ " × 11" paper with adequate margins. Manuscripts longer than one page must be submitted in a disk format in Word Perfect or Word. Submissions are accepted via e-mail to the communication officer.

3. Author's name(s) and province of origin must be included.

4. Clinical articles should be limited to six pages.

5. Direct quotations, tables and illustrations that have appeared in copyrighted material must be accompanied by written permission for their use from the copyright owner, and original author and complete source information cited.

6. Photographs of identifiable persons, whether patients or staff, must be accompanied by signed releases, such as the following: "I hereby give (author's name) authorization to use the photograph of (subject's name) in the **NENA Outlook**."

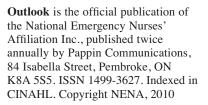
Please submit articles to: Stephanie Carlson, Outlook Editor, Box 31E, R.R. 1, Station Main, Regina, SK S4P 2Z1 e-mail: communicationofficer@nena.ca

Deadline dates:

March 1 and September 8

outlook

the official journal of the National Emergency Nurses' Affiliation Inc.



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Send manuscript inquiries or submissions to: Stephanie Carlson, Outlook Editor, e-mail: communicationofficer@nena.ca Cover image courtesy Sebastian Bergmann: http://www.flickr.com/ photos/sebastian_bergmann/

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Outlook is the official publication of the National Emergency Nurses' Affiliation. Articles, news items and illustrations relating to emergency nursing are welcome. **Outlook** is published two times per year. Opinions expressed are not necessarily those of NENA, or of the editor. NENA reserves the right to edit information submitted for publication. The use by any means of an article, or part thereof, published in **Outlook**, is an infringement of copyright law. Requests for written consent prior to reprinting of any article, or part thereof, should be addressed to the editor.

Volume 33, Number 2, Fall 2010

Ontario

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Awards/Bursaries Stephanie Carlson awards@nena.ca

CEDIS Chair: Pat Walsh patricia.walsh@centralhealth.nl.ca Committee member: Sherry Uribe

Conference Planning Liaison Landon James conference@nena.ca

CTAS/NWG Chair: Jerry Bell, jerrybell@rqhealth.ca Committee member: Colleen Brayman

National Trauma Committee Margaret Dymond chairncac@nena.ca

Nominations Sherry Uribe nominations@nena.ca

Nursing Research Dawn Paterson research@nena.ca

Political Action Landon James politicalaction@nena.ca

Professional Practice and Documents Sharron Lyons professionalpractice@nena.ca

President's message



For many years, l'Association d'infirmières et infirmiers d'Urgence de Quebec and the National Emergency Nurses Affiliation have been two organizations with a sim-

ilar mission, but working separately. The result has been a different and inconsistent message. I want to acknowledge Carine Sauve and Valerie Pelletier who maintained a vision over the past couple of years... a vision that has resulted in our two organizations formalizing a relationship over the next few months.

I would like to bring everyone up to date with what has been happening in the past six months.

Your national affiliation submitted to the senate committee review on Pandemic H1N1 2009. We were not asked to testify at the committee. However, our message was delivered in written form to the committee and included verbally through the Canadian Nurses Association.

Your organization has also been proud of the relationship that has been built with the Emergency Nurses Association in the United States. I have been very fortunate to attend as their guest for the past two years and we have been working on ways to bring our two organizations together on issues that cross international boundaries. They are very interested in working with their counterparts in other countries and NENA remains a strong supporter of ENA.

We have also been very fortunate to continue the development of our relationship with various sponsors of NENA with the hopes of furthering our work through their support.

In the past months, I have also enjoyed travelling to the provinces of British Columbia, Alberta and Ontario to their provincial meetings and conferences. All three provinces put on excellent educational sessions and I know will continue to do so in the future. Stay connected with your provincial organization to be advised of where your provincial conferences will be held, or watch on **www.nena.ca**.

I am very proud to acknowledge two nurses from Quebec, Denise Kudirka and Claire Thibault who, over the past number of years, have led a project to translate the ENPC course into French. The course is complete and I must say that the result is very impressive and supports our vision of working more closely with the nurses of Quebec.

I encourage everyone to join the NENA Facebook page (search for National Emergency Nurses Affiliation) and to follow the NENA President on Twitter at @NENAPresident. Our goal is to keep in touch with you and hear back from you.

Don't forget that we have a member referral program. You received an email with a link to forward to your friends to become members—if they sign up with your code, you can win prizes including free conference tuition!

Landon James NENA President

Editor's message



As fall is upon us and winter will soon be on its heels, I think of how quickly the seasons change and how one year seems to roll upon the previous one. All of

nature seems to have a logical progression of transition and renewal.

Alas, it is not always so in emergency nursing. It seems we are beset on all sides by the same problems: human resources problems; increasing volume and acuity of patients; tight budgets; the steady erosion of funds; aging facilities; obsolete equipment; admit no bed patients; and a universal erosion of optimism. Emergency departments have often become, in the words of one of our hospital security staff, "Beirut."

Managers, who were perhaps very supportive in the past, feel the stress to a greater degree than many of the rest of us and are struggling to endure the pressures they truly share with their staff.

NENA exists to supply some of the support that your colleagues may be too exhausted to provide. NENA has also been active in publicly and nationally bringing attention to these issues in the press and political arenas.

I consider response to calls for Outlook articles a barometer of the busy-ness and frustration that emergency nurses experience. Thank you to each contributor. We appreciate so much everyone who has taken time to prepare a manuscript. You will notice this Outlook has some articles by students. Great articles! These are people to watch—you might want to snap them up after graduation before someone else does!

The website is drawing many viewers. August saw 1,601 visits and 6,536 page views. In September the numbers increased to 1,749 visits and 7,104 page views. We are working on improving the functional capacity of the website and hoping to eliminate some of the problems we have had with email and online registration to deliver better service to our membership.

Speaking of service to members, the Saskatchewan Emergency Nurses' Group is hard at work to assemble a crackerjack offering of educational sessions, networking opportunities, and good old Prairie food and entertainment. For those of you who will be joining Saskatchewan for the annual conference, you are in for a treat. It's not too early to begin planning to head to Regina for a visit.

Yours in Emergency Nursing, Stephanie Carlson

outlook NENA at work

Canadian Triage and Acuity Score

As all of you know, CTAS is our national standard for triage. What many of you may not know is that it is also quickly becoming the international standard. The National Working Group (NWG) receives daily emails from other countries inquiring about CTAS, and what the process is to implement in their country, region, or area. CTAS is already the standard in several countries and/or regions such as Japan, Taiwan, Andalusia, Spain, several areas in the United States, Turks and Caicos, and Trinidad and Tobago. We are currently in discussion with countries such as the United Kingdom, Portugal, Brazil, and other areas of Spain.

Along with this we are close to completing a Canadian Paramedic Acuity Score (CPAS) for our EMS providers use for scoring and dispatching patients from the point of transfer.

So, Canada is quickly becoming the world leader in Triage and Acuity Scores, and it is directly AND completely due to our amazing triage nurses across the country! It is because of your day-to-day, minute-to-minute use of the tool, and extremely valuable feedback, that we have been able to produce the world-recognized tool that we have today! You have been instrumental in the creation of the end product, we (the NWG) have only facilitated the creation and delivery!

All Canadian triage nurses please stand up and congratulate yourselves and your colleagues!



Colleen Brayman, RN, BScN Co-Chair, CTAS NWG



X Janice Spivey

Congratulations to Janice Spivey on her appointment to the board of the Centre for Excellence in Emergency Preparedness (CEEP), and thank you for being a voice for emergency nurses. CEEP is a group of individuals from multiple health care

specialties dedicated to improving disaster preparedness in the health care field in Canada. They provide research, education, and consultative support to both provincial and federal governments, as well as to non-governmental organizations.



式 Sheila Early

Congratulations to Sheila Early on her Achievement Award at the International Association of Forensic Nurses' Scientific Assembly in Pittsburgh, PA, in October. She was

recognized for her pioneering work and the affection she holds and deserves from SANEs and forensic nurses across Canada.



式 Carole Rush

Thank you to Carole Rush for her service to NENA and the emergency nursing community as NCAC chair. Margaret Dymond will be assuming the position. Welcome Margaret.

The Alberta membership would like to thank Carole for all her dedicated work over the years. She has represented us outstandingly provincially, nationally and internationally with knowledge, grace and enthusiasm. Thank you so much, Carol.



式 Janet Calnan

Congratulations to former NENA Secretary Jan Calnan for her public recognition at the International Association of Forensic Nurses' Scientific Assembly in Pittsburgh, PA, as one of

the Nurses Who Lead the Health Care Response.



式 Leslie Olson

The ENIG executive and provincial membership would like to thank Leslie Olson for all the hard work that she has done and continues to do with both the Alberta provincial executive and on the national executive board. She has

been and continues to be a mentor and leader to all who know her. Thank you, Leslie.

X ENAO Conference Planning Committee

Janice Spivey, ENAO President, wishes to acknowledge the three long years of hard work, incredible amounts of time, persistence and unwavering dedication to the creation and hugely successful production of the ENAO 2010 provincial conference by the ENAO 2010 Conference Planning Committee. On behalf of the ENAO membership and all of Ontario's emergency nurses, thank you to Angela Arnold, Cathy Dain, Becky Davis, Kimberly Deline, Alison Ouimet and Lucy Rebelo. You should all be incredibly proud of this exciting educational event! Thank you all.

outlook NENA at work

Fall 2010 NENA BOD meeting highlights

By Catherine McCormick, NENA Secretary

The NENA Board of Directors met November 12–14 for its fall business meeting. This meeting, held in Montreal, Quebec, provided an opportunity for Valerie Pelletier to participate with the NENA board. Valerie represented the Quebec emergency nurses' group, AIIUQ.



Valerie Pelletier

Member recruitment incentive

When a member joins, they get an email with a referral code that may be submitted when they recruit another new member. The original recruit will receive a credit and gifts will be awarded as they accumulate credits.

Emergency Nurses Association (ENA)

We are strengthening our relationship between the American Emergency Nurses Association and NENA.

Participation in a study

A study will soon be distributed to NENA members to determine general knowledge regarding ventilators and their care.



The 2010–2011 NENA Board of Directors, back row, Treasurer Lori Quinn, ENIG President Dawn Paterson, ENABC President Sherry Uribe, Secretary Cate McCormick, NLENA President Cathy Fewer, NSENA and PEIENA President Fraser MacKinnon and EDNA President Irene Osinchuk. Front row, ENAO President Jan Spivey, President-elect Sharron Lyons, NENA President Landon James, SENG President MariElena Guerrero-O'Neil, and Communication Officer Stephanie Carlson.

Exciting NCAC announcement

The ENCPC text has been translated into French. The book, rich in illustrations and faithful to the content of the English edition, has been published in an attractive volume that looks identical to the English book.

outlook NENA at work

News from the provinces

Ontario

MRSA and VRE continue to appear frequently as an ALERT on registration of emergency patient charts, resulting in ongoing isolation challenges within all of our emergency departments.

An Ontario patient recently died as a result of hospital acquired C-difficile infection, prompting immediate and widespread hospital attention towards 100% compliance with mandatory hand hygiene practices.

