

# FANNP NEWS



INSIDE: NEONATAL ENCEPHALOPATHY • K2 OR SPICE: DEFINING AND TESTING IMPLICATIONS • LEGISLATIVE UPDATE • EDUCATIONAL OFFERINGS • CONFERENCE PHOTOS AND UPDATE • BRING IT ON • LETTER FROM THE PRESIDENT • POCKET NOTEBOOK • BRAG BOARD AND MORE...

The Publication of the Florida Association of Neonatal Nurse Practitioners



## CALL FOR NOMINATIONS

### FANNP Wants You!

This is an election year and positions are open for the FANNP Board of Directors (BOD)! The term of office is January 1, 2021 through December 31, 2022. All positions are a two-year commitment except for President-Elect. Responsibilities include attendance at BOD meetings, participation at the sponsored FANNP Symposium, and participation on established committees.

#### Available positions:

**President-Elect\***: Acts as President in their absence as designated, Chairs the Bylaws Committee, progresses to presidency upon completion of one-year term, and continues as Past-President following completion of two-year presidency term (four-year commitment).

**Secretary\***: Records minutes of all meetings, gives notice

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## POSTER PRESENTATION

# Therapeutic Hypothermia and Laboratory Monitoring with Neonatal Encephalopathy: Pearls for Bedside Clinicians

Sarah Hargett, BSN, RNC-NIC

Megan Di Salvo, BSN, RN

### Abstract

**Purpose:** Neonatal encephalopathy (NE) is defined as a condition of impaired neurological function often caused by a peripartum event that impairs gas exchange resulting in hypoxia, hypercapnia, reduced cerebral blood flow, and metabolic acidosis. NE is a significant cause of neonatal morbidity and mortality estimated to effect 1-8 infants per 1,000 live births within the United States and 26 infants per 1,000 live births in developing countries. The purpose for this poster is to review physiologic effects of therapeutic hypothermia (TH) and correlate these known effects with interval laboratory

monitoring practices.

**Methods:** A comprehensive literature review was conducted using PubMed, CINAHL, and Google Scholar databases. Publications from 2013 to 2019 were included for review.

**Results:** TH has significant physiologic effects on all body systems. Common findings include reduced cardiac output, vasoconstriction resulting in fluid shifts, decreased carbon dioxide production, and altered platelet function. The neuroprotective effect of TH is targeted at decreasing the effects of the secondary phase of brain injury by

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Sarah and Megan Presenting their findings at the 30th Annual FANNP Conference.

# Letter from the President

As I begin my tenure as President of FANNP, I am completely humbled and equally excited to start this journey. I first attended the FANNP conference in 2005 when I was preparing for my NCC exam. My professor wisely recommended I go for the review and she was right. Had it not been for the conference, I may not have passed and wouldn't be here today. However, not only did I get what I needed from the review, I found a new home. I met some amazing people that first year who have helped mold me into the Practitioner and person I am now. The life-long friendships I made at that first conference literally led me to this position. I was called to get more involved in the organization in 2016 when I was co-editor of the Newsletter with my best friend, Christa Smith. After that, the FANNP Board of Directors realized the need for a larger social media presence so I took the lead and became the Social Media Chair in 2017. My good friend, Past President Dr. Terri Marin, then nominated me for President in 2018 and here I am, President of FANNP. All of this is to say, I am so grateful for this opportunity and for what FANNP has done for me both professionally and personally over



the last 15 years and I encourage you to push your comfort boundaries and find a place as a leader of this extraordinary organization.

The mission of FANNP is to “support and promote advanced neonatal nursing practice”. This is done not just at the annual Neonatal Nurse Practitioner Symposium, but also throughout the year. Our quarterly newsletter is sent to active members and contains vital information on current neonatal practices, continuing education opportunities, scholarship opportunities, evolving legislature and even review questions to keep you on your toes. The Board of Directors meet several times per year with the vision of progressing the organization with the times while also maintaining the traditions that make it a constant for the last 31 years in the neonatal community. All of our Board and committee chairs are volunteers. We do not do this for praise or reward, we are involved in FANNP because we love what we do and we love what FANNP represents. It's a community of support and encouragement to be the best Neonatal Nurse Practitioners we can be, and I would not trade it for the world.

