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I extend greetings to all Ohio members. Many of us attended the national meeting in Orlando, Florida and came home refreshed from the warm weather and sunshine but also reinvigorated with enthusiasm for our professional. The program sessions I attended were well done. I would like to share with you updates with our chapter on a national and state level.

The Ohio Chapter of NAPNAP continues to hold the position of the largest chapter with 418 members. The second largest chapter is the eChapter with the 339 members. Total national NAPNAP member is 7,538 with a 9% increase since last year. As for the state of Ohio, almost 50% of all Ohio PNPs are part of our membership ranks.

I heard from the officer’s meeting an excellent idea that would enhance what we as a professional organization represent. I would like to appoint a member or two as a non-voting board member to be a community service chair. This person or persons would help us achieve our mission for identifying opportunities for “giving back” in service projects. Some ideas shared from the officers’ meeting were adopting a family in need, collecting donations for a selected charity at our conferences, responding to state and national disasters. If you are interested in this position please write me at jill.kilanowski@gmail.com.

The NAPNAP Foundation is also looking for members to join their finance or research committees. The NAPNAP Foundation was formed in 1978 with a mission to support the improvement of the quality of life for children and their families by awarding and administering funds for advanced pediatric nursing education, research, clinical projects, and special initiatives. The Foundation is also looking for support for their grant awards. A letter from the Foundation President Jo Ann B. Serota, DNP, CPNP can be found at http://higherlogicdownload.s3.amazonaws.com/NAPNAP/41459091-f074-49ae-a6a4-bc26eeceea1d/UploadedImages/%20Appeal%20Letter_2012.pdf

Please take the time to view the national website [www.napnap.org] and our state website [www.ohio-napnap.org]. Once there you will see many resources available to our membership and benefits of membership. Soon you will see a survey to be distributed to our Ohio membership asking for updates on your needs of us you professional organization. We hope you respond.

As the month of May contains Nurses Week, I extend to all a thank you for all you do for Ohio’s children and their families.

I hope to see you in October at our next conference.
Greetings—Fellow PNPs and students! As many of you know, I have aged as in my profession as a PNP. September 20th will be my 40th year as a PNP! The years have flown! I started as an idealistic young woman with a love for pediatric nursing drawn into a new and developing role for a pediatric nurse. My, O, My has this dynamic idea bloomed and flowered for me over the years. Look at us now! I have loved my role as a PNP and never regretted the path. It has been like the yellow brick road and I remain in the Land of Oz!! There have been dilemmas that have presented themselves along the way but with family and peer support have always been resolved and workable.

However, I currently have 2 dilemmas. When I research the topics or talk to other professionals about them, I am faced with the comment that “It is a national trend and a problem for all”. Sorry, but I just cannot accept that. I am asking for your help. My hope is that everyone who reads this newsletter will click my email address at the end of this submission AND give me feedback on my dilemmas. Even if you have no comment, please email. Perhaps I need to just accept that “it is what it is”. Your comments will be appreciated!

DILEMMA 1: Students in GRAD school and actually most college students never read class materials and assignments. “This is a National Trend.” Students need to acquire information to prepare for class and to ultimately prepare for their chosen professions. How do we change this practice? Should we change it?

DILEMMA 2: Most PNPs are not involved with their state chapters and rarely interact with either the newsletter or conferences. This, too, “is a National Trend”. How can the Ohio Board of NAPNAP assist our members to become more a part of their professional commitment? This role developed over the years because of ideas of its members. We always need new thoughts and concepts. Being part of this role that serves children and families may even require more great ideas for further expansion as the year’s progress! Take that yellow brick road and come to Oz. Where is the future for the PNP role for you?

Please click on my email and share your ideas!!! kerrli@hotmail.com
Health Policy/ Legislative

Mandi Cafasso

Standard Care Arrangement and Quality Assurance

Ohio NAPNAP recently held a conference in March, focusing on the six hour of continuing education that is required for license renewal this year. During the talk on the law and rule there were several questions about the Standard Care Arrangement and the Quality Assurance standards that are required by APRN’s in the state of Ohio. Ohio Administrative Code 4723-8-04 discusses the standard care arrangement for a certified nurse practitioner. In the state of Ohio, an APRN must enter into a collaborative agreement with a physician prior to engaging in practice. This Standard Care Arrangement needs to include the following for all APRN’s (CTP or non-CTP holders):

1. APRN’s name
2. Names of each collaborating MD or physician designated representative (i.e. department or unit director)
3. Date arrangement is initially executed
4. Date of most recent review
5. Name, specialty and practice area, business address and phone number for all collaborating MD’s and certified nurse practitioner (CNP)
6. For CTP holders, a description of the scope of prescriptive practice
7. A plan for incorporation of new technology or procedures within the scope of practice
8. A policy for care of infants up to age one and recommendations for collaborating MD visits for children from birth to age 3 years
9. A plan for coverage of patients in an emergency or planned absence or either the CNP or the collaborating MD
10. A process for resolution of disagreements regarding matters of patient management
11. An arrangement regarding reimbursement

This collaborative agreement should be reviewed at least annually. There should be provisions addressed that include:

1. Criteria for referral of a patient to the collaborating physician
2. A process to obtain consultation from the physician
3. Procedure for regular review of referrals to other providers and care outcomes for a representative sample
APRN’s with a certificate to prescribe (CTP) the following Quality Assurance provisions should be included and the standard care arrangement should include the APRN’s scope of prescribing practices.