More Ontario hospitals are actively moving towards electronic charting, to facilitate better availability of health care information across Ontario.

ENAO's 2010 provincial conference "Emergency Nurses: The Best Jugglers

Under the Big Top" was a huge success! More than 85 attendees from across Ontario and beyond attended this educational event held in Kingston in October. The President's Wine Tasting Reception featured wines from Huff Estates Winery and cheeses from Fifth Town Cheese Company. Since Kingston is home to Canada's historic site Fort Henry, it was only fitting that this conference was formally opened by two officers from the world-famous Fort Henry Guard. Emergency nurses enjoyed a broad spectrum of speakers, topics and presentation styles while participating in fun and educational activities. Corporate support was amazing and exhibitor sponsorship was a sell-out for display booths. Great meals, awesome door prizes and earning 13

ENAO CECH hours capped off this exciting ENAO conference.

ENAO has received a plaque of recognition and congratulations from Ontario Premier Dalton McGuinty as we very soon move into 2011, the year ENAO will be proudly celebrating its 40th birthday. Ontario's emergency nurses were given a sneak peek at plans for the "New ENAO, 40 Years of Excellence" at the recent ENAO annual general meeting.



Jan Spivey, ENAO President

Saskatchewan

The Saskatchewan Emergency Nurses Group (SENG) at present has 41 members across Saskatchewan. We are dedicated to supporting emergency nurses across the province and providing educational opportunities. We are holding our fall conference and annual general meeting in November. Peritoneal dialysis in the emergency department, obstetrical emergencies, ECG interpretation and poverty in the context of medical care are topics that will be presented.

Alberta

ENIG continues to have a membership of approximately 140 members. During Emergency Nurses Week numerous celebrations were held around the province celebrating what we do on a daily basis. Support from management and physicians was greatly appreciated and welcomed. Alberta also held its annual conference in Canmore on the weekend of October 15–17. Numbers again were down, which we all agreed was from the continuing recession and because numerous members from the province attended ENA this year in San Antonio,

British Columbia

ENABC's fall education conference was held October 1–2, hosted by our members in Cranbrook. Although there was a small turnout—understandable due to staffing and funding challenges—we listened to excellent speakers on topics suggested by our members at last year's conference. We were inspired by Chris Shumka and Lydia Wright's presentation on True Colors/Fish Philosophy. If you have not heard about it and would like to, please contact ENABC and we will help you learn more. Other topics included Anti-Stigma Campaign—Mental Illness and Addictions: Understanding the Impact of TNCC courses have been held in the north and south areas of the province with great success—watch for upcoming courses planned for spring 2011. ENPC was held in fall 2010 in Yorkton. An additional three courses have been tentatively set for early 2011—stay tuned for details.

SENG has been busy planning for the upcoming NENA 2011 conference, which will be held in Regina, SK, April 29, 2011. The theme will be:

Texas. We again had outstanding speakers and everyone agreed information was well received. Many members stated they wish to continue with the weekend away to recharge, rekindle old friendships and connect with new friends.

There continue to be challenges with overcrowding and boarding of patients in all our emergencies. Influenza season has commenced and all flu vaccine clinics are up and running and numbers are initially low. Concerns regarding compliance abound and all departments are continuing to screen for ILI.

Stigma; Laryngeal Mask Airways; Back Injuries; Immunizations, HPV and Measles; the Period of Purple Crying and Chemical Drugs—Reduce the Impact. Evaluations received at the end of the conference will suggest future topics and help as we plan next year's conference.

We also held our annual general meeting (AGM) on Friday, October 1, providing financial information to our members and sharing our strategic goals for the coming year—which include embracing technology by implementing electronic voting and being environmentally conscious in offering electronic-only newsletters. Of course we are always recruiting for new

Emergency Nursing: Pioneering Change, Impacting the Future. It is a privilege and an honour to host the NENA 2011 conference and on behalf of SENG members we invite and welcome you to Saskatchewan. See you in the spring!



MariElena Guerrero-O'Neil, SENG President

Emergency departments have been hiring again in the province, trending towards RNs who have emergency experience or go through an extended orientation/mentorship program. The Alberta government has also promised to hire 70% of graduating nurses in the provinces.

Our membership continues to work diligently at ensuring patient safety within our overcrowded emergencies.



Dawn Paterson, ENIG President

members with our goal to have every ED nurse in B.C. as a member.

The new executive will meet in November to implement the strategic goals for next year and also to begin planning for the 2013 NENA conference, hosted by British Columbia. If you are interested in being a member of the 2013 conference committee, please contact me.



Sherry Uribe, ENABC President

Calling all instructors

If your students have put the work into a presentation, a case study, a disease process, research, etc., encourage them to write it up into a brief article to be published in **Outlook**. Our section editors will work closely with them to help in the process, and they can see their hard work in print, help to educate emergency nurses across the country and add a publication to their resume—a win/win situation!

Articles can be submitted to the Communication Officer, Stephanie Carlson, Box 31E, R.R. 1, Station Main, Regina, SK S4P 2Z1, communicationofficer@nena.ca

outlook NENA at work

Treasurer's report

My last year in the position of treasurer has been one of growth and change. Not only have I taken on a role that had been filled by a long-time board of directors' member with much experience, but we changed banks, accounting software, and accountants. It has been a challenging year of learning, but a remarkable one.

The past year has shown tremendous gains in support through sponsorship that has aided our national conferences. We've seen great numbers of courses occurring and participants in these courses, and a strengthened relationship both with Quebec and our international partners. This has affected our finances positively and you will see these gains in our ability to improve NENA communications. Expect a new face on the website in the future. This will also help in our ability to provide a great national conference.

Attached is the approved budget for this fiscal year July 1 2010–June 30 2011.

We were advised to select a different accountant by the firm that was approved at the last AGM. The selected firm recommended a smaller firm in order to reduce the costs of an audit. In order to be financially responsible we went with the recommended accountant. This change was discussed and the board of directors voted to change to Cecile Leoung Sit, Inc. for the fiscal year of July 1 2009–July 30 2010. The auditor's report is not completed at this time, but it will be presented at the Annual General Meeting in Regina, Saskatchewan, April 2011.

Thank you for your support during the changes of the last year. While challenging, the knowledge gained and the relationships forged have been immeasurable.



Sincerely, Lori Quinn, Treasurer

Ordinary Income/Expense

Of uniary income/Expense					
INCOME					
Membership Fees					
Indep	930.00				
Intern	ational	0.00			
Total	Membership Fees	930.00			
1100	Indirect Fees				
	TNCC	62 240 00			
	ENPC	62,340.00 30,660.00			
	CATN	3,000.00			
	CTAS	4,000.00			
		4,000.00			
Total	1100 indirect rees	100,000.00			
	Direct Public Support				
1201	-				
	Contributions	12,000.00			
1202	Health Authority				
	Contribution	0.00			
	Private Contribution	0.00			
	Gifts in Kind–Goods	0.00			
Total		12 000 00			
	Public Support	12,000.00			
1300	Government Grants				
1301	Agency				
	(Government) Grants	0.00			
1302	Federal Grants	0.00			
	Local Government Grants	0.00			
1304	Provincial Grants	0.00			
Total	1300 Government Grants	0.00			
1400	La diana at Daublia Garrana ant				
1400 1401	Indirect Public Support Affiliated Org.				
1401	Contributions	0.00			
Total	1400 Indirect Public Support	0.00			
Iotai	1400 mancet i ubne Support	0.00			
	Affiliate Revenue				
	Board Meeting Recoup	3,000.00			
1502	Affiliate				
	Membership Fees	20,675.00			
Total	1500 Affiliate Revenue	23,675.00			
1600	Marketing				
	Print Advertising	4,000.00			
	Website Advertising	1,000.00			
Total		5,000.00			
4 - 00	-				
1700	Special Events Income	0.00			
1701	Special Events Contributions	0.00			
1702	1	0.00			
1750	(Nongift)	0.00			
1750 Tetal		6,000.00			
Total	1700 Special Events Income	6,000.00			
	Events income	0,000.00			
1800					
1801	Interest-Savings,				
	Short-term CD	337.00			
1802	Bank Interest-Account	20.00			
Total	1800 Investments	357.00			
1900	Other Types of Income				
	Miscellaneous Revenue	0.00			
1901		0.00			
	1900 Other Types of Income				
	• •				
Total	Income	147,962.00			

	ENSES Indirect Fee Reimburseme	nt
	TNCC	nt 20,780.0
	ENPC	10,220.0
	CATN	1,000.0
	CTAS	0.0
	8100 Indirect Fee	0.0
10141	Reimbursement	32,000.0
8200	Rentals	
8201	Conference Rooms	3,500.0
8202	Internet Services	200.0
8203	Equipment	0.0
Total	8200 Rentals	3,700.0
8300		26 150 0
	Air Travel	26,150.0
	Ground Travel	300.0
	Lodging Per Diem	25,350.0
	8300 Travel	5,400.0 57,200.0
		57,200.0
	Liaison Services Conference Seed Money	2,000.0
	Conference Contributions	12,000.0
	8500 Liaison Services	12,000.0
8600	Membership Services	,
	Outlook Journal	15,000.0
	Website Services	10,000.0
	Webmaster Consulting	0.0
	Awards	1,000.0
	Bursaries	5,000.0
	8600 Membership Services	31,000.0
8700	Executive Services	
8710	Laptop Computers (Capital)	1,600.0
8711	Software	300.0
	Executive Gifts	100.0
Total	8700 Executive Services	2,000.0
8800	Conference Registrations	700.0
8900		
	Bank Service Fees	0.0
8910		200.0
8920	Office Supplies	250.0 0.0
	Telephone	
8950	Printing Professional Expenses	50.0
	1 Accounting Fees	3,000.0
895	2 Legal Fees	1,000.0
	3 Outside Contract Services	0.0
895	4 Insurance fees	2,500.0
Tota	al 8950 Professional	6 500 0
8060	Expenses Business Peristration Fees	6,500.0 210.0
	Business Registration Fees 8900 Administration	210.0
	Expenses	7,210.0
тот	AL EXPENSE	147,810.0
1012		
	ORDINARY INCOME	152.0

NENA CONFERENCE 2011 Emergency Nursing! Pioneering Change Impacting Future

Regina, Saskatchewan APRIL 29-MAY 1, 2011



Change Impacting Future

NENA National Emergency Nursing Conference April 29–May 1, 2011 Regina, Saskatchewan

Call for abstracts

In 2011, the Saskatchewan Emergency Nurses' Group (SENG) has the honour and privilege of hosting the National Emergency Nurses' Association (NENA) National Conference. NENA is the professional association for emergency nurses. This is a three-day conference that is open to all nurses in Canada. We are now looking for keynote speakers with knowledge of new and ground-breaking medical techniques and practices.

We welcome the submission of abstracts for keynote speakers and break-out speakers. Keynote speaker presentations will be 75 minutes in length with a 10-minute question period included. Concurrent presentations will be 60 minutes in length with a 10-minute question period included.

The format for abstracts must be written in English with a 500-word maximum and should include a title, a purpose, a summary of content and implications for practice. Please include a cover page that identifies the abstract title and the author's name(s), credentials, current position, address for correspondence, email address and phone number. Submit them electronically in Microsoft Word to:

stringersuzanne@hotmail.com as well as to decorbysix@sasktel.net

The deadline for abstract submission is January 10, 2011.