If you are a student, or a “seasoned”

practitioner looking to advance your education, FANNP offers scholarships to assist with the financial burden. We also have the honor of helping advance neonatology by offering research grants. The money is available; you only need to ask for it. Research is such an important part of our profession, so anyone interested in grant money, please visit our website, [www.FANNP.org](http://www.FANNP.org) to apply.

Our next Annual Symposium is October 13-17, 2020. As always, it is at the beautiful Sheraton Sand Key Resort in Clearwater Beach, Florida. This is our 31st anniversary and the conference will not disappoint. Whether you are a student looking to have a great review before your NCC boards, or a current NNP who likes to keep up with the latest hot topics, you are sure to find what you are looking for.

Inspired to get involved? Call for nominations for President-Elect, Secretary, Treasurer, and our Members at Large for 2021 is here! Job descriptions for each position can be found on the website under the section titled “Info for Members”. Please send your nominations to [nominations@fannp.org](mailto:nominations@fannp.org) by July 15. Ballots will be emailed to active members and voting will close the Tuesday of the next conference. Please see the “Call for Nominations” portion of this newsletter for more details.

Finally, I would like to thank Past President, Tiffany Gwartney, for her excellent leadership over the past 2 years. Her organizational skills and vision motivate me and she will be a hard act to follow. Thank you, Tiffany, for your guidance and patience over the last year preparing me for this position. I look forward to serving as your President. Please do not hesitate to call on me for questions, advice or just an ear to listen. Thank you.

*Gayla Kaye-Steed, NNP-BC  
President, FANNP*

## THE FLORIDA ASSOCIATION OF NEONATAL NURSE PRACTITIONERS

### BOARD OF DIRECTORS

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**FANNP**

## BOARD from page 1

of all meetings, keeps bylaws and membership records, sends email blasts and Chairs the Communication Committee.

**Treasurer\***: Has charge and full knowledge of all Association funds, renders statement of financial condition of the Association for all meetings, and Chairs the Finance Committee.

**Member-At-Large\* (4)**: Serves on committees as assigned.

*\*Please see website for a complete description of position.*

To be eligible to run for a position, one must be a current member who has served on the BOD or an FANNP committee. To be eligible to run for a position as a Member-At-Large, one must be a current member with an interest in continuing the mission of FANNP. Student members and associate are ineligible to run for office.

Please consider running for a position! We need your assistance to continue the important work of the FANNP!

**Nominations are due by July 15, 2020.** Send them to [nominations@fannp.org](mailto:nominations@fannp.org). Ballots will be emailed to active members for voting by October 1, 2020. The voting window will be announced in the Fall edition of the FANNP newsletter. The voting window will close on Tuesday of the conference. The newly elected candidates will be announced at the FANNP Symposium Annual Member Brunch.

*Thank you,*

*Tiffany Gwartney, DNP, APRN, NNP-BC  
Past-President, Nominations Committee  
Chair*



## FANNP Increasing Scholarship Awards

FANNP as an organization is committed to education and is proud to be able to award scholarships to nurses and NNPs continuing their educational pursuits in the field of neonatal health care.

Scholarships are awarded annually at the FANNP Symposium in October. The scholarship recipients give back and provide a short article, case study, practice pointer, evidenced-based practice update or literature review which is published in the FANNP Membership Newsletter.

For 2020, the FANNP Board of Directors is excited to announce the scholarship award amounts have been increased and will range from \$1000 to \$2000. Award amounts are based upon the application criteria and quality of



newsletter submission.

Scholarship monies can be used for tuition, books or any expenses incurred while in school.

All FANNP members pursuing a degree in neonatal health care are encouraged to apply for a scholarship. Or, do you know an NNP student? Encourage them to become a FANNP member and apply for a scholarship.

To obtain an application or for questions, please contact FANNP via email at: [scholarships@fannp.org](mailto:scholarships@fannp.org).