1. Provisions to ensure the collaborating MD can see the patient in a timely manner if indicated

2. Additional prescribing parameters
   a. Provisions for use of drugs with non-food and drug administration
   b. Provisions for use of drugs approved by the FDA and reviewed by the committee of prescriptive governance (CPG), including new indications
   c. Provisions for Schedule II controlled substances

3. A procedure for the nurse and the collaborating physician, or a designated member of a quality assurance committee conduct a review, at least semiannually, of:
   a. A representative sample of prescriptions written by the nurse;
   b. A representative sample of schedule II prescriptions written by the nurse;
   c. Provisions to ensure that the nurse is meeting all the requirements related to review of a patient's OARRS report

The Ohio Board of Nursing does not have a sample of a quality assurance review for APRN’s to use as a guide for recording the above information. However, according to Ohio Administrative Code 4723-8-05, the quality assurance review should include:

1. Periodic random chart reviews annually
2. Semi-annual review of prescriptions written and prescribing patterns
3. A conference with the collaborating physician to discuss the chart review and identification of any patient care issues
4. A process for patient evaluation of care

With regards to prescribing of schedule II controlled substances, the quality assurance review does not specify the manner in which schedule II medications should be addressed. Schedule II medications would not need to be addressed in the same manner that the nursing regulations require off-label medications be addressed, e.g, supported by peer reviewed literature or identified as the standard of care at the APRN's facility. Here is a sample Quality Assurance Tool based on the above information:

Please remember that the number of charts reviewed needs to be a representative sample and should be discussed with your collaborating MD or institutional guidelines.

Delegation For Ohio APN’s
Ohio NAPNAP is aware that OAAPN has been working with ONA to draft legislation that will allow APRN’s to expand current delegation practices to unlicensed personnel. The first draft of this legislation is expected to have site restrictions that may not be beneficial to APRN’s practicing in primary care settings.
Ohio NAPNAP supports legislation that will improve our scope of practice and remove barriers to care. We are monitoring this initiative and will inform members of movement on this issue as we become aware.

Use of “Doctor” Title

As many APRN’s begin furthering their education to terminal degree, there has been a lot of discussion about the use of the title “doctor” as it pertains to nurses. In 2010 the Institute of Medicine Report recommended doubling the number of nurses with a doctoral degree by 2020. The title doctor is used for a terminal degree in many areas, not just in health care. But there has been concern voiced by the American Medical Association that the use of doctor for more than an “MD or DO” could cause confusion. Pharmacists, physical therapists, nurses and doctors introducing themselves with a doctor title may be misleading for the patient. The AMA launched a Truth in Advertising campaign in 2009 saying that patients have the right to know their providers level of education and training and licensure. As a result of this campaign, nearly half of the states in the US have legislation in process to prevent healthcare providers who are non-physician caregivers from misrepresenting themselves. In 12 of these states the legislation has become law. States where this legislation has been enacted include: Arizona, California, Florida, and New York, just to name a few.

The most recent bill regarding title protection in our state was House Bill 303 which passed in December of 2012 and included revisions to the nurse practice act. This bill provides title recognition to Advanced Practice Registered Nurses (APRN). APRN is the nationally accepted term now used to refer to registered nurses who have reached the advanced degree, licensing and certification. NAPNAP will be monitoring legislation and will keep APRN’s informed of possible changes to Ohio law.

Membership

Peg DiMarco

Currently, Ohio NAPNAP has 412 members. Membership levels continue to include member, fellow, retired, student, new graduate, and DNP student. Member is an active member who is able to vote, hold office, and serve on committees. They also must be a PNP, SNP, FNP, NNP, or CNS. A fellow is a member who has PNCB or ANCC certification.

Students are registered nurses who are currently enrolled in a graduate program. Doctoral students are currently enrolled in a doctoral program. Active members that are in their first year following their completion of the NP or CNS programs are new graduates. A retiree is a member employed as a PNP or CNS who is over the age of 62 years.
The spring conference was well attended with 85 members attending our Pharmacology/Schedule II Update. Thank you to the members that assisted with presenting, finding speakers and doing the last minute tasks to make the conference a success.

SAVE THE DATE:
FALL CONFERENCE 2013- OCTOBER 18-19, 2013
HILTON GARDEN INN BEAVER CREEK
TERESA THORPE- CHAIR

ANSWERS TO PROGRAMING FREQUENTLY ASKED QUESTIONS:
1. We will continue to send out information for the conferences via the newsletter, listserv and website. Please keep us notified of your most current email address. This is in accordance with the National goals of trying to be “green.” At this time there is no plan to send out brochures via US mail. The cost far exceeds the benefit.