We thank you for your consideration.

Sincerely, Suzanne Stringer and Bonny DeCorby Abstract Review Subcommittee of NENA 2011 Conference Planning Committee

outlook Course happenings

By NENA's National Course Administration Committee (NCAC)

NENA/ENA contracts update

- NENA and ENA have contracts that pertain to the dissemination of TNCC, ENPC and CATN-II courses in Canada, which were renegotiated this October and are effective until October 2012.
- Some of the highlights are as follows (Course Directors-please take note...)

ENA indirect course fees for TNCC and ENPC will be increasing, effective March 1, 2011!

Course directors, please email ncac@nena.ca for an updated copy of the Appendix A with our course financial information

• Due to ENA research findings re: CATN-II, the current course will only be available until April 30, 2011. ENA is in the process of assembling a team to create a new online course over the next several years—*Advanced Clinical Education for Emergency Nurses (ACEEN)*.

Course administration updates

The revised version of "*The Interim Canadian Course Administration and Resource Manual—Nov. 2010*", is available to download from the NENA website.

Some highlights are as follows: Attention course directors! Send NENA indirect fees to NENA treasurer: Lori Quinn, NENA Treasurer 101, 1001 West Broadway—Unit 167 Vancouver, BC V6H 4E4 Email inquiries: treasurer@nena.ca

PLEASE include the appropriate paperwork. There is an ongoing issue of cheques being sent to the NENA treasurer without the course number, number of participants, course director, and/or location of the course. If you would like a receipt for funds received by NENA, please include your email address as well.

Do not send a copy of the course rosters or evaluations to NENA (NENA only requires the NENA Course Payment Form—form C in the "Interim Canadian Course Administration and Resource Manual")! **Course** *paperwork is to be mailed to ENA ONLY* (*to the Des Plaines, IL, address*)!

Send ENA indirect fees to (Please note: ENA will apply a 10% discount on indirect fees on provider courses when payment is received prior to the course start date. If you have prepaid for more participants than attended the course, they will issue a refund for the difference):

U.S. cheques or U.S. *money orders* to: Emergency Nurses Association Box 1276 Bedford Park, Illinois 60499-1276

Credit Card payments to:

Emergency Nurses Association Course Operations 915 Lee Street, Des Plaines, Illinois 60016-6569

If a course is cancelled or postponed, please notify both ENA (courseops@ena.org) AND the NENA treasurer (treasurer@nena.ca). This ensures that our grant money from ENA is not affected, as well as protects the course director, as NENA and ENA are expecting the post-course paperwork within 30 days and their status could be suspended.

Course directors can bulk order TNCC, ENPC and CATN II manuals, as long as they are paid for at time of order, but *are not allowed to library textbooks* (for more info please refer to the Interim Canadian Administration Manual).

Test and evaluation scantrons from ENA course operations:

- The course test and evaluation scantron forms have had a small change made to them re: Social Insurance Numbers but we continue to not ask Canadians to supply this information.
- ENA asks that the students fill out their entire name, address and phone number on the demographics portion of the scantron, as this will provide an accurate history of their course participation, which is often needed for verification of contact hours, pursuing instructor status, or for employment purposes.
- For the evaluation portion of the form, all instructors must be listed (only once) on the back of the scantron in the same order as they are listed on the

final faculty roster. If an instructor only participated in one of the skill stations and the student did not work with that instructor, they should leave that instructor's scores blank.

• NCAC receives annual notification from ENA of instructors whose average evaluation scores are <3.0, for follow up and remediation.

Course application process and contact info in Canada Instructor courses in Canada:

NCAC endorses the dissemination of courses throughout the country and encourages the development of new instructors. If you require an instructor course in your area, please send a letter of intent, outlining the rationale for more instructors, to NCAC members at ncac@nena.ca prior to requesting your courses (refer to The Interim Canadian Course Administration manual for more information).

Instructor trainers are to ensure that new instructor candidates hold CURRENT provider status.

Provider courses:

If course directors are submitting course applications to ENA by email (a minimum of three weeks prior to the course) please submit to **courseops@ena.org**.

Contact phone numbers for ENA:

ENA's direct to Course Operations toll-free telephone number is **1-800-942-0011.**

ENA's direct toll-free telephone number to all other departments is **1-800-900-9659**.

We will let course directors know when the process will be changing over to submitting course applications directly to NCAC via the NENA website.

All course manuals and materials will continue to be shipped from the ENA Office.

National Trauma Registry information

The National Trauma Registry at the Canadian Institute for Health Information has 2008–2009 Injury Hospitalization data available at www.cihi.ca/ntr. These data include demographics, administrative and clinical data on all patients hospitalized due to trauma in facilities in Canada (excluding Quebec).

NCAC breakfast meeting at the 2011 NENA conference in Regina, Saskatchewan

An instructor/course director appreciation and meeting/education session is currently being planned during this conference. Please mark your calendar and plan to attend the conference. If you have specific ideas you would like NCAC to consider, please send them to ncac@nena.ca.

Update on French translation of ENPC and TNCC course materials

NCAC appreciates the efforts of all those involved from the MUHC Pediatric Network in Montreal and the McGill University School of Translation for the translation of our course materials. Both institutions have financially contributed to this project and as well as being subsidized by NENA.

ENPC 3rd Edition

NENA and NCAC would like to thank Claire Thibault and Denise Kudirka for their outstanding work and commitment pursing the translation of ENPC into the French version including course manual, slides, and exams. For course materials in French, ENPC instructors can contact **chairncac@nena.ca**

TNCC 6th Edition

- Both Exam A and Exam B have been translated.
- McGill is currently translating the slides, with anticipated completion in the near future.



Above left, Claire Thibeault and Denise Kudirka. Inset, the translated ENPC 3rd edition. Above right, Renee MacArthur, a clinical educator and TNCC instructor in Renee and Denis Bouchard

Montreal. Renee and Denis Bouchard are pursuing options to assist in further translation of a French version of the TNCC course manual.

- NCAC and NENA are working on negotiations for the translation of the TNCC provider manual.
- Course directors who have Frenchspeaking TNCC course participants can request available French course materials from the NCAC chairperson at chairncac@nena.ca

TNCC update TNCC reverification course

The reverification course was trialed at several sites and the following feedback was obtained:

- Participants should have a copy of the 6th edition provider manual as the 5th edition does not include disaster, helmet removal, etc., and must have current provider status. The written exam is based on the 6th edition course materials.
- Participants must come prepared, as there is little time for practice.
- Should only be offered to RNs with trauma experience and/or those who have taken the TNCC provider course several times prior.
- Thoracic trauma, abdominal trauma, special populations and transition of care are not covered in the lecture portion of the course, but content is on the written exam.
- This is not a cost-savings course as the same indirect fees, instructor to participant ratio and 6th edition textbook are required.
- The TNCC reverification pre-course exam can also be used as a pre-course exam on full provider courses.

TNCC course directors: If you would like a copy of the feedback from several TNCC reverification courses offered across Canada, please email **chairncac@nena.ca**.

TNCC revisions

• ENA will *start* the process (background research) for the 7th edition TNCC course in 2011.

ENPC update

ENPC 4th edition revisions:

- Anticipated roll-out within the U.S. of the 4th Edition ENPC Provider and Reverification Courses is fall 2011— Canada early 2012.
- ENPC 3rd edition courses will continue to be offered until all the materials for the 4th edition course are available to order, and Canadian instructors have received their instructor update.

Committee membership changes

Welcome to **Margaret Dymond**, who will assume the duties of NCAC Chairperson from Carole Rush, effective November 15, 2010. Margaret is a clinical nurse educator in emergency at the University of Alberta Hospital in Edmonton, and has a wealth of experience teaching and course directing TNCC, ENPC and CATN-II courses.

Welcome to **Monique McLaughlin**, our new Western Canada Representative, effective November 15, 2010. Monique is currently a nurse practitioner in the emergency department of Vancouver General Hospital, and has many years of experience teaching TNCC and CATN-II courses.



The NCAC committee: Colleen Brayman, Brenda Lambert, Traci Foss-Jeans, Ann Hogan, Margaret Dymond, Debra Bastone and outgoing NCAC President Carole Rush.

Contact us: NCAC committee members

General email to reach all NCAC members: ncac@nena.ca

Chairperson

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Are "natural" products really that safe: A case of poisoning in the ER

By Gabriella Varga, RN, BN(C), ENCC

Introduction

A 67-year-old female presents to the emergency department (ED) by paramedics (EMS). She is hypotensive, and tachycardic, with an altered level of consciousness. EMS also adds that she might be incontinent with urine and stool. EMS had thought that the patient could be a new onset seizure disorder.

As a triage nurse, it's now up to you to assess and determine the acuity of this patient.

Case report

At 1445 hours, EMS gives the following report: The patient's subjective complaint is a "2 1/2 hour onset of general weakness and dizziness". She decided to call EMS when she noticed that she could not comprehend the conversation she was having with her friend on the phone. She reported blacking out right after the phone call, and woke up hearing a knock on the door by EMS. She staggered to the door and needed to hold onto objects to keep balance, as she felt very "spacey".

The patient's objective findings from EMS are the following: The patient is otherwise healthy and has no known allergies. The only thing different today was she tried a new apricot snack she got from the health food store. Her vital signs are as follows: blood pressure 90/40, heart rate 124, and an oxygen saturation of 97%–98% on room air.

According to the Canadian Triage Acuity Scale, the nurse triaged the patient as a Category 2. The patient needed to be placed in a bed in emergent care, a step-down resuscitation room with full cardiac monitoring capabilities. Due to the high volume and acuity of patients in the ED, a bed was not readily available. The nurses in emergent care were doing their best to quickly arrange a bed for this new patient. They were finding this to be a challenge.

At 1515 hours EMS, who were continuously monitoring the patient as she awaited a bed, approached the triage nurse reporting that the patient's status had changed. Her blood pressure had dropped and she was behaving inappropriately. The patient was rushed onto a hospital stretcher. The emergency nurses started to undress her and noted she was cold and mottled over both her upper and lower extremities. This mottling extended over her trunk to the umbilicus, and the patient had no palpable pedal pulses. Once connected to the cardiac monitor, her blood pressure registered at 74/41 with a heart rate of 116. She was now alert only to person. Two large bore intravenous lines were inserted, and lab work drawn for CBC, electrolytes, INR, and lactate level. Two IV fluid boluses were started under pressure, as per the emergency protocol and the emergency physician (EP) paged stat to her bedside.

The initial triage nurse remembered that in ancient times people crushed fruit seeds, particularly apple and apricot, and mixed it in the food of someone they wanted dead, an ancient form of chemical warfare (Desai & Su, n.d.). Amazed by the connection she had made, she approached the EP with her theory, and the potential cause for these symptoms. The attending physician was hesitant about this diagnosis, but knew with the patients' acuity that an immediate diagnosis needed to be made. Working in another area in the department at the time was an EP who was also a Toxicologist, and requested she discuss the case with the toxicologist.

The nurse was correct in her link between apricots and cyanide! A differential diagnosis of cyanide poisoning was made before any blood results were back. No time was wasted to treat this deadly toxin.