### Scholarship Application 2020 Eligibility Guidelines

1. Applicants must be FANNP members.
  - a. All voting members, student members and associate members are eligible.
  - b. Priority for scholarship awards is given to voting members, followed by student members and then associate members.
  - c. Priority for scholarship awards is based on length of membership and service to FANNP.
2. Applicants must be a licensed RN, ARNP, NNP or equivalent.
  - a. Preference will be given to currently licensed NNPs working towards an advanced NNP degree.
3. Applicants must attend an educational program leading to a degree related to the health care field during the application period.
  - a. The application period for the 2020 scholarship is September 15, 2019 to September 15, 2020 (i.e. to be eligible for a 2020 scholarship you must have attended classes sometime between September 15, 2019 and September 15, 2020).
  - b. An applicant may receive a maximum of two scholarship awards for each degree sought.
4. Applicants will provide a short article, case study, practice pointer, evidenced-based practice update or literature review to be published in the FANNP Newsletter.

To obtain a scholarship application contact FANNP via email [scholarships@fannp.org](mailto:scholarships@fannp.org)

COMPLETED applications must be postmarked by Sept. 15 each year.

# ENCEPHALOPATHY from page 1

reducing metabolic demand, ATP requirements, and aggregation of excitatory neurotransmitters decreasing the threshold for seizure activity. Due to the extent of physiologic effects of TH, close laboratory monitoring and maintenance of normal ranges is imperative to optimize long-term outcomes. The recent advancements in treatment options for NE have significantly improved mortality and severe neurodevelopmental impairments at 18 months of life for infants diagnosed with NE.

**Limitations:** There is a paucity of literature discussing the relationship between physiologic and biochemical effects during TH, which often leaves bedside clinicians devoid of a comprehensive understanding of medical management of NE. This information is germane to neonatal nurses, and can improve teamwork, communication, and timely lab draws. Further research is needed to completely understand the physiologic effect of NE on the term and preterm infant.

**Implications for Practice:** Whole body cooling for infants greater than 36 weeks' gestation is the hallmark neuroprotective treatment for moderate or severe NE cases. The prevention of molecular cascades and secondary energy failure leading to apoptosis, inhibition of inflammatory markers and reduction of metabolic demand and free radicals, are the primary goals of TH treatment. Knowledge is crucial from clinicians regarding the timing of laboratory panel testing in relation to the physiology effects on each body system.

## References

- Alake, O., Hardman, S., & Chakkarapani, E. (2018). Managing hypoxic ischaemic encephalopathy in term newborn infant. *Paediatrics & Child Health*, 28(9), 399-404. doi:10.1016/j.paed.2018.07.002
- Bell, S. G. (2016). Hypoxic-ischemic encephalopathy and serum magnesium monitoring and maintenance. *Neonatal Network*, 35(3), 159-163. doi:10.1891/0730-0832.35.3.159
- Costa, K. (2018). Hematology. In H. K. Hughes & L. K. Kahl (Eds.), *The Harriet Lane handbook: A manual for pediatric house officers* (21st ed., pp. 364-394). Philadelphia, PA: Elsevier.



### Therapeutic Hypothermia and Laboratory Monitoring: Pearls for Clinicians

Sarah Hargett, BSN, RNC-NIC & Megan Di Salvo, BSN, RN

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**PURPOSE**

- Review the relationship between the physiologic effects of therapeutic hypothermia (TH) and laboratory monitoring strategies as a means to assist clinicians caring for infants diagnosed with neonatal encephalopathy (NE)