2. At this time we will continue to print handouts if possible and share them at the conference. Requires speakers to be on time! Ohio NAPNAP will make every effort to include a Schedule II CE yearly which will meet the Ohio Board of Nursing CTP CE requirements.

3. The Ohio Board of Nursing requires 24 CE hours for renewal of your license and an additional 12 hours of Pharmacology specific CE if you have a CTP. This renewal period requires that those with a CTP have 6 hours of pharm that focuses exclusively on Schedule II pharmacology and 6 other pharm CE of your choice. Please remember to also comply with the requirements of your certifying body which may be more than the OBN requirements.

4. Conference Registration: you have two methods of registering for an Ohio NAPNAP conference. You may register online with PayPal or print off a registration form and mail to Ohio NAPNAP. *** You must comply with the registration deadline or will be charged a $50 late fee. There is also the possibility of being denied attendance if the registration comes in after the attendance numbers have been called into the hotel. This is a requirement of our venue, not Ohio NAPNAP.

NEEDED!!!! CHAIRPERSONS FOR 2014- IF YOU ARE THINKING OF POSSIBLY PLANNING A CONFERENCE PLEASE CONTACT JILL SMITH ASAP!!!!
JILLPNP@YAHOO.COM
Awards

The recipient of the 2013 Student NP of the Year Award is Stacie Leeper. The PNP Student award recognizes an outstanding PNP student that exhibits outstanding behaviors in leadership, scholarship, and professionalism. The recipient of this award receives dues for attendance at one Ohio NAPNAP conference and is recognized by presentation of a plaque. Stacie was nominated by her instructor Heather Schober. Stacie is an acute care nurse practitioner student at the University of Akron. She was also the 2010-2011 Ohio NAPNAP student representative.

The recipient of the 2013 Mental Health Scholarship is Dr. Robin Bryan. This is a one-thousand dollar tuition scholarship awarded to a PNP who has taken an active role in the care of children and adolescents with emotional or behavioral health problems, and wishes to attend a mental health education program. Robin completed her Doctorate of Philosophy of in Nursing at The University of Akron in May 2011. She is currently working as a Pediatric Nurse Practitioner at Children’s Physician’s, Inc. in Canton, Ohio and is taking an active role in the care of children and adolescents with mental health issues. She plans to attend the National NAPNAP Conference in Orlando next month and has signed up to attend an intensive workshop titled: COPE for depressed and anxious teens., the Pediatric Mental Health Specialist Certification Review Course and several presentations on a variety of mental health issues. As the recipient of the award, Robin will also either write a mental health related article for the Ohio NAPNAP Newsletter or present a lecture at an upcoming Ohio NAPNAP conference.

We are now excepting nominations for PNP of the Year and Child Advocate of the Year. The deadline for submission of the nominations is July 6th.

The nomination forms are located on the Ohio NAPNAP website

Ohio NAPNAP Listserve

If you any questions or concerns about the Listserve please contact me at my email. address hoerstinga@childrensdayton.org
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Ethics Advisor                 Linda  A. Strong

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Email me if you have questions or suggestions for articles.  lastrong@cox.net

Recruitment       Michelle Wilson

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Recruitment Committee
At the last board meeting in March, we updated everyone on some of the numbers work that we have done in terms of getting a handle on how many potential members can we recruit. We have about 49% of the PNP’s in Ohio as members but we’d like more! Please spread the word about the many benefits of being an Ohio NAPNAP member. If you have a reimbursement fund for professional memberships through your employer, consider joining NAPNAP. We continue to recruit student PNP’s as well and our conferences are open to students as opportunities to network, share knowledge and obtain continuing education. We continue to network with the APRN directors state-wide and ask for their assistance in encouraging PNP’s in their reporting structure to join NAPNAP. If you have any questions about recruitment or would like to be a part of this effort, please contact Michelle Wilson CNP--mwilson2@chmca.org.

Thanks!

Clinical Practice                      Michelle Widecan

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This month we have two student contributors from the University of Akron. Maura McDermott and Camilla Cullis are recent graduates from the University of Akron. Both students were in the primary and acute care pediatric nurse practitioner tracks.

A Standard of Practice: Pediatric Subcutaneous Fluid Rehydration

Diarrhea is the most common cause of dehydration in children and accounts for more than 3 million physician visits, 220,000 hospitalizations per year (almost 10% of all hospitalizations of children), and leads to over 400 deaths in the United States. Internationally this death toll increases to nearly 4 million. The severity of hypovolemia and the promptness of rehydration are directly correlated to the rates of morbidity and mortality in infants and children. The degree of dehydration largely determines therapy choice. Oral rehydration is the preferred intervention in mild and some moderately
dehydrated patients while intravenous intervention is also a common practice, particularly when patients fail oral hydration (Diggens, 2008). There is research that also supports the use of subcutaneous rehydration in mild to moderately dehydrated patients, though no literature exists for the support of this method in those with moderate to severe hypovolemia.