Pathophysiology of cyanide poisoning

"Cyanide is a mitochondrial toxin that is among the most rapidly lethal poisons known to man. Used in ancient times as a method of execution, cyanide causes death within minutes to hours of exposure. It must be recognized rapidly to ensure prompt administration of life-saving treatment" (Desai & Su, n.d.). Cyanide kills by preventing aerobic metabolism within the cells, acting like a cellular asphyxiate and can do so within minutes when ingested in high concentrations (Cooper & Albrezzi, 1990). Cyanide binds to the ferric ion (Fe3+) of the mitochondrial cytochrome oxidase enzyme and creates cytochrome oxidase cyanide, thus stopping oxidative phosphorylation. In other words, the cells cannot use the oxygen in the blood "histotoxic hypoxia" (Desai & Su, n.d.). Another complication of cyanide toxicity is that small amounts also bind with ferrous (Fe2+) iron of hemoglobin, forming cyanohemoglobin, which is unable to transport oxygen, further exacerbating tissue hypoxia (Desai & Su, n.d.).

Clinical presentation of cyanide poisoning

Signs and symptoms will depend on the route, duration and quantity of exposure. Central nervous systems and cardiovascular system dysfunction are most prominent including: headache, anxiety, confusion, vertigo, seizures, loss of consciousness, coma, initial tachycardia and hypertension, then bradycardia and hypotension with arrthymias. Other associated symptoms are nausea, vomiting, abdominal pain, flushed skin leading to cyanosis (late sign), and renal failure. With so many different symptoms, one can understand the difficulty arriving at a diagnosis (Desai & Su, 2009).

Treatment of cyanide poisoning

As always, stabilize the patient's airway, breathing, and circulation. Initiate high-flow oxygen regardless of the oxygen saturation, and commence cardiac monitoring. For the unknown, unresponsive patient, attempt administration of IV naloxone, dextrose and thiamine. Seizures should be treated with a benzodiazepam, and hypotension should be treated with fluids or vasopressors, as required (Desai & Su, 2009).

Once cyanide toxicity has been diagnosed, immediate administration of the antidote is required. Most cyanide kits include amyl nitrate, sodium nitrite, and sodium thiosulfate. The nitrates reduce blood cyanide by binding to methemoglobin, therefore decreasing the binding of the cytochrome oxidase and increasing cellular respiration. The sodium thiosulfate enhances the transformation of cyanide to less toxic thiocyanates, which is excreted through the kidneys (Borron, 2006).

Until IV access is obtained, break open the amyl nitrate ampoule in front of the patients' nose or between the patient and the oxygen delivery system for 30 seconds. This can be repeated up to three times. Once IV access is obtained, administer the sodium nitrite 10 mg/kg over 10 minutes followed by the IV sodium thiosulfate 1.65 ml/kg. According to the patient's condition, the clinician might want to administer the sequence again (Desai & Su, 2009).

If hydroxycobalamin is available, the recommended dose is 100 mg/kg IV. Hydroxycobalamin binds to intracellular cyanide and is also excreted through the kidneys (Koschel, 2006).

Delayed sequelae for cyanide poisoning

Even though the patient is diagnosed and treated, they could still develop long-term effects from the cyanide toxicity. Survivors may develop delayed onset of Parkinsonism or other neurologic sequelae such as impaired motor reaction, reduced verbal fluency and symptoms such as dystonia, bradykinesia, slowed speech and retropulsion (Koschel, 2006). The basal ganglia are very sensitive to cyanide toxicity and may have a secondary injury from being in a hypoxic state. The patient should be followed up by a neurologist and radiographic imaging, either CT scan or MRI. Cerebral changes have been noted up to several weeks after the exposure (Desai & Su, 2009).

Clinical implications of complementary and alternative medicines

Apricot kernels, also known as laetrile, amygdalin, Chinese almond, Prunus Kernel or Vitamin B17, are currently banned from Canada, and are primarily supplied from Mexico (Moss, Khalil, & Gray, 1981). The lethal dose is 50 to 60 apricot kernels. There have been several theories disproving that laetrile is effective against cancer cells. Its first noted use in medicine was in 1845 in Russia. Laetrile made its way to America in the 1920s. At that time, it was reported toxic and the use of laetrile was stopped. In the 1950s it made a comeback. Produced in a synthesized form and reported to be nontoxic, it gained popularity again in the 1970s (National Cancer Institute, 2006).

Ernest (2010) reported that 90% of patients diagnosed with cancer admit to using some form of "complementary and alternative medicine" (CAM) and may not openly disclose this information unless specifically asked. A recent study by Drew and Myers (1997) in Australia noted that out of 3,004 patients, 48.5% of the population had used at least one form of alternative medicine. Although it is commonly thought that "natural" products are all safe, evidence has shown that use of some alternative medicine can be harmful. Not only could one experience adverse effects from CAM, there are medication incompatibility effects as well. Some herbs can alter the effects of prescribed medication and, unfortunately, the use of CAM is not routinely included in patients' drug histories or in reports of adverse effects. Health care professionals need to understand the importance of asking all patients if they use any alternative, natural, or homeopathic medicines, a practice that is not consistently carried out at some facilities.

Discussion

The staff opened the cyanide antidote kit, which included 2 ampoules of amyl nitrate, IV sodium nitrate, and IV sodium thiosulfate. Since IV access was already established, the EP administered 300 mg of IV sodium nitrate, followed by 50 mls of sodium thiosulfate.

The patient proceeded to vomit approximately 10 times. By 1645 hours, nearly two hours post arrival to the ER, she was alert and orientated x3 with vital signs within normal limits. Initially the mottling remained, but was decreasing in size. Shortly after the antidote was administered, her lab work results were as follows: WBC 19, Lactate 19.7, anion gap 26, creatinine 104, and a methemolglobin at 10.4. The rest of her chemistry was unremarkable. Her initial ECG showed sinus tachycardia with nonspecific ST and T wave abnormalities.

At this time, the only complaint noted by the patient is that she felt "spacey", was slightly nauseated and had a mild headache. By 1855 hours, her mottling had decreased significantly to the point where it was almost completely gone and she reported feeling much better. At that point, the patient had admitted to eating a handful or so of the apricot snack. ICU was consulted and suggested continued cardiac monitoring, watching for prolonged QT intervals and monitoring for acute renal failure, improvement of metabolic acidosis and the development of rhabdomyolosis.

Repeat lab works done at 2115 hours showed: WBC 11.2, lactate 1.6, anion gap 12, creatinine 64 and a blood pH of 7.31.

Considering the patient had all the known indicators of a potential poor prognosis, she made an astounding recovery. She was admitted to hospital for a total of two days and discharged home to follow-up with her family physician and by a neurologist.

The Ottawa Carleton Public Health Unit was notified about the case. Their personnel contacted the health food store to have the product pulled from the shelves until further investigations could be done.

Intuition is an important tool we use in nursing. We are not born with it—it comes to us through feelings, knowledge, and experience. If you find yourself in a moment where you feel there is more than meets the eye, don't dismiss it... question it.

About the author



Gabriella Varga graduated from Algonquin College in 1999 and continues to pursue her education through Athabasca University. She currently works at The Ottawa Hospital in Emergency Medicine, which is her true passion, and aspires to teach critical care nursing in the future.

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Critical Care and Awards of Emergency Nursing Excellence Do you have an idol? Someone who helped you Expand your mind... through that long day, evening, or night shift in ER? Well, NENA wants to hear about them! your career your skills NENA is looking for nominations for Awards of Excellence in emergency nursing. There is no limit your opportunities to the number of awards that are awarded in four The Advanced Studies in Critical Care categories: Nursing certificate program is open to registered nurses or senior undergraduate • Emergency Nursing Practice nursing students. • Emergency Nursing Research · Distance delivery with computer access · Part-time flexibility for busy schedules · CNA certification exam preparation • Emergency Nursing · Receive course credit for Administration CNA certification Enroll today at Mount Royal University • Emergency Nursing Education. For more information visit The nomination form mtroyal.ca/accn or call 1.888.240.7202 MOUNT ROYAL For Calgary & area call 403.440.6755 is on page 31.

Would standardized best practice guidelines to help patients, families and caregivers making end-of-life decisions for care be beneficial?

By Maria-Louise McLaughlin Gentle, RN, CCN(C)

Understanding the basis of personal clinical practice and identifying a potential research question

Initiating resuscitation for an incapacitated, palliative, or neurologically deceased person can be ethically and emotionally distressing for the nurses and health care team, and family involved in these situations. When a family or caregiver refuses to initiate a do-not-resuscitate (DNR) or life support withdrawal due to lack of knowledge, understanding and support, it is upsetting to all parties involved. Maintaining life support or not implementing a DNR plan of care is not always in the best interest of the patient.

Throughout my career in a regional emergency and trauma centre, and currently in the cardiac setting at the University of Ottawa Heart Institute, these situations are a daily part of my nursing experience. I have had several opportunities to meet with the families who are making these end-of-life decisions. Each circumstance, while different, revolves around making the best decision for the well-being and dignity of the person who is incapacitated. In this area of practice, there are no set guidelines besides the Canadian Nurses Association's Code of Ethics for Registered Nurses to assist the nurse in assisting people to make these end-of-life care decisions. If there was a standardized teaching initiative for nurses faced with these aspects of care and patients and families faced with these decisions, everyone involved would be ensured that the outcome would be the best decision made under the circumstances.

Overall, there is a general lack of knowledge of procedure, protocols and laws that revolve around withholding or withdrawing life support and end-of-life care. There is still the belief among laypeople that withdrawing life support or consenting to a DNR order will result in the withdrawal of expert and ethical treatment of their loved ones. If a best practice standard of care guideline was developed, then nurses would have guidance on how to best prepare and assist those making end-of-life decisions.

Identify the clinical problem and formulate the question

The question is: should there be a formal best practice guideline and education initiative for nurses to follow in order to educate and help patients, families and caregivers when they are faced with end-of-life decisions, and would such an initiative be beneficial?

Conduct a literature search and critically appraise the literature findings

After searching the Laurentian University Library journal database using "teaching for end-of-life care" nothing came up. Using the search title "decisions about DNR" showed various articles that did not show that there were any standards for educating nurses or patients. There are several articles in relation to palliative care. However, these end-of-life decisions are not always made under the guidance of a palliative care support setting. Nurses are responsible for "promoting informed decisions under the code of ethics (Canadian Nurses Association 2008).

A study done by Westphal and McKee (2009) to "identify how nurses and physicians perceive end-of-life care showed that nurse-physician understanding and communication can be improved". The survey showed that nurses were more likely than physicians to address these issue. The survey also indicated that "the reluctance of approaching the subject, (of endof-life care), stems from lack of knowledge on the part of the health care team and fears of legal implications" (Westphal & McKee, 2009). Another article by Ward (2009) states that the three topics of advanced directive initiation, withholding and/or withdrawing life-support, and DNR need to be discussed (Ward 2009).

Describe the potential impact of this issue in clinical practice and the care that is delivered

If best practice guidelines were initiated for discussing endof-life care, it would promote an increased understanding and informed decision-making for patients, families and caregivers facing end-of-life decisions for care. It would also set a standard of practice for all of the health care team. A standardized education package that could be used in these situations would be beneficial and also answer many questions for patients and families, thereby allowing nurses to focus on end-of-life care.