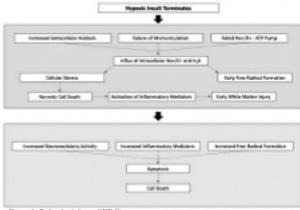


Figure 1. Pathophysiology of NE.<sup>19</sup>

**LABORATORY MONITORING**

LAB TEST	MONITORING INTERVAL
Blood Culture	<ul style="list-style-type: none"> <li>On admission<sup>1,2</sup></li> <li>Prior to antibiotic administration<sup>1,3</sup></li> </ul>
Blood Gas	<ul style="list-style-type: none"> <li>On admission<sup>1,3</sup></li> <li>Repeat q4hr for 12hrs<sup>4</sup></li> <li>Repeat q12hr when 13-24hrs old<sup>5</sup></li> <li>Repeat q24hr when 25-72hrs old<sup>6</sup></li> <li>Additional testing PRN<sup>1,2</sup></li> </ul>
Blood Glucose	<ul style="list-style-type: none"> <li>On admission<sup>1,2</sup></li> <li>Repeat q24hr and PRN<sup>1,2</sup></li> </ul>
CBC	<ul style="list-style-type: none"> <li>On admission<sup>1,2</sup></li> <li>Repeat platelet count q24hr<sup>6</sup></li> <li>Repeat full CBC PRN<sup>6</sup></li> </ul>
Coagulation Panel	<ul style="list-style-type: none"> <li>On admission<sup>1,3</sup></li> <li>Repeat q24hr and PRN<sup>3,14</sup></li> </ul>
LFT	<ul style="list-style-type: none"> <li>On admission<sup>1,3</sup></li> <li>Repeat q24hr<sup>3,14</sup></li> </ul>
Magnesium	<ul style="list-style-type: none"> <li>On admission<sup>1,7</sup></li> <li>Repeat q24hr<sup>17</sup></li> </ul>
RFP	<ul style="list-style-type: none"> <li>On admission<sup>1,2</sup></li> <li>Repeat q24hr<sup>3,14</sup></li> </ul>

**BACKGROUND**

- NE is defined as a cerebral injury with impaired neurological function often caused by a peripartum event that impairs gas exchange<sup>1,2</sup>
- Hallmark findings: hypoxemia, hypercapnia, cerebral ischemia and metabolic acidosis<sup>1,4</sup>
- Estimated to affect 1-8 per 1,000 live births in the U.S. and 26 per 1,000 live births in developing countries<sup>5</sup>
- Common risk factors: placental abruption, cord prolapse, uterine rupture and placenta previa<sup>1,3,7</sup>
- Diagnosis is based on a thorough history, low Apgar scores, laboratory findings and a neurologic exam<sup>1,5,9</sup>
- Classified by Sarat scoring system<sup>3,5</sup>
- EEG and MRI assist with outcome prognosis<sup>11,15,17</sup>
- Long-term morbidities: intellectual disability, cerebral palsy, hearing and vision deficits, and epilepsy<sup>1,2</sup>

**TREATMENT**

- TH is the gold standard of care for stage II and III NE<sup>1,11</sup>
- Therapeutic window for initiation is within six hours of life<sup>1,2</sup>
- Goal is to reduce the effects of the secondary phase of brain injury<sup>1,2,4,11,12</sup>
- Close laboratory monitoring is essential due to profound systemic effects<sup>7,9,18</sup>

SYSTEM	PHYSIOLOGIC EFFECTS
Neurologic	<ul style="list-style-type: none"> <li>Metabolic demand and ATP requirement<sup>1,8,12,14</sup></li> <li>Glutamate levels<sup>15</sup></li> <li>Neuronal cell death<sup>2,8,7,12</sup></li> </ul>
Respiratory	<ul style="list-style-type: none"> <li>Carbon dioxide production<sup>2,5,8,14</sup></li> <li>Chest wall compliance<sup>2,4,16</sup></li> <li>PVR<sup>5,7</sup></li> </ul>
Cardiovascular	<ul style="list-style-type: none"> <li>Sinus bradycardia with prolonged QT interval<sup>2,8,8,13</sup></li> <li>Cardiac output<sup>14</sup></li> <li>SVR<sup>16</sup></li> </ul>
Gastrointestinal	<ul style="list-style-type: none"> <li>Perfusion and motility<sup>8</sup></li> </ul>
Hematology	<ul style="list-style-type: none"> <li>Platelet number and function<sup>4</sup></li> <li>Inhibits clotting factors<sup>8,11,18</sup></li> <li>Prolongs PT and aPTT increasing DIC risk<sup>8,11,18</sup></li> </ul>
Renal	<ul style="list-style-type: none"> <li>Insoluble water losses<sup>8</sup></li> <li>Risk for fluid retention and volume overload<sup>8</sup></li> </ul>
Immune	<ul style="list-style-type: none"> <li>Delays release of pro-inflammatory cytokines<sup>8,13,28</sup></li> <li>Neutrophil count and function<sup>9,29</sup></li> <li>Leukocyte count and function<sup>8,29</sup></li> </ul>
Endocrine	<ul style="list-style-type: none"> <li>Release and responsiveness of insulin<sup>1,8</sup></li> <li>Glycogenolysis and gluconeogenesis<sup>1,8</sup></li> <li>Improves calcium homeostasis<sup>4,12</sup></li> <li>Hypoglycemia risk<sup>13</sup></li> </ul>
Integumentary	<ul style="list-style-type: none"> <li>Perfusion to the skin<sup>21</sup></li> <li>Risk for SCFN and HAP<sup>15,17,11,34,28,22</sup></li> </ul>