A literature review was conducted to determine best practice guidelines for the use of subcutaneous fluid administration as an alternative to intravenous fluid infusion in the treatment of mild to moderately hypovolemic children. If the use of subcutaneous access for rehydration therapy proves to be as or more beneficial and/or more efficient than intravenous administration then a standard of practice must be developed. In addition, if the use of animal or human derived hyaluronidase aids in the administration of fluid, its use must be included in the standard of practice. This paper examines the current literature regarding the use of hyaluronidase and placement of subcutaneous access, concluding with recommendations for best practice options in patients with mild to moderate dehydration.

**History**

In the 1940s-1960s, prior to the development and use of intravenous fluid administration, subcutaneous infusion of fluids was a standard of care for fluid resuscitation in dehydrated patients. Subcutaneous fluid administration, also known as hypodermoclysis, allows for large amounts of fluid to be given to a patient. When given subcutaneously, fluid containing dextrose and/or electrolytes is fairly well absorbed systemically. A benefit to subcutaneous fluid administration is the ease and speed of the insertion of the catheter. Placement of a subcutaneous line involves pinching a fold of skin, preferably on the upper back, and placing a standard IV catheter. This practice requires minimal skill, training, and time and has been shown to allow fluid administration to begin much sooner than a standard IV catheter. Once the catheter is placed, Human Recombinant Hyaluronidase (HRH) is administered. This substance is a human, DNA-derived hyaluronidase enzyme responsible for thinning the subcutaneous tissues necessary for effective subcutaneous fluid administration and absorption (Arthur, Goodloe & Thomas, 2012). This technique can be used at a variety of locations throughout the body that are less sensitive than intra osseous and intravenous sites, providing a less traumatic experience for a patient with only mild to moderate dehydration (Allen, C.H., Etzwiler, Miller, M.K., Maher, Mace, S., Hostetler, M.A. Smith, S.R., Reunhardt. N., Hahn, B. & Harb, G., 2009). Studies have shown that both HRH and animal derived hyaluronidase are effective in aiding the absorption of subcutaneous fluid when infused into the catheter prior to fluid administration (Spandorfer, 2011).

**Methods**

To develop a standard of practice for to the use of subcutaneous fluid rehydration therapy with human or animal derived hyaluronidase, a literature review was conducted. This meta-analysis focused on the procedures, relative success of rehydration in pediatric patients with mild to moderate dehydration when compared to IV, NG/PO, and IO infusions, ease of use and tolerability of practice. In order to find correlating studies the word subcutaneous was searched in multiple combinations with the following terms: rehydration, dehydration, pediatrics, fluid therapy and hyaluronidase. The databases used included Academic Search Complete, Cochrane, Medline, CINAHL, EBSCOhost and the American Academy of Pediatrics. Initially the searches from the AAP returned over 300 results, which were then narrowed down to 37 for consideration. The other databases were searched in combination and returned results over 69 then narrowed down to 15 for consideration. These results were limited to literature published from 2008 to present. They were further restricted by identifying articles with pediatric studies alone or in combination with adults. Those in combination were not eliminated because they provided data pertinent to the use of hyaluronidase with fluid boluses. The articles were further limited to rehydration in patients with only mild to moderate dehydration. This study evaluated
seven peer reviewed articles with research conducted in the area of subcutaneous fluid rehydration therapy and published in the last five years.

**Results**

When a child presents with mild to moderate dehydration, oral or nasogastric tube fluid replacement is not the best option in patients with nausea, emesis or refusal. As a result of the hypovolemic state, IV access can be difficult to obtain and cause what is sometimes described as the worst pain the patient experiences during their hospitalization. Commonly in pediatrics, IV access is attempted numerous times by multiple practitioners without success. Some limitations to IV placement include difficult anatomy, positioning issues, environment conditions, and the acute or chronic illness affecting the patient. The use of an intraosseous needle (IO), is not recommended in children who are mild to moderately ill and require fluid, but instead only for those severely ill requiring fluid resuscitation in large volumes (Kuensting, 2011). Both IV and IO lines have risks, including pain, extravasation, infection, lengthy placement time, and required ongoing maintenance. Therefore, if a practitioner is unable to obtain IV access and the patient does not qualify for the placement of an IO, there tends to be a delay in care (Arthur et al., 2012).

The use of subcutaneous fluid administration is slowly starting to be brought back into practice as a favorable alternative to IV or IO fluid administration in pediatrics. In a retrospective study by Kuensting 2013, medical records from 36 children who received only subcutaneous fluids or received subcutaneous fluids after 2 or more failed IV attempts were reviewed. This study showed that there was a significantly longer time to the start of a fluid infusion in the children who received subcutaneous fluid only after 2 failed IV attempts of about 1.5 hours as opposed to those who initially received subcutaneous fluid, which was about 20 minutes. Other considerable data obtained from this study found that patients getting only the subcutaneous fluid administration received 1 needle stick, whereas the patients who initially underwent IV attempts received an average of 4 failed IV attempt plus 1 subcutaneous attempt (Kuensting, 2013).