An example of a questions and answers can be viewed at these websites:

http://wings.buffalo.edu/faculty/research/bioethics/ dnr-p.html

http://www.health.state.ny.us/publications/1441/

About the author

I am currently completing my second year of the distance post RN BScN program at Laurentian University. I graduated from Algonquin College in 1997 and started working as a staff nurse at the University of Ottawa Heart Institute right away. I worked there until 2000 when I transferred over to the Ottawa Hospital Civic Campus emergency department. In 2007 I transferred back to the Heart Institute. I achieved the Emergency Nursing certificate from Algonquin College in 2005 and the Canadian Nurses Association Certification in 2008.

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outlook NENA at work

One thing 30 years of nursing has taught me... "Learn to Catnap"

In September 2010, I attended the ENA Conference in San Antonio, Texas, and enjoyed the workshops immensely. One in particular that hit home was Fatigue: The Insidious Safety Hazard.

Fatigue, as it relates to lack of sleep, is something all emergency nurses will endure at some point in their career, whether sporadically or on a constant basis.

Early in my nursing career, working shift work with two small children at home and a husband who frequently worked out of town, my fatigue had reached a critical level. I was becoming clumsy, irritable and emotional at work, as well as with my family and friends. A coworker and mentor with many years of experience told me I needed to learn how to *catnap* or I was going to burnout. I remember saying, "Yeah, that's easy to say, but if I close my eyes I'm a goner for the night"! She explained to me that *catnapping* takes a little practice and she was willing to help me out. So, starting that very nightshift, I put my head down on the desk and closed my eyes. Sure enough, I was out like a light. Thirty minutes later, my mentor was shaking me and handing me a glass of water. At first I had a difficult time getting fully awake. However, after four nights of repeating this procedure, I actually woke up just before she shook me! It wasn't all clear sailing, but I did learn to take 30minute catnaps on my breaks, at home before nightshifts or whenever I knew I was going to be awake for an extended period of time.

My advice to new nurses has always been:

- 1. Learn about fatigue, you cannot bank sleep, you can only work on catching up.
- 2. Watch for signs of fatigue. Tired people are more likely to make bad decisions and increase their risk of

making mistakes or having accidents. As well, they come down with more medical conditions and catch more colds. We readily identify fatigue in our coworkers; however, we need to learn how to recognize it in ourselves.

3. Find ways to reduce the effects. Doing something to reduce the effects of fatigue helps you, your coworkers and your patients. My saving grace was learning to "*catnap*".

There are many assessment tools and indicators for fatigue. One quick and easy one is: Multidimensional Assessment of Fatigue (MAF), www.son.washington.edu/research/ maf



Sharron Lyons, President-elect

Sterile water versus antiseptic agents as a cleansing agent during periurethral catheterizations

By Allie Hung, Natasha Giesbrecht, Poli Pelingon and Rebecca Bissonnette

Introduction

Research shows that approximately 40% of all nosocomial infections are catheter-associated urinary tract infections (UTIs) (Elvy & Colville, 2009). Health care providers attempt to prevent these infections with the use of antiseptic cleansing agents for periurethral catheterizations. However, there has been reporting of adverse effects regarding the use of antiseptic such as chlorhexidine (Ebo, Bridts, & Stevens, 2004) and povidone-iodine (Al-Farsi, Oliva, Davidson, Richardson, & Ratnapalan, 2009). The purpose of this paper is to review the current literature related to use of sterile water and normal saline versus current antiseptic agents such as chlorhexidine and povidone-iodine for cleaning urethral meatus prior to urinary catheterization.

Methods

A review of the literature was conducted using MEDLINE and Cumulative Index of Nursing and Allied Health Literature (CINAHL) online database. The search was limited to articles published between the years of 2000 and 2010, written in English. In MEDLINE, an additional limit was set on articles related to humans only. The MeSH search terms used in MEDLINE were "urinary catheterization" and with either "water", "povidone-iodine" or "chlohexidine". The same search terms and combination were used in CINAHL database. MEDLINE database generated 101 articles, and CINAHL generated a total of 18 articles. The two search results were combined and eliminated for duplicates using RefWork. The result was 91 articles that were screened manually based on titles and abstracts, which were reflective of the research purpose. Koskeroglu and colleagues article was excluded due to lack of clarity as to whether water or normal saline was used as the control solution.

Research findings

A total of five articles were found to be significant to this literature review. A summary of the findings are illustrated in Table One. The current clinical study that compares cleansing solutions was reviewed.

Webster, Hood, Burridge, Doidge, Phillips, and George (2001) compared the use of water and chlorhexidine in cleansing the perineum before the insertion of a urinary catheter. Four hundred and thirty-six obstetric patients were part of this trial. Women were randomly assigned via opaque sealed-envelope technique to two treatment groups, one with the use of sterile water and the other with the use of chlorhexidine. Protocols for the catheter insertion and hand washing remained the same for the two groups. Approximately 24 hours after the catheter insertion, a 10 mL sample of sterile urine was collected for microscopy and culture. The microbiologist was blinded to the treatment group assigned for the culture. It was found that the infection rates between sterile water and chlorhexidine were similar at 8.2% versus 9.2% respectively. In this study, a power analysis was done, decreasing the chance of having a type two error. This study concluded that there was no significant decrease in the rate of bacteriuria by using chlorhexidine.

Cheung et al.'s (2008) article examined the use of sterile water and chlorhexidine among 20 residents of a long-term care facility. The subjects were recruited voluntarily after an information session was held on the study. These subjects were assigned randomly to the treatment group. A total of four urine samples were collected from each subject: first sample before insertion, second sample on day one, third sample at one week later during catheter change and the fourth two weeks after insertion. This study was limited by its small sample size. Also, the author made no comment regarding if either the microbiologist or the nurse collecting the sample were blinded by the treatment given to the subjects. It was unclear as to what information and exclusion criteria were given at the information session. The study excluded two subjects, one with an UTI infection and the other taking an antibiotic for fever. It was unclear in this article at what point in the experiment these subjects were excluded. This article concluded that there is no significant difference between the use of antiseptic agents and sterile water.

Ibrahim and Rashid's (2002) study compared the use of cleansing the urethral meatus before insertion of a urinary catheter with normal saline and povidone-iodine, and administration of 1 g of IV cephradine among 167 patients who

required TURP procedure. The patients were randomly assigned to the treatment group via sealed envelope. For every two patients assigned in both the normal saline and povidoneiodine treatment group, there was only one patient for injection of cephradine. The study excluded patients with prostate carcinoma, urinary stone, immunosuppression disease, pyuria and severe hepatic or renal dysfunction. The study also excluded a patient who had already received antibacterial administration prior to surgery due to another medical reason. A total of three urine samples were collected for each subject. The first sample was taken in the operation room prior to the TURP procedure, second sample was taken at the time of catheter removal and third sample was taken at two weeks to three month later, during out-patient visit. The authors concluded that there is no significant difference between the use of administering antibacterial prophylaxis, and using local antisepsis when compared to normal saline. The author suggested that removing the catheter is the best way to decrease bacteriuria.

Al-Farsi et al. (2009) compared the urinary infection rates among 186 children whose periurethral area was cleansed with water (92 children) or 10% povidone-iodine (94 children) prior to urinary catheterization. The children were randomly selected from the emergency room. Children with congenital abnormalities of the genital area, such as those where it was difficult to identify a urethral opening and female children with labia adhesions or gross infection in the genital region were all excluded. Children requiring intermittent catheterization, and those who were immunocompromised were also excluded from the study. All children were randomly assigned to the treatment group via computer gen-

eration. It was found that there was more insignificant bacterial growth in the water group (n = 22) than in the povidoneiodine group (n = 10). "Only one child with insignificant growth on the culture developed a persistent fever and grew urinary pathogens on the second day" (Al-Farsi et al., 2009, p. 659). The author suggested that further research should investigate if insignificant growth was hindered by the antiseptic solution. It was noted that this was not a double-blinded study. However, the laboratory and physician completed follow-up calls that were blinded. Also, due to staff limitation, not all of the qualifying children were screened. This article concluded that there is no significant association between the solution preparation, povidone-iodine, or sterile water.

Nasiriani et al.'s (2009) study compared the effect of cleansing with water and povidone-iodine on bacteriuria and UTIs among 60 subjects. These subjects were all females who required urinary catheterization after undergoing gynecologic surgery. The study excluded women who were taking antibiotics during the week before surgery, who had a catheter removed within 24 hours post-surgery, and/or who had the presence of a bacteriuria in the first urine sample. The patients were randomly assigned to water or povidone-iodine treatment. Two urine samples were taken from each patient, first at the time of insertion and second at the time of catheter removal. This was a single-blinded study. The mean age of the women was 48.18 years. However, 11 subjects were diagnosed with asymptomatic bacteriuria in the water group compared to the five subjects diagnosed in the povidone-iodine group. This article concluded that antiseptic agents do not significantly reduce the incidence of bacteriuria between the treatment groups.

Researcher	Solutions Compared	Type of Patients (Total included in study/water treatment/antiseptic treatment)	Number of patients developing bacteriuria / P-Value
Al-Farsi et al., 2009	Sterile Water, 10% Povidone-Iodine	Children in the emergency department (186/92/94)	Sterile Water (18%) 10% Povidone-Iodine (16%) P=0.5. No significant association between solution preparation and positive cultures.
Cheung et al., 2008	Sterile Water, 0.05% Chlorhexidine Gluconate	Home care patients (20/8/12)	Sterile Water (100%) 0.05% Chlorhexidine (88.9%) P=0.36. No significant difference in colonization count (.105 cfu/mL) between the two groups.
Ibrahim & Rashid, 2002	Normal Saline, Povidone-Iodine (Third treatment group received injection of Cephradine)	Patient who has BPH undergoes TURP procedure (167/66/64/37 received injection of Cephradine)	Normal saline (29.6%) Povidone-Iodine (27%) and Cephradine (27%) P= 0.94. No significant difference in bacteriuria between groups.
Nasiriani et al., 2009	Water, Povidone-Iodine	Women requiring an indwelling catheter prior to gynecological surgery (60/30/30)	Water (20%) Povidone-Iodine (16.7%) P=0.5. No significant difference in the rate of bacteriuria or UTIs between the two groups.
Webster et al., 2001	Water, 0.1% Chlorhexidine	Obstetric patients who required routine urinary catheterization (436/219/217)	Water (8.2%) 0.1% Chlorhexidine (9.2%) P=0.58–2.21. No significant difference in the rates of bacteriuria between the two groups.

Discussion

Current research supported that the use of sterile water or normal saline compared to current antiseptic agents, such as povidone-iodine and chlorhexidine, did not cause a significant increase in UTIs or the presence of bacteriuria in the urine samples taken. The articles have shown that microorganisms, *Eschericia coli*, *Staphylococcus satrophylius*, *Pseudomonas aeruginosa*, and *Entero coccus*, associated with the use of sterile water are consistent with the use of povidone-iodine and chlorhexidine (Al-Farsi et al., 2009; Cheung et al., 2008; Nasiriani et al., 2009).