**CONCLUSION**

- Cord prolapse, uterine rupture and placental abruptions can result in cerebral ischemia and impaired neurologic function<sup>1,2</sup>
- TH offers neuroprotective benefits for NE<sup>1,8,11</sup>
- Clinician knowledge regarding physiologic effects and their relationship to laboratory monitoring enhances long-term outcomes

Croteau, S. E. (2017). Bleeding. In E. C. Eichenwald, A. R. Hansen, C. R. Martin, & A. R. Stark (Eds.), *Cloherly and Stark's manual of neonatal care* (8th ed., pp. 586-594). Philadelphia, PA: Wolters Kluwer.

Douglas-Escobar, M., & Weiss, M. D. (2015). Hypoxic-ischemic encephalopathy: A review for the clinician. *JAMA Pediatrics*, 169(4), 397-403. doi:10.1001/jamapediatrics.2014.3269

Doherty, E. G. (2017). Fluid and electrolyte management. In E. C. Eichenwald, A. R. Hansen, C. R. Martin, & A. R. Stark (Eds.), *Cloherly and Stark's manual of neonatal care* (8th ed., pp. 296-311). Philadelphia, PA: Wolters Kluwer.

Fraser, D. (2013). Blood gas analysis. In D. Fraser (Ed.), *Acute respiratory care of the neonate* (3rd ed., pp. 123-135). Petaluma, CA: NICU Ink Book Publishers.

Hansen, A. R., & Soul, J. S. (2017). Perinatal asphyxia and hypoxic-ischemic encephalopathy. In E. C. Eichenwald, A. R. Hansen, C. R. Martin, & A. R. Stark (Eds.), *Cloherly and Stark's manual of neonatal care* (8th ed., pp. 790-811). Philadelphia, PA: Wolters Kluwer.

Harriman, T., Bradshaw, W. T., & Blake, S. M. (2017). The use of whole-body cooling in the treatment of hypoxic-ischemic encephalopathy. *Neonatal Network*, 36(5), 273-279. doi:10.1891/0730-0832.36.5.273

Hughes, H. K., & Kahl, L. K. (2018). Blood chemistries and body fluids. In H. K. Hughes & L. K. Kahl (Eds.), *The Harriet Lane handbook: A manual for pediatric house officers* (21st ed., pp. 708-720). Philadelphia, PA: Elsevier.

Inder, T. E., & Volpe, J. J. (2018). Hypoxic-ischemic injury in the term infant: Clinical-neurologic features, diagnosis, imaging, prognosis, therapy. In J. J. Volpe, T. E. Inder, B. T. Darras, L. S. de Vries, A. J. du Plessis, J. J.

Neil, & J. M. Perlman (Eds.), *Volpe's neurology of the newborn* (6th ed., pp. 510-563). Philadelphia, PA: Elsevier.

Jacobs, S. E., Berg, M., Hunt, R., Tarnow-Mordi, W. O., Inder, T. E., Davis, P. G. (2013). Cooling for newborns with hypoxic ischaemic encephalopathy. *Cochrane Database of Systematic Reviews*, 2013(3), CD003311.

Prempunpong, C., Efanov, I., & Sant'Anna, G. (2015). Serum calcium concentrations and incidence of hypocalcemia in infants with moderate or severe hypoxic-ischemic encephalopathy: Effect of therapeutic hypothermia. *Early Human Development*, 91(9), 535-540. doi:10.1016/j.earlhumdev.2015.06.008

Schump, E. A. (2018). Neonatal encephalopathy: Current management and future trends. *Critical Care Nursing Clinics of North America*, 30(4), 509-521. doi:10.1016/j.cnc.2018.07.007