Another study, in which children were given 1 ml of HRH followed by 20ml/kg of isotonic fluid over a one hour time period, and additional fluid if necessary, showed that 84% of the patients were discharged home after rehydration through subcutaneous fluid administration. However, 59% required the flow rate to be decreased, 57% developed swelling, 53% of children younger than 3 had an objective pain score of at least 5, and one child developed cellulitis at the infusion site 20 hours after being discharged. Although there were some adverse effects, overall subcutaneous fluid administration seemed more favorable than IV fluid administration. The study showed that subcutaneous access required fewer attempts than IV access, with initial placement success found in 90% of the patients. Further, physicians were satisfied with the procedure and felt it was easy to place a subcutaneous catheter, and parents were more satisfied with the treatment and outcomes (Rimon & Freedman, 2010).

A pilot study conducted across nine emergency departments in the United States from August 2007-June 2008 confirmed that the use of hyaluronicidase was a safe, effective method to rehydrate children suffering from mild to moderate dehydration, supported by the 94.1% success of patients rehydrated with subcutaneous rehydration as the primary tool for infusion. Furthermore, insertion and catheters remaining in place appeared to be well tolerated with no patients complaining of discomfort such as tenderness, erythema, pruritus, swelling, ecchymosis or rash; 0.07% of patients complained of site pain. A total of nine patients (0.18%) of the sample did experience adverse reactions that lingered between one and three days after the infusion, however none were related to the infusion fluid of hyaluronicidase injection. Of note was the support by the parents accompanying the patients whom supported the procedure and noted that access was achieved easily (Allen et al, 2009). Spandorfer
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(2011) demonstrated that hyaluronidase-facilitated fluid administration had improved flow rates over those fluids given without the enzyme. Further, subcutaneous fluid rehydration therapy was deemed less invasive, and an easier task to perform. This article revealed many advantages for use of subcutaneous fluid rehydration therapy including ease of cannula placement, fewer needle sticks, and decreased risk for staff injury by needle stick. There was a significant difference of less than a one minute time period for subcutaneous fluid rehydration therapy catheter placement in contrast to five minutes for IV placement. Initiation of therapy via each route was 3.3 minutes and 17.5 minutes respectively. A limited study also showed a potential lower cost associated with subcutaneous fluid rehydration therapy due to less time staff tended to initiation and monitoring, lower supply costs, avoidance of inpatient treatment and no specialty training to place the catheters. Limitations of use were also identified; contraindications included patients with circulatory collapse, hypovolemia, increased coagulopathy, skin compromise and moderate to severe dehydration. Further, no blood draws can be done from subcutaneous catheters and there is limited data on the infusion of medications.

**Discussion**

The limited literature available provided support that subcutaneous rehydration therapy for mild to moderate dehydration in children is as effective as oral or intravenous routes of administration. There are appropriate patients, circumstances and considerations that should be made when choosing this route for rehydration (see Appendix A for steps to determine eligibility of patient for subcutaneous rehydration). The literature reviewed validates considerations to develop a standard of practice for the use of subcutaneous rehydration therapy with hyaluronidase. Recommendations are as follows: The use of subcutaneous rehydration in patients with limited access should be considered as a method for delivering fluid boluses or infusions. (1) Choice of site should be dependent on body habitus but limited to the interscapular, thigh, abdomen, upper chest and upper arm regions as these are more readily distributed with subcutaneous tissue and were tested in the reviewed studies. (2) 1mL (150units) of hyaluronidase enzyme should be infused when the subcutaneous needle is placed to accelerate fluid absorption into the tissue and decrease risk of site reactions, patient must be monitored for signs and symptoms of anaphylactic reaction, though only indicated in one patient across all studies reviewed. Other signs and symptoms of allergic reaction such as hives, hypotension, nausea, emesis, and site reaction should also be monitored for during this initial infusion. (3) Solution for rehydration should not contain additional electrolytes (4) Solution should be infused at a rate of 5ml/kg/hr for five minutes, increased to 10ml/kg/hr for five minutes and then increased to a maximum rate of 20ml/kg/hr for the remaining infusion. During the initiation and each increase the infusion site should be monitored for site reactions such as erythema, edema, ecchymosis and pain. The rate of infusion for subsequent boluses can start at the highest tolerated rate from previous infusions to a maximum of 20ml/kg/hr (5) Sites should be rotated every 24 to 48 hours depending on the appearance of the site. Studies showed sites can be used up to 72hours but is not recommended. (6) Hyaluronidase should be repeated every 24 hours if the site continues to be used.

There are limitations to use of the subcutaneous site that should be taken into account. The risk of allergic reaction to hyaluronidase and risk of anaphylaxis in a patient with no other access to administer medications is important to consider. Further, no studies have been conducted on whether or not it is effective to administer medications usually given orally or parenterally. Subcutaneous rehydration therapy cannot be used in a patient with in hypovolemic shock, severe dehydration, abdominal ileus, persistent vomiting or having circulatory collapse as they will not absorb and circulate
the fluid administered (Spandorger, 2011). Patients must be evaluated for these signs prior to attempting this access.