The use of water, sterile water and normal saline are more economical than the use of chlorhexidine and povidone-iodine. Al-Farsi et al.'s (2009) article also supports that cleaning with sterile water is safe, readily available, inexpensive, and has minimal side effects. With the use of antiseptic agents comes an increased chance of adverse reactions. Povidone-iodine can cause skin irritation and burns (Al-Farsi et al., 2009) and chlorhexidine can cause skin irritation and burns and anaphylactic reactions (Ebo, Bridts, & Stevens, 2004). There is a relatively low chance (2%) of experiencing a chlorhexidine anaphylactic reaction, but given its ubiquitous use and the severity of an anaphylactic reaction, it needs to be taken seriously (Krautheim, 2004). Knight et al. (2001) suggested that during an anaphylactic reaction in the hospital, there needs to be a protocol that includes an investigation of not just latex, but also the possibility of a chlorhexidinecaused reaction. The reaction to chlorhexidine may not occur immediately, and it may take time to progress to a more severe reaction with contact via mucosal exposure (Ebo et al., 2004; Knight, Puy, Douglass, O'Hehir, & Thien, 2001). The use of sterile water to cleanse the periurethral area can eliminate these problems, thus, making it a cost-effective and safe alternative to antiseptic cleansing solution (Al-Farsi et al., 2009).

Some of the studies were limited by the difficulty in the detection of a difference within the subgroups, and a possible type two error due to the small sample size. Some individuals are more susceptible to UTIs. Parker et al. (2009) identified that risk factors for catheter-associated urinary tract infections include: females; pregnant women; people with chronic illness, azotemia, urethral stent; or other site of infection; malnourished or frail; immunosuppressed; have a catheter in place; and have a postfractured hip and reside in a nursing home. Even though Webster et al.'s (2001) study included pregnant women, other studies excluded subjects with high-risk factors for catheterassociated UTIs. For instance, in Al-Farsi et al.'s (2009) study, immunocompromised children and children who were on antibiotics were excluded. Cheung et al.'s (2008) study only included a total of 20 subjects from a long-term care facility who had the cognitive capacity to be able to understand an information session and give consent. Future studies should include a larger sample size, and focus on the subgroup most at risk for UTIs to decrease the chance of a type two error.

Webster et al. (2001) noted that there were nurses and staff who were opposed to the use of sterile water for periurethral cleansing before urinary catheter insertion. The staff believed that the sterile water was ineffective and to use it would be "breaching

[their] duty of care" (p. 393). Moreover, Webster et al. (2001) cautions that the practices surrounding catheter care are entrenched, and it will take a consistent and persistent messages based on research evidence about the efficacy of sterile water, as opposed to antiseptic agents, in order to create a change. Nasiriani et al.'s (2009) study met similar challenges when trying to gain both patient and staff acceptance for the use of sterile water. "Because the staff routinely used an antiseptic solution prior to catheter insertion, extensive education was required prior to implantation of the protocol" (Nasiriani et al., 2009, p. 121). Therefore, to promote the use of water as a cleansing agent, clinical nurses need to be informed of the strong research evidence. It is recommended that the facility change the policy for urinary catheterization, provide education and research evidence to nurses, and collaborate with the hospital's infection control committee to endorse the practice.

Conclusion

After a significant amount of literature review on periurethral catheterization and the various cleansing solutions available, it was found that water, sterile water and normal saline are safe, effective, readily available, environmentally friendly, and inexpensive cleansing agents as compared to chlorhexidine and povidone-iodine. The research findings show that there is no significant difference in the use of sterile water versus antiseptic agents on the growth of bacteria within the particular populations studied.

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Natasha Giesbrecht is currently finishing the last year of her Bachelor of Science in Nursing at UBC Okanagan. She is drawn to nursing, as it challenges her both intellectually and emotionally. She worked as an employed student nurse at the Kelowna General Hospital this past summer and enjoyed herself so much that she now wants to become an ER nurse. Natasha also enjoys research and wants to become more involved with it in the future. In her spare time she likes to rock climb, downhill ski, run and swim.



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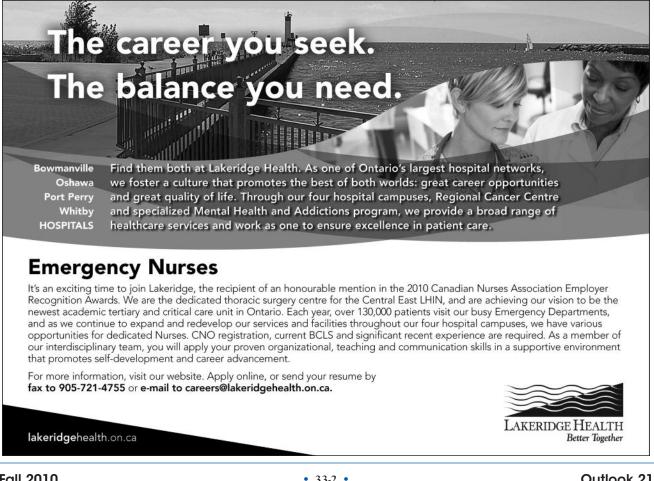
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The importance of surge capacity for emergency departments

By Brent Scrivens, RN, MA

Have you ever watched news coverage of an earthquake, a bus crash, or an explosion and had a sudden flash of guilt as you caught yourself thinking, "Boy, I'm glad that didn't happen near our emergency department"? Has this led to the more important thought, "What would we do if this happened near our overcrowded emergency department"?

The issue of *surge capacity* is vital to emergency departments and not so foreign a concept as we monitor the patient acuity, available space, and equipment availability throughout the average shift. In the above mass casualty examples, there is a limited time to adapt to a sudden influx and perform the interventions shown to most affect the mortality rates.

The metamorphosis from normal operations to disaster mode is referred to as surge capacity, which can be defined as "the ability to cope with increased numbers of casualties" (Chapman & Arbon, 2008, p. 6). Disaster surge capacity is much more onerous than the handling of normal daily surge and is sometimes broken into *conventional, contingency,* and *crisis* capacity depending on the extent to which a deviation from normal practices and standards is required (Altevogt, Stroud, Hanson, Hanfling, & Gostin, 2009, p. 52).

The "four S's of surge capacity"

The components required to effectively implement surge capacity are referred to as "the four S's of surge capacity" (Nager & Khanna, 2009, p. S90), which include *staff, stuff, structure*, and *space*. An individual facility or department may have strengths and weaknesses in any of the surge capacity components depending upon unique characteristics such as size, experience, number and type of casualties, and speed of surge onset (e.g., pandemic versus explosion).

Staff

Recent pandemic concerns have raised the issue of adequate numbers of nurses being able and willing to work in a disaster. However, in considering the staff element of surge capacity, staffing numbers are not the only relevant factor. To be prepared for a mass casualty event, the staffing considerations of a good disaster plan include:

- specialty trained staff and specialty skills (Nager & Khanna, 2009, p. S99)
- other disaster-specific critical competencies including, disaster recognition, decontamination, the incident command system (Wisniewski et al., 2004, p. 278)
- understanding of the emergency operations plan, and critical event communications (Hsu et al., 2006, p. 30)
- background and credential checks of convergent volunteers and imported staff (Hick et al., 2009, p. S64)
- need for impromptu in-services (Nager & Khanna, 2009, p. S99); and
- plans to support workers to present for duty (Amaratunga et al., 2008, p. 5).

This last point, the need to support emergency workers, is gaining more importance in Canada, as it has been detailed in studies such as Amaratunga et al. (2008, p. 24) that have shown more efforts are needed in providing supports to our disaster response workers.

Stuff

The stockpiles of equipment, pharmaceuticals, and supplies are referred to as the "stuff" of "the four S's of surge capacity" (Nager & Khanna, 2009, p. S99). "Hospitals should identify critical supplies for 96 hours (or longer, depending on hazard vulnerability analysis) and attempt to stockpile or ensure sources of sufficient quantities of usual or equivalent materials" (Hick et al., 2009, p. S66).

Inquiry into local hazards and likely disaster scenarios may indicate specific injury patterns that are far outside the normal ED presentation ratios such as frequent crush injuries postearthquake leading to rhabdomyolysis and other electrolyte problems resulting in acute kidney failure requiring emergency dialysis (Briggs, 2006, p. 543). The examining of theoretical risks should also rely on lessons learned from previous experiences, such as the Canadian examples of shortages of personal protective equipment reported during the 2003 SARS outbreak (O'Sullivan et al., 2008, p. S11) and problems with vaccine distribution during the 2009 H1N1 influenza season.

Structure

Perhaps the greatest similarity between health emergency management and other areas of disaster management is in the structure element of the four S's of surge capacity, which includes not only the physical infrastructure, but also the emergency management models ((Nager & Khanna, 2009, p. S99).

The physical infrastructure of a health care facility is best addressed through wide-ranging multidisciplinary planning efforts to ensure hospital survival (Auf der Heide, 1996, p. 465), and to avoid the disasters of the Northridge earthquake, Hurricane Andrew and, of course, Hurricane Katrina. This would then be refined through testing, exercises, evaluation and feedback, and further testing (Adini et al., 2006, p. 455).

The emergency management structure of the organization is most important in that it is well known to those who must implement the system and that it is well integrated with other stakeholders' systems (Kaji, Koenig, & Bey, 2006, p. 1158). At the frontline level, efforts are typically directed through the "Incident Command System" (ICS), which originated with California wildfire responders, or the Health Emergency Incident Command System (HEICS). Higher levels of the organizational complexity are managed via a more multi-jurisdictional structure such as the British Columbia Emergency Response Management System.

Space

The last "S" in the four S's of surge capacity is that of space, which alludes to the difficulties faced in many EDs in finding adequate room even in non-disaster times. As many facilities are routinely over capacity (Dauphinee, 2009, p. 38), there is a need to plan ahead for a more aggressive expansion of ED operations in disaster response.

Often, the first step to expand the footprint in what is called a "surge-in-place", where rooms, hallways, and nearby areas are quickly converted to become components of the ED, while supporting staff, supplies, and other resources are mobilized to assist these efforts (Hick et al., 2004, p. 255). Where these locations are located and how well they are equipped will depend on the level of surge capacity required and the pre-planning done by the facility. More aggressive expansion of the ED into other areas of the hospital and/or outside structures have the added burden of increased complexity of set-up, staffing needs, and potential cost (p. 256). The use of facilities outside of the affected hospital and acute care partners is referred to as communitybased surge capacity and, while time-consuming to mobilize, may be combined with other off-site patient care in high-anxiety-inducing incidents where, "for every casualty injured or infected, hundreds more may seek evaluation" (p. 257).

What can I do?

Knowing the basics of surge capacity and having plans to implement components of it are not the whole answer, as "plans are likely to be followed only when they are familiar to those who must use them" (Auf der Heide, 1996, p. 459). I would encourage all emergency department staff to reflect on the "four S's" of surge capacity and reflect on how your facility and your patients would fare in a mass casualty event.

As self-regulating professionals, front-line RNs in emergency departments should make use of both their department educators and emergency management departments to find out what procedures are in place and to take advantage of offered educational opportunities. One quick way to prepare yourself is to ask your supervisor how your role (and theirs) changes in a disaster. The daily experiences and wisdom of the workers who will implement plans are important in guiding the reality of planning assumptions, so it is important we all get involved.