Wisnowski, J. L., Wu, T., Reitman, A. J., McLean, C., Friedlich, P., Vanderbilt, D., . . . Blüml, S. (2016). The effects of therapeutic hypothermia on cerebral metabolism in neonates with hypoxic-ischemic encephalopathy: An in vivo 1H-MR spectroscopy study. *Journal of Cerebral Blood Flow & Metabolism*, 36(6), 1075-1086. doi:10.1177/0271678X15607881

Wood, T., & Thoresen, M. (2015). Physiological responses to hypothermia. *Seminars in Fetal & Neonatal Medicine*, 20(2), 87-96. doi:10.1016/j.siny.2014.10.005

*\*Abstracts for poster and podium presentations are submitted to the FANNP Planning Committee by FANNP members seeking to share their expertise on a topic pertinent to neonatology. This abstract was submitted to FANNP for use with the author's permission.*

# Food for Thought



## K2 or Spice: Defining and Testing Implications

*Submitted by Jill Lionberger, RNC, MSN, NNP-BC*

K2, once a legal substance sold in novelty shops and convenience stores, is now illegal. Although illegal, people continue to either smoke it or use it in a vaporized form for use in e-cigarettes. K2 or Spice is often mistakenly referred to as “synthetic marijuana”. It is a class of psychoactive substances (NPS) that are sprayed onto “dried plant material”, hence the reason for the mistaken label. According to the National Institute on Drug Abuse (NIDA), K2 and other synthetic cannabinoids are man-made, mind-altering chemicals that alter a person’s mental state and may affect the brain much more powerfully than marijuana (2018).

Some of these psychoactive substances are new but some have been around for years and have been brought back into the market. Testing for these designer drugs is difficult because they are ever changing, used in many combinations, and hard to detect. K2 does NOT show up on routine drug tests. Most hospitals’ toxicology departments are not set up for testing for all the possible chemicals in their various forms, so they must send samples to an outside lab. One such lab is the National Medical Services (NMS) lab in Pennsylvania. It is a regional lab where some immunoassays and point of care tests have been developed to detect synthetic cannabinoids. Although some assays have been developed, the ever-changing chemical compositions make testing uncertain.

Knowing the difficulties and limitations in screening for K2 can help providers make important decisions in determining how to proceed in the care of our vulnerable patients. As advanced nurse practitioners, we are an important resource for obstetricians, pediatricians, and family practice providers when they enquire about appropriate testing for their patients. Other things we can do include obtaining social work consult, ordering the necessary testing, observation and documentation of how the family cares for and interacts with their infant, and listening to other team members about their insights and concerns; these are all important components for a better outcome.

### *References:*

- Mayo Clinic Proceedings. Clinical interpretation of urine Drug Tests: What Clinicians Need to Know About Urine Drug Screens (May 2017). Retrieved from <http://dx.doi.org/10.1016/j.mayocp.2016.12.007>
- National Institute on Drug Abuse. Synthetic Cannabinoids (K2/Spice). (2018). Retrieved from <https://www.drugabuse.gov/publications/drugfacts/synthetic-cannabinoids-k2spice>

*\*\*Food for Thought is a quarterly addition to the FANNP Newsletter, where we discuss trending topics of importance in the Neonatal Intensive Care setting. We would love to hear what you and your colleagues are discussing currently in your work place, and greatly value your input. Please feel free to send any “trending topics” that you would like to hear more about to [newsletter@fannp.org](mailto:newsletter@fannp.org). In the ever-changing world of neonatology, remaining cognizant of current practices is of vital importance to furthering our education as providers!*



*Submitted by Ally Kayton, MSN, APRN, NNP-BC*

## Florida Legislative News

Stan Whittaker, Family Nurse Practitioner and the current Chair of Legislative Committee within the Florida Association of Nurse Practitioners (FLANP) as well as the President of the Florida Panhandle Nurse Practitioner Coalition has been the APRN Ambassador at the Capitol every week since session began. He has been rounding weekly and distributing education regarding House Bill 607 to students and other APRNs present. He is ensuring that every Senator and House Member knows precisely what this bill means to nurses and to Floridians. It is expected that HB 607 by Cary Pigman (Full Practice Authority for APRNs) will be moving soon and we will need to show our support every week until victory is ours.