Conclusion

The use of subcutaneous fluid administration in mild to moderately hypovolemic children should be considered for therapy in eligible patients that have failed oral rehydration. This alternative to intravenous line placement is less painful, as effective and enables resources to be utilized more efficiently due to ease of placement. Once a patient is deemed an appropriate candidate for subcutaneous fluid administration, steps should be taken to place a line and deliver fluid for rehydration therapy. These guidelines should be standard across all pediatric medical facilities to ensure appropriate, safe use in this patient population.

References:


If you have any ideas for the newsletter, please feel free to contact me at hls2@uakron.edu.
Guest Contributor: Ann Marie Brown MSN RN CPNP

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Ann Marie Brown is a Pediatric Nurse Practitioner in the PICU at Akron Children's Hospital. In addition, Ann Marie is also a PhD Candidate at the University of Akron. Her article regarding the consensus model will be presented in this issue of the newsletter. Any comments or feedback, you may contact Ann Marie at abrown@chmca.org.

Toward Compliance with the APRN Consensus Model in Ohio: Next Steps

History and Overview of APRN Consensus Model

In the United States, federal, state and local venues such as cities each have governing rights as set out in the Constitution to avoid a power held by proxy by any individual entity (http://www.archives.gov/exhibits/charters/constitution.html). Under this system, the regulation of individual health care disciplines became a state based entity. While arguably an opportunity to allow states to address health care concerns which may be unique to them, one result has been fragmentation of policy, practice requirements, and scope of practice between states within each discipline. Over time these inconsistencies have served as roadblocks for nurses, impeding nursing care delivery and professional mobility.

Since the advent of the Advanced Practice Registered Nurse (APRN) in the 1960’s (Silver, Ford, & Stearly, 1967), there have been challenges regarding the perceived competition between APRNs and medicine and many efforts to control APRN scope of practice. This was typically accomplished by enactment or control of state based laws and rules proscribing practice requirements and scope, despite an abundance of literature demonstrating the safety and quality of care delivered by APRNs (Kleinpell, 2005). In order to allow APRNs to function to the fullest extent of their education and training, the National Council of State Boards of Nursing (NCSBN) convened a work group in the early 2000s to create a model upon which legislative standardization could be based. Represented by a variety of APRN related organizations, such as the American Association of Colleges of Nursing, APRN national certification boards and the Department of Health and Human Services, this group met over the course of several years in a explicitly articulated consensus building process to create a set of national recommendations.

The Advanced Practice Registered Nurse Consensus Model (hereafter referred to as the “Model”) was published in 2008 to provide guidelines for a national uniform model of APRN practice. Published as the final report of the APRN Nurses Consensus Work Group and the National Council of State Boards of Nursing APRN Advisory Committee, the Model was originally distributed to the participating organizations (p. 40), then made publicly available (Group, 2008). The document “defines
APRN practice, describes the APRN regulatory model, identifies the titles to be used, defines specialty, describes the emergence of new roles and population foci, and presents strategies for implementation” (p. 5).

This paper undertakes a review of the Model, particularly the LACE components: Licensure, Accreditation, Certification and Education. Current compliance in Ohio with the Model is assessed and next steps needed to bring Ohio into full compliance are identified. Included are barriers, practical steps to be taken by APNs, and recommended research to assess the impact of Model implementation. The subsequent publication of the Institute of Medicine’s report “The Future of Nursing” provides continued support to the concept of allowing nurses to practice to the fullest extent of their education and training nationally (Thompson, 2011).

While often referred to as the LACE Model, this is inaccurate. LACE is an acronym which refers to some of the essential elements within the Model:

- Licensure – granting of authority to practice, by state for most health care providers, including APRNs
- Accreditation – formal review and approval by a recognized agency of an educational or certification program
- Certification – formal recognition of a specific knowledge and skill set according to professionally defined standards
- Education – formal preparation at the graduate or post-graduate level for APRNs

The Model applies to all elements of LACE, but is a more broadly encompassing regulatory document and NCSBN emphasizes this difference (https://www.ncsbn.org/index.htm).

Key Recommendations of the Model

**Definition and titles.** APRNs are experienced RNs who have completed additional education, training, demonstrated an advanced skillset and are licensed to practice in this additional capacity. APRN is to be a legally protected licensing title and are licensed independent (italics added by this author) practitioners. There are four role delineations under the APRN umbrella: Certified Registered Nurse Anesthetist (CRNA), Certified Nurse-Midwife (CNM), Clinical Nurse Specialist (CNS), and Certified Nurse Practitioner (CNP). The APRN must identify themselves by both the APRN title and role. In addition, each APRN is educated to care for a specific population, such as adult, pediatric, geriatrics, etc. Lastly, training may occur with specialization, such as primary versus acute care pediatric nurse practitioner. Education, certification and licensure of an individual must be congruent with their role and population focus.