Table 1. Suggested levels of surge capacity		
Surge capacity level	Description	
Conventional Capacity	Consistent within daily practices within the institution spaces and practices are used during a major mass casualty event that triggers activation of the facility emergency operations plan (Hick et al., 2009, p. S60)	
Contingency Capacity	Not consistent with daily practices have minimal impact on patient care practices used temporarily during a mass casualty incident or on a more sustained basis during a disaster (Hick et al., 2009, p. S60)	
Crisis Capacity	Adaptive spaces, staff, and supplies are not consistent with usual standards of care, but provide the best possible care to patients given the circumstances and resources available (Hick et al., 2009, p. S60)	

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Article review: Pelvic fracture: The last 50 years

By Margaret Dymond, RN, BSN, ENC(C)

Case

A 54-year-old male is bucked off a horse at full gallop and lands on his left side. EMS report no LOC, GCS 15, B/P 90/60, pulse 132, respiratory rate 28, SpO2 98% with a non re-breather mask, decreased breath sounds on the left side, pain and instability of the pelvis on palpation, tender abdomen, blood at the urinary meatus and laceration to forehead. Two large bore intravenous catheters have been inserted infusing normal saline. Spinal motion restriction devices are applied prior to arrival in the emergency department.

As care continues the patient does not respond to resuscitation measures and remains hypotensive. What does the evidence suggest as optimum management for unstable pelvic fractures with ongoing bleeding?

Introduction

Care and treatment of pelvic fractures has evolved over the last five decades.

Flint and Cryer (2010) describe the evolution that has occurred and that the successful management of pelvic fractures remains a difficult clinical problem. The short-term goal is to control bleeding and prevent death from exsanguinating hemorrhage. The long-term goal is to definitively treat the pelvic fracture and associated injuries

Table 1. Common mechanismsof injury associated withpelvic fractures

- Blunt force impacts by MVC
- · Heavy force transfer
 - Car-pedestrian
 - Motorcycle crash
- Falls > 15 feet

with less morbidity for the patient achieving pain-free walking, urinary continence, and normal sexual function.

Incidence of pelvic fractures and associated injuries

Demetriades et al. (2002) studied the epidemiology of pelvic fractures: 9.3% of patients with blunt trauma had pelvic fractures. Of these, 16.5% had intraabdominal injuries with the liver, bladder, and urethra the most commonly injured organs. When a severe pelvic injury is present, 30.7% of patients had associated intra-abdominal injury. Death as a result of pelvic fractures is rare (<1%), but if the pelvic fracture is present along with multiple severe injury patterns, mortality can reach up to 15% (Demetriades et al., 2002). Table One describes common mechanisms of injury that predispose the patient to severe pelvic trauma (Demetriades et al., 2002).

Classification of pelvic fractures and risk of bleeding

A common classification system used to grade pelvic fractures is the major force vector. This includes lateral compression, anterior compression, vertical shear and combined forces, plus degree of bony displacement (Flint & Cryer, 2010). This system does not accurately predict the risk of bleeding to assist in identification of patients who are at risk. Patients with severe bony injuries to the pelvis may not have massive bleeding. Other patients with significant pelvic bleeding may have minimal pelvic trauma (Flint

Table 2. Common injuries and assessment findings		
Injuries	Assessment Findings	
Pelvis	Pain on palpation of the pelvis Instability on palpation Shortening or abnormal rotation of the affected leg Hypovolemic shock	
Intra-abdominal injuries	Abdominal contusions/abrasions Abdominal rigidity Involuntary guarding Rebound tenderness Hypovolemic shock	
Bladder/urethral injuries	Suprapubic pain/tenderness Urge to void but unable Blood at urinary meatus Perineal ecchymosis Blood in the scrotum Hematuria Displacement of the prostate gland	
Rectal/vaginal injuries	Bleeding from rectum or vagina	
Open pelvic fractures	Obvious open wounds Palpation of bone protrusion on rectal/vaginal exam	

& Cryer, 2010). Since the grading system is inadequate to predict risk of bleeding, assessment and risk of bleeding from pelvic fractures is determined by physical assessment, mechanism of injury, imaging, and the hemodynamic status of the patient (Flint & Cryer, 2010).

Common injuries and assessment findings associated with pelvic trauma

Injury to the liver, urethral trauma, perineal trauma and bladder rupture are the most common injuries associated with pelvic trauma. Some patients may have no physical findings, yet have a urethral injury (Flint & Cryer, 2010). See Table Two.

Treatment of pelvic fractures

Prior to 1970, bleeding associated with pelvic fractures was managed in the operating room. Due to difficulty identifying the source of bleeding, many patients died during surgery from exsanguinating hemorrhage (Flint & Cryer, 2010). Newer surgical and nonsurgical approaches have been implemented to reduce death from exsanguination and morbidity from pelvic trauma.

The first treatment priority for trauma patients is assessment of the primary survey. Ensure the airway is patent and secure. Maintain adequate ventilation and oxygenation. Check the patient's vital signs and for external exsanguinating hemorrhage. All trauma patients should have two large bore intravenous catheters inserted infusing warmed isotonic solutions at rates consistent with the patient's clinical status. Consider infusion of blood and/or blood products if hypovolemic shock is present.

Once the primary survey is completed, the secondary survey is performed taking care to assess for other associated injuries with pelvic trauma. When a urethral injury is suspected, a transurethral catheter insertion is avoided, as a partial urethral tear can become a complete transection of the urethra. Imaging may be required to determine the severity of the urethral injury and if insertion of a urethral catheter is appropriate. Insertion of a suprapubic catheter may be required for some patients.

When the immediate needs of the patient have been addressed, the pelvic fracture will require management. See Table Three.

Early management of the pelvic fracture is key to preventing exsanguination, long-term dysfunction with ambulation, voiding problems, and preserving sexual function. Multiple treatment modalities may be required including pelvic binding in the emergency department to stabilize the fracture, along with active resuscitation. Pelvic binding with a sheet tied around the pelvis, pelvic C-clamp, external fixator, or compression device can reduce pelvic volume and increase pelvic retroperitoneal tissue pressure potentially decreasing bleeding. Pelvic binding has been effective for patients with venous bleeding, but not in the occasional patient with arterial bleeding (Flint & Cryer, 2010).

Angiography with embolization of the bleeding vessels is a possible option if bleeding persists in a patient with a poor response to pelvic volume reduction techniques and active resuscitation (Flint & Cryer, 2010). Complications of embolization include gluteal muscle or rectal necrosis (Flint & Cryer, 2010). In some trauma centres, mobile angiography is available to come to the emergency department and prevent unnecessary movement of the hemodynamically unstable patient to the interventional radiology suite (Morozumi et al., 2010).

Another option for stabilizing a patient bleeding from a pelvic fracture is gauze packing of the pelvic retroperitoneum if angiography is not readily available. One study demonstrated a reduced mortality rate when embolization with operative management such as gauze packing was performed (Flint & Cryer, 2010).

Definitive management for severe pelvic fractures usually requires open reduction and internal fixation (ORIF). Research has demonstrated that patients who have early ORIF have less disability with ambulation than patients who are managed conservatively, and early definitive repair of the injured urethra is

Year	Management Strategy	Result
<1970	Exploration of pelvic hematoma	• Exsanguinating hemorrhage
>1980	Pelvic Volume Reduction Pelvic Binding Sheet Commercial device External Fixator	 Easy to accommodate in emergency departments Not effective if bleeding is arterial
>1990	Angiographic embolization	 Identify source(s) of bleeding Helps stabilize the patient prior to the operating room May not be available in all centres Unstable patients may have to leave the ED for the procedure
>1990	Pelvic gauze packing	• Works well when used with angiographic embolization
>1990	Open Reduction and Internal Fixation	• Early fixation results in earlier ambulation and function

associated with long-term sexual function and few voiding difficulties.

ORIF of the pelvic fracture may be delayed due to management of other injuries and waiting for the systemic inflammatory response to subside. Flint el al. (2010) state the optimal window of opportunity for ORIF of the pelvic fracture is six days to two weeks post injury with a satisfactory result postoperatively in gaining pain-free walking for a majority of patients.

Conclusion

Patients incurring severe pelvic trauma are at risk of hemorrhagic shock and this injury is also associated with intra-abdominal injuries. The article review presents data on assessment of the injury, effective interventions to minimize complications and newer modalities up and coming to provide the best possible outcomes for patients.

About the author

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outlook Kids' Corner

Oral sucrose for pain in B.C. Children's ED

By Sharron Lyons, RN

Reprinted with permission from Quality Matters, Fall 2010

Infants and pre-verbal children are at risk for inadequate pain relief because it is difficult to identify and assess their pain. Sweet-tasting solutions have been used for management of pain in infants for centuries and now there is a growing body of evidence that the combination of small amounts of liquid sucrose combined with sucking is an effective mild pain-reliever during short-term procedures such as IV starts, immunizations, heel/finger pokes, suture removal, dressing changes and some tube insertions.

A pilot project is underway at BC Children's Hospital to test this simple intervention. Since June 2010, staff has been encouraged to consider the use of 54% sucrose solution given in 0.2 ml portions (up to 2 ml) prior to, during and immediately after minor procedures.

Since sucking enhances the analgesic effect, the baby is offered a pacifier or the

breast between doses. Pain relief lasts five to eight minutes. The trial is ongoing and evaluations so far have been largely positive, with 64% of staff saying the sucrose worked very well for such procedures as urinary catheterizations, lumbar punctures, heel/finger pricks, and IV starts. Stay tuned for more articles on pain management in our youngest population in upcoming issues!

About the author



Sharron is a registered nurse who has worked at the B.C. Children's hospital for more than 30 years—the last 21 years in the emergency department where she was involved in the disaster

program, and took the basic Light Urban Search & Rescue training, as well as CBRNE and Disaster Behavioural Health courses. During the Olympic/Paralympic games, Sharron worked on site in the Vancouver Village as a nursing supervisor. Other part-time jobs have included teaching ENPC and CTAS around the province of B.C., and working with the RCMP 'E' Division and B.C. Crime Prevention Association.

She has been involved in volunteer work for many years. At present, her volunteer work includes the Representative for Children & Youth of B.C. (Investigations & Reviews Committee, 2006–2010), National Emergency Nurses Association 2005–2010, Centre Excellence in Emergency Preparedness 2006–2010, Emergency Nurses Association of B.C. (Board of Directors, 2004–2010).

Past volunteer work: Critical Incident Stress Management Team, BCCH 1987–2008, B.C. Crime Prevention Association 1985–2004, and Block Parent Program of Canada Inc., Director & Volunteer 1984–2002.

I look forward to working with a great team of emergency nurses from across Canada.



Book review: Forensic Nursing Science, 2nd Edition

By Sheila Early, RN, BScN, SANE-A

Forensic Nursing Science 2nd Edition

By Virginia A. Lynch with Janet Barber Duval Elsevier Mosby Publishers 2011. ISBN number 978-323-06637-2

Virginia Lynch has updated her first book (*Forensic Nursing*), which was published in 2006 as the first major forensic nursing text. She has added new chapters to this recent edition, as well as updating chapters from the original text.