The Floridians Unite for Health Care coalition, which includes Florida Association of Nurse Anesthetists, Florida Association of Nurse Practitioners, and Florida Coalition of Advanced Nurse Practitioners needs help in spreading their message regarding scope of practice expansion for NPs on social media. Facebook and Twitter are great ways to spread this message quickly. Their twitter handle is @Fla4HC.

More information may also be found at [www.floridiansuniteforhealthcare.com](http://www.floridiansuniteforhealthcare.com)

From the Florida Politics website, House Speaker José Oliva stated, “I am proud to support legislation this year to grant APRNs independent practice across our state to improve access to quality care

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for all, and allow these professionals to work to the full extent of their training and education”.

“On behalf of the Floridians Unite for Health Care coalition, we thank House Speaker Oliva for bringing attention to this very important health care issue this session,” said Nicole Livanos, senior associate in state advocacy and legislative affairs for National Council of State Boards of Nursing (NCSBN) and a spokesperson for the Floridians Unite for Health Care coalition.

From the Florida Association of Nurse Practitioners website...

Nurse Practitioners: Part of the Solution to the Primary Care Physician Shortage

- Florida has a primary care physician shortage. Less than half of Florida physicians accept Medicaid and half of Florida physicians will reach retirement age over the next ten years.
- 3 million (estimated) Floridians have now gained insurance coverage under the Patient Protection and Affordable Care Act.
- 1 million Floridians who are in the coverage gap and are potentially eligible for insurance also need

primary care.

- People who do not have primary care access go to emergency rooms for care, driving up tax-payer costs.

Florida needs a cost effective, free market, creative solution to meet these needs.

- Removal of restrictive NP licensure laws has been demonstrated in other states to increase primary care access and reduce costs.
- Less restrictive licensing has shown an added benefit of attracting more NPs into a state, thus improving economic activity.
- Almost half the states have stopped the practice of restricting NP licensure.

Research by the Institutes of Medicine and hundreds of other reputable studies have shown that Nurse Practitioners who practice without restrictive licenses deliver safe, cost effective, high quality care, with equivalent outcomes to physicians.

Florida has an opportunity to embrace an economically viable, free market solution to the primary care access problem, while at the same time improving the economic activity of the state.

Allowing autonomous practice for APRNs is projected to:

- Virtually eliminate primary care shortages in our state
- Reduce by 15% shortages of OB-GYN care
- Reduce by 37% shortage of anesthesia care
- Create 4,500-10,300 new jobs
- Generate \$238-\$547 million in increased wages and benefits
- Increase by \$542 million- 1.25 billion projected annual economic output to the state
- Reduce costs to state Medicaid program

Nationally, The American Association of Nurse Practitioners' (AANP) CEO David Herbert and President Dr. Sophia Thomas met with some of the key decision makers for healthcare in the Capitol and have continued the nationwide #WeChooseNPs campaign.

AANP asks that all NPs help spread the word by doing the following 3 things:

- Watch for and share AANP's posts with the #WeChooseNP messages on social media
- Visit the WeChooseNPs website at [www.wechoosenps.org](http://www.wechoosenps.org) and share it with your patients and colleagues.
- Help patients find you by updating your practice site information on NP Finder.

### References:

- Floridians Unite for Healthcare. (2020). Give more Floridians access to safe & quality healthcare. Retrieved from <https://floridiansuniteforhealthcare.com>
- Gankarski, A.G. (2019, Dec. 11). House bill expanding nurse powers back again, clears first panel. Retrieved from <https://floridapolitics.com/archives/313263-house-expand-nurse-powers>
- Florida Association of Nurse Practitioners. (2020). Talking points. Retrieved from <https://www.flanp.org/page/TalkingPoints>





# Brag Board

Our first FANNP Research grant recipient of 2020 is Melissa Dollings, MSN, NNP-BC, a PhD student at Virginia Commonwealth University for her study titled “Splanchnic oxygenation and feeding intolerance in the very low birthweight infant”.

Melissa is conducting a near-infrared spectroscopy (NIRS) investigation to examine the impact of feeding intolerance on splanchnic (gut) oxygenation, and to further explore the relationship of intra- and extrauterine factors (PIH, chorioamnionitis, PDA, degree of prematurity, anemia, etc.) to feeding intolerance and gut oxygenation changes. This prospective, observational study will significantly contribute to existing knowledge surrounding feeding intolerance, and further provide clarity for future intervention strategies. Congratulations Melissa!! We look forward to hearing about and reading your study findings in the near future!!

## Conference Update

We could all use something exciting to look forward to right about now. Your Conference Planning Committee has been busy behind the scenes, contacting speakers and confirming their presentations for the 31st FANNP Neonatal Nurse Practitioners Symposium: Clinical Update and Review! Conference dates are October 13-17, 2020 and as in past years, the venue is the beautiful Sheraton Sand Key Resort in Clearwater Beach, FL. We are continuing to look at different ways to keep costs down but still maintain the quality you have come to depend on. The list looks very promising, so stay tuned for more announcements as we get speakers confirmed! As always we strive to get the “Best for the Best”!

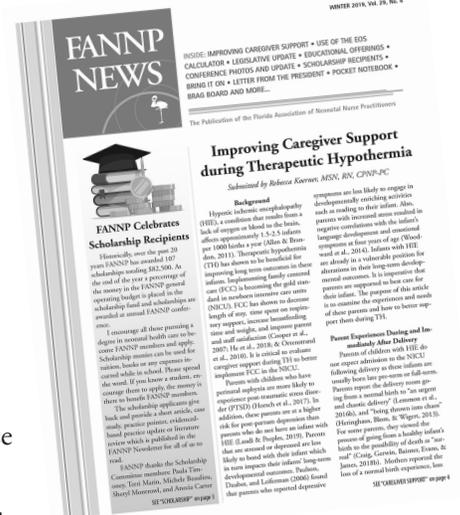
Mary Kraus, MSN, NNP-BC  
Conference Chair  
Florida Association of Neonatal Nurse Practitioners

FANNP is excited to welcome Jill Lionberger to the editing team! She will be working with Christa Smith as co-editor of the FANNP quarterly newsletter.

Jill graduated from Burge School of Nursing (now Cox College), a diploma school in 1990. After graduating from nursing school, she worked in a level III NICU in Springfield, MO.; she then completed her BSN at Southwest Missouri State University (now Missouri State University). After graduating in 1996, Jill joined the Air Force and served in the Nurse Corp for 4 years in San Antonio, Texas at Wilford Hall Medical Center in the NICU. While in the Air Force, she obtained a degree in Health Service Management from Webster University. After her time was up in the Air Force, Jill moved to Albuquerque, NM where she lived for 14 years. Prior to graduating from Creighton University in Omaha, NE, she attended the FANNP Conference for the first time. Jill taught nursing school for ~ 1 ½ years in Omaha, while continuing to work in the NICU there. She moved back to her home state of Missouri in 2014 and started working at Children’s Mercy Hospital in Kansas City, MO. Jill states that “After almost 30 years as a nurse, I still love the nursing profession and in particular the NICU.”

On a personal note, Jill and her husband have seven children; four biological and three adopted children, of which, six are boys. Her two youngest still live at home and the others are scattered across the US with one in China. Jill has three grandchildren with whom she enjoys spending her time, and two wonderful dogs, Venus and Jax. In her spare time, Jill enjoys reading.

Welcome to the team, Jill! We are thrilled that you have chosen to be a part of FANNP!



MA

## FANNP's National Neonatal Nurse Practitioner Symposium: Clinical Update and Review, 2020

# POSTER & PODIUM PRESENTATION CALL FOR SUBMISSIONS

**SUBMISSION DEADLINE: July 15, 2020**

FANNP is seeking abstracts for posters and podium presentations for the annual FANNP's National Neonatal Nurse Practitioner Symposium in October 2020. The planning committee invites submissions by members and non-members and participation is open to health professionals whose specialty has a focus on the Neonatal Population (this includes but is not limited to NNPs, RNs, Clinical Nurse Specialists, & Neonatologists). We invite colleagues to share their expertise in one of the following categories:

- Original Research
- Innovations in Practice or Education
- Patient Safety
- Quality Improvement and Benchmarking Initiatives
- Case Studies

Please note that a Literature Review on a specific topic will not be accepted for poster or podium presentation.

### PODIUM & POSTER PRESENTATION PEER REVIEW PROCESS

Abstracts will be reviewed and scored by a panel of experts and the four with the highest scores will