**Education.** APRN education must be at the graduate or post graduate (master’s or doctoral) level at an accredited institution. All programs, regardless of role or population focus must have a broad foundation which includes 3 separate core courses in advanced pathophysiology, advanced health assessment and advanced pharmacology. The education must prepare the graduate to carry out the core competencies within the chosen role and population. Specialty preparation in the APRN education may be part of the curriculum, but only if it builds onto the previously established role and population. All educational programs should complete an applicable accreditation process before (italics by this author) admitting students.

**APRN Specialties and Emerging Roles.** Specialty areas of practice may be engaged by the APRN within their base role and population e.g., a CRNA specializing in pain management (p.12). Professional certification in a specialty area is highly encouraged to validate knowledge and competence in such care. The Model emphasizes that any specialty builds upon the core knowledge, role and
population base of the practicing APRN, but is not a route to obtain APRN licensure in isolation. The Model acknowledges the likely emergence of new roles and/or population foci and describes criteria to recognize a new role or population and the accompanying licensure requirements, focusing on the LACE components: a unique, accredited educational program with a specific (new) role and/or population, matching national certification by examination and state licensure specific to the new role or population. Also notable is the recommendation that new professional certification programs should themselves be nationally accredited by the American Board of Nursing Specialties or the National Commission for Certifying Agencies.

**Implementation strategies and timeline.** The Model also provides strategies for implementation of licensure, education (including accreditation), and certification. The original document proposed a timeline for full implementation of the regulatory model of 2015. This original deadline will clearly not be met as fewer than 20 states are fully compliant with the Model at the time of this writing. Challenges to meeting this deadline include state based resistance to some model components, particularly independent practice, typically opposed by the medical board. In addition, there has been an inadequate supply of doctoral APRN programs to meet the doctoral preparation requirement, but these numbers are increasing as well. While no formal statement has been issued upon a search by this author, informally 2020 has been considered the next target deadline for compliance. Of note, the model recommends that states “institute a grandfathering clause that will exempt those APRNs already practicing in the state from new eligibility requirements.” (p. 15). In addition, recommendations around the grandfathering provision for APRNs applying for endorsement in another state are also explicated.

**Ohio APRN Model Compliance**

**Licensure**

The Ohio Legislature and the Board of Nursing (OBN) has taken steps toward compliance in many aspects of the Model (See “Comparison of the APRN Consensus Model and the Ohio Nurse Practice Act and Administrative Rules”, (dated January 2012) which can be found at [http://www.nursing.ohio.gov/PDFS/AdvPractice/OH_APRN_Comparison.pdf](http://www.nursing.ohio.gov/PDFS/AdvPractice/OH_APRN_Comparison.pdf)). The most glaring deficiency is Ohio does not license APRNs as independent practitioners — CNPs, CNSs and CNMs required a collaborative agreement with a physician and CRNAs are supervised by anesthesiologists. Similarly, prescriptive privileges are authorized for CNMs, CNPs and CNSs under the collaborative arrangement and are restricted by a specific formulary. This formulary was recently expanded (House Bill 83, June 2012) in regards to Schedule II medications but only as site legislation and there remain significant restrictions. CRNAs do not have independent prescriptive privileges, rather administer medications under the license of the supervising physician, limited to anesthesia and practice associated drugs.

House Bill 303, passed in December 2012 provides APRN title coverage, a revision from the previous APN, in addition to the current CRNA, CNM, CNS and CNP title protections. While Ohio Revised Code (ORC) 4723.15 outlines grandfathering clause guidelines for RNs and LPNs, there are not explicit grandfathering guidelines for APRNs in a search by this author. ORC 4723.41 outlines some grandfathering rules for practicing nurse-midwifery, but nothing broadly addressing APRN licensure. There are guidelines for reciprocity listed for an APRN to obtain prescriptive authority if already a prescriber in another state.

**Accreditation**
Currently, all APRNs must graduate from an accredited graduate/post-graduate program or certification if a graduate degree has already been obtained. The board requires annual documentation of appropriate accreditation by educational and certifying bodies.

**Certification**
Ohio requires national certification for licensure as an APRN. Ohio recognizes the following population foci for certification and licensure, in addition to the specified role: family, adult/gerontology (acute and primary), pediatric (acute and primary), neonatal, women’s health, and psychiatric/mental health. The OBN requires documentation of accreditation from each certifying organization annually and publishes a list of approved bodies accordingly. The certifying organizations in turn require satisfactory completion of education programs accredited by the certifying body for eligibility to sit for the examination.

**Education**
Graduate or post-graduate education by an accredited university which is specific to the role and population for which the APRN seeks licensure is required. As noted in the Ohio Revised Code, there are not explicit grandfather clauses currently identified, but the OBN did maintain the license of those whose original training may have been a certificate or non-master’s without a requirement to complete same when the rules changed to require graduate education for new APRN licensees.