Three Canadians have contributed material to the book, as well. Arlene Kent Wilkinson, Associate Professor at University of Saskatchewan, wrote the chapter on forensic nursing education, Kent Stewart, Chief Coroner, Ministry of Justice, Province of Saskatchewan, wrote the chapter on asphyxia, and Sheila Early, Coordinator Forensic Health Sciences, British Columbia Institute of Technology, contributed Appendix C on procedures for sexual assault examination for male victims.

There are several chapters that directly affect the clinical practice of emergency nurses and other nurses in an acute care settings.

Forensic investigations in the hospital examines the role forensic nursing plays in the management of quality and risk assessments within a facility, details the need for vigilance for criminal activity internally such as drug diversion (drugs being misused or not provided to a patient, but diverted to others) and highlights the need for all nurses to be suspicious of unexpected patient deaths.

Evidence recovery in the emergency department provides a list of 24 different patient categories that are forensic in nature. These include the obvious: the sexually assaulted patient, the abused elder and the abused child, but also include occupational injuries, transportation injuries, abuse of the disabled, sharp force injuries, product liability, organ and tissue donation, firearms injuries, gang violence and all burns over 5% of body surface to list a few. There are detailed forensic evidence collection guidelines for the emergency department including a chain of custody document.

Blunt, sharp and firearm injuries is a must-read for emergency nurses, defining the difference between the different forms of blunt and sharp trauma with documentation tips for charting findings in a clear, concise and complete manner.

Child maltreatment and elder maltreatment chapters detail the indicators that nursing can use to identify possible victims of maltreatment.

Relationship crimes, sexual violence: Victims and offenders and sequelae of sexual violence chapters address the common issues of sexual violence and crimes.

Global expansion and future perspectives discusses the current status of forensic nursing in a variety of countries including Canada. It also describes the potential for forensic nurses to change the health care response to violence, crime and trauma.

Other topics of interest to the emergency nurse include: asphyxia, electrical, thermal and inhalation injuries, suicidal behaviour and risk assessment, sudden death during restraint: excited delirium syndrome and human trafficking.

Emergency nurses who care for patients seeking care following an incident of

crime, violence or trauma (or often all three) will find this text extremely useful as a reference guide. Forensic nurses will find the text an updated and expanded version of the first edition.

About the author



Sheila Early, RN, BScN, SANE-A. I am currently the coordinator of an Advanced Specialty Certificate in Forensic Health Sciences at British Columbia Institute of Technology.

It was the first classroom-delivered certificate in Canada when I developed it in 2005. I teach in three of the four forensic health sciences courses within the certificate, as well as doing workshops and courses in other provinces, particularly sexual assault nurse examiner courses that I have taught in five provinces. I was an emergency nurse from 1970 until 2000 when I became a forensic nurse!

I have been a NENA member since 1985 and have been active in both Saskatchewan and B.C. provincial groups in a variety of capacities.

I have been a member of the International Association of Forensic Nurses since 1995 when I "found" IAFN and have been in a variety of positions with IAFN. Currently I serve as a Director-at-Large International.

I am one of the four founding members of the Forensic Nurses Society of Canada, which worked to achieve status with Canadian Nurses Association as a subspecialty of nursing in Canada.

I am married with two adult daughters and have three grandchildren who are the joys of my life!

Call for nominations: "treasurer" and "secretary"

Are you interested in serving on the board of directors? Then read on—this year there are two available positions. The secretary and treasurer positions are two-year terms. Both positions would begin following the annual general meeting in Regina, Saskatchewan. The board of directors meets twice yearly. Both meetings are three days in length. Typically, the spring meeting, though, is held in conjunction with a regional or national conference, so time away from home is usually longer.

As secretary, you are expected to carry on the affairs of the corporation under the supervision of the officers of the board. You are expected to attend all meetings and to record all votes and minutes from these meetings. You will ensure that all board members will receive board meeting minutes in a timely fashion and, as well, you are responsible for producing the incorporated minutes. You will set the agenda for the board meetings in collaboration with the president. There may be additional duties that would be assigned to you by the president.

As treasurer, you are entrusted with the funds and securities of the corporation and you shall keep full and accurate accounts of all assets, liabilities, receipts and disbursements. You will be responsible for depositing all monies, securities and other valuable effects in the name and to the credit of the corporation. As well, you will be responsible for the disbursement of such funds. You are expected to prepare and deliver an accounting of all financial transactions at each board meeting. You will be expected to submit an annual accounting to the membership at the AGM. There may be other duties assigned to you by the president.

Two NENA members must nominate candidates and the nominee must be a NENA member in good standing. A nomination form has been included for your use. Please forward a completed nomination and curriculum vitae to Sherry Uribe. Her address is listed on the nomination form. Nominations for these positions may also be made from the floor at the AGM. Announcement of successful candidates will be made following the election at the AGM in Regina, SK. outlook

Nomination Form

NENA executive position

Positions:

- Treasurer
- Secretary

We, the undersigned voting members of NENA, do hereby nominate:

	-
for the position of	
on the NENA executive.	-
(nominee) is in good standing with NENA.	
1. Name:	
Date:	
Signature of nominator:	
2. Name:	
Date:	
Signature of nominator:	
I,	,
do hereby accept this nomination for the position of	
on the NENA executive.	-
Signature:	
Date:	
Please return this	
letter of intent and CV,	
by January 15, 2011, to:	
Sherry Uribe, RR 5, S10 C7	
Oliver, BC V0H 1T0	
e-mail: nominations@nena.ca	

The NENA Bursary

NENA recognizes the need to promote excellence in emergency care and, to this end, to provide financial aid to its members. NENA will set aside a predetermined amount of monies annually with the mandate of providing a high standard of emergency care throughout Canada. All sections of the emergency nursing team are eligible for consideration including staff nurses, managers and educators.

Applications must be submitted prior to the spring Board of Directors meeting of NENA for review by the standing committee for bursary disbursements. On April 1 of each year the number of bursaries awarded will be determined by the number of registered members per province for that NENA fiscal year i.e.:

1–99 members: 1 bursary
100–199 members: 2 bursaries
200–299 members: 3 bursaries
300–399 members: 4 bursaries
400–499 members: 5 bursaries
500–599 members: 6 bursaries
600 + members: 7 bursaries

One bursary is to be available to NENA Board of Directors members and one bursary per year will be available to an independent member.

Successful candidates can receive a bursary only once every three years.

NENA Bursary application process

Each candidate will be reviewed on an individual basis and awarded a number of points as set out below:

1. Number of years as a NENA member in good standing

- 2 years...... 1 point

- 10 + years 5 points

outlook

The NENA Bursary

2. Involvement in emergency nursing associations/groups/committees:

- Provincial member......1 point
- Provincial chairperson 2 points
- National executive/

chairperson..... 5 points

3. Candidates with certification in emergency nursing and/or involved in nursing research will receive an additional five points.

If two candidates receive an equal number of points, the committee will choose the successful candidate. All decisions of the bursary committee are final.

Each application will be reviewed once per spring board meeting.

Preference will be given to actively involved members of NENA and those actively pursuing a career in emergency nursing. Those members requesting assistance for emergency nursing certification, TNCC, ENPC, CATN, as well as undergraduate or post-graduate studies that would enhance emergency care will also receive preference.

Candidates must have completed Forms A, B and C (included with this issue of **Outlook**). The provincial director may forward applications at the spring board meetings.

Any incomplete forms will be returned to the provincial director for correction if possible.

Eligibility

- Current RN status in respective province or territory. (Proof of registration required.)
- Active member in NENA Inc. for at least **two** consecutive years. (Proof of membership required.)

- Working at present in an emergency setting which may include:
 - Emergency department
 - Nursing station
 - Pre-hospital
 - Outpost nursing
 - Flight nursing

Application process

Candidates must complete and submit the following:

a. NENA Bursary application form "A"

- b. Bursary reference form "B"
- c. 200-word essay

d. Photocopies of provincial registered nurse status and NENA registration

Provincial representative responsibilities:

- a. Completes bursary candidate's recommendation form "C"
- b. Ensures application forms are complete before submission
- c. Brings to Board of Directors meeting all completed applications

Selection process

The standing committee for bursary disbursements will:

1. Review all applications submitted by provincial representatives and award bursaries based on selection criteria.

2. Forward names of successful candidates to the Board of Directors for presentation.



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NENA Bursary application form "A"

Name:	Date of Application:		
Address:			
Phone numbers: work ()	; home ()	; fax ()	
E-mail:			
Place of employment:			
Name of course/workshop:			
Date:	_ Time:	_ Length of course:	
Course sponsor:		Cost of course:	
Purpose of course:			
Credits/CEUs:	ENC(C) Certified: \Box Yes \Box No		
Previous NENA Bursary: 🖵 Yes 🖵 N	No Date:		
	ately 200 words stating how this education proved outcome for the emergency care u	•	

Ensure photocopies of provincial RN registration and provincial emergency nurses association membership are included with your application: Attached?: \Box Yes \Box No

NENA Bursary application form "B"

care setting. This applicant should receive monies for	(name of course).
Reason:	
Other comments:	
Signed: Position	n:
Address:	
provincial director's recomn	nendation form "C"
provincial director's recomn	nendation form "C"
Name of bursary applicant:	Province:
-	Province:
Name of bursary applicant: Length of membership with provincial emergency nurses group: _ Association activities:	Province:
Name of bursary applicant:	Province:
Name of bursary applicant: Length of membership with provincial emergency nurses group: _ Association activities:	Province:

NENA Award of Excellence application form

Forward all submissions to the provincial representatives by April 20 of each year. Incomplete or late applications will not be eligible for consideration. Successful candidates will be presented with awards at the annual general meeting. In order to facilitate the process of the applications, the nominator will involve the nominee in the submission and verification of information.

Award of Excellence in:		
Nominee:	Address:	
		_ Postal Code:
Phone: work (); home () _	; fax ()	
E-mail:		
Employer:	_ Current position:	
Nominator:	_ Address:	
		_ Postal code:
Phone: work (); home () _	; fax ()	
Letter of support (1) from:		
Letter of support (2) from:		
Signature of nominee:		
Signature of nominator:	Date:	

\$5,000 Relocation Assistance for eligible candidates





MERGEN

Fraser Health is proud to be one of BC's Top 55 Employers. As the province's fastest-growing health region, we continue to build for the future. Our latest initiatives include the Surrey Outpatient Care & Surgery Centre opening in 2011, a unique facility combining day surgery, diagnostic procedures, and health clinics; in 2013, a new Emergency Department will open at Surrey Memorial Hospital's Critical Care Tower; it will be three times larger than the existing, with five specialized operational zones. We also have current needs for ER Nurses in choice locations.

Together, we create great workplaces. We offer education support, mentorship, excellent salary and benefits, and an outstanding work environment in Greater Vancouver and the Fraser Valley, British Columbia. Ask about Relocation Assistance.

PHONE: 604-953-5119 Toll Free: 1.866.837.7099 EMAIL: recruitment@fraserhealth.ca WEBSITE: www.fraserhealth.ca/careers | BC's Top 55 Employers



FACEBOOK: www.facebook.com/fraserhealthcareers