**Recent Model Related Publications**
The Model has been formally signed and endorsed by > 48 organizations on the document itself, found at [https://www.ncsbn.org/4213.htm](https://www.ncsbn.org/4213.htm). A literature search for publications looking for “APRN Consensus Model” in the title since January 2011 yielded 23 results. Many were editorial and state specific, including Alaska and South Carolina, among others, describing their states current efforts to legislate compliance with the Model (Madler, Kalanek, & Rising, 2012; Phillips, 2012; Riddle, 2011). In addition, national organizations such as the American Association of Critical-Care Nurses also support the efforts of the Model to address inconsistencies in APRN roles. As Phillips (2013) and others have noted, there remains much work to be done, highlighted by the fact that in only 17 states (including the District of Columbia) are APRNs both regulated solely by a Board of Nursing and have independent scope of practice and prescriptive authority without physician oversight in some form.

Another key document, the Institute of Medicine’s “The Future of Nursing” (2010) highlights the need to enable nurses at all levels, including APRNs to practice to the fullest extent of their training and education (Thompson, 2011). The Affordable Care Act (ACA), passed in 2010, emphasizes the need for adequate primary care providers, and speaks to the utilization of APRNs to meet health care delivery gaps (http://www.kff.org/healthreform/upload/8061.pdf). Other authors have chimed in, noting that compliance with the Model supports the goals to expand health care services with high quality, efficient providers, while lack of uniformity limits APRNs ability to migrate to areas of highest need (Chornick, 2010; Stanley, 2012). Given the shortage of APRNs for certain specialty populations relative to those certified in their specialty, some recommendations exist to provide appropriate training and guidelines until the supply and demand are more balanced (Bolick et al., 2013; Sorce, Simone, & Madden, 2010).

**Next Steps Legislative/Rule Changes Needed**
Ohio recently took a forward step with APRN title protection in the December 2012 legislation, but much work remains before compliance with the Model. Logical steps toward independent practice and prescriptive privileges for all APRN roles include: 1) expansion of prescriptive authority without
limits specific to the APRNs role, population and specialty training; 2) full delegation privileges to non-licensed personnel, such as medical assistants; 3) hospital admitting privileges; 4) full scope of ordering and prescribing in and out of the hospital, including durable medical equipment, home nursing, and other outpatient therapies; and 5) the ability to wholly own private practices. Incremental successes will lead to ultimately achieving independent licensure and practice. Such patience and perseverance has been successful in other states (Madler et al., 2012).

Opposition, always a part of the democratic legislative process, is inevitable. Key opposition groups include the Ohio Medical Association (OMA), with concerns regarding infringement upon medical practice. Concerns voiced by OMA and the Ohio Pharmacy Board re: safety issues around prescribing have not held true locally or in the national literature on APRN practice, even in the highest acuity environments (Brown, Besunder, & Bachmann, 2008; Kline, Reider, Rodriguez, & Van Roeyen, 2007). The key is to engage and educate not only other health care disciplines but legislators, the majority of whom are not health care providers and need significant education regarding the evidence and abilities of the APRN as a safe independent healthcare provider.

What APRNs (YOU) can do. Each APRN has a role and responsibility to see steps toward Model compliance become a reality. KNOW the Model. JOIN and become a member in key state and national organizations which advocate for Model compliance law and rule changes. KNOW what bills are pending in the state legislature that may need your support, or your opposition. KNOW what rule changes are being discussed at the BON. KNOW your state and national legislators and contact them to request support or opposition to pending bills as appropriate. ENGAGE your physician and nursing colleagues in the conversation make them aware of why such changes are needed. KNOW and ENGAGE key stakeholders who may be opposed to the model (medical associations, pharmacy associations, etc) and embrace opportunities to educate and advocate for the APRN. KNOW the recent literature outlining safe and efficient care delivered by APRNs (Kleinpell, 2005; Kline et al., 2007). ENGAGE your institutional leaders regarding the benefits of expanding the APRN scope of practice.

There is a wealth of information and recommendations for legislative implementation toward the APRN Model at the National Council of Boards of Nursing website (https://www.ncsbn.org/4214.htm). In addition, this site holds a Model “Frequently Asked Questions” (FAQ) document which is useful to prepare the APRN to answer questions or share with others as an educational tool.

Research Recommendations to Assess Model Implementation

As with any major policy change, outcomes must be monitored. As Ohio moves forward incrementally toward Model compliance, research regarding patient level outcomes will be needed. These could include significant prescribing errors, discharge outcomes (length of stay, readmission rates), compliance with best practice guidelines (vaccine schedule adherence). In addition, cost (hospital charges, cost of prescribed therapies against outcomes) and efficiency outcomes (patients seen per day) should be monitored. Just arising is a wealth of investigational opportunities as compliance with and outcomes emanating from the ACA are evaluated. In order for APRNs in Ohio to be best positioned to move toward independent practice, each of us must be educated, aware and actively involved.

The APRN Consensus Model provides an important framework and regulatory model under which to direct next steps at the individual state level. Compliance with the Model’s recommendations in Ohio will provide APRNs with opportunity to provide care to the citizens of the state to our maximum capabilities, unfettered by supervision or formulary restriction issues. The biggest challenge to such a care model is likely one of conciliation and education, to engage other stakeholders to view the APRN contribution as effective, efficient and non-competitive.
References


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Student Rep: Open
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The NEXT NEWSLETTER WILL BE OUT IN SEPTEMBER 2013.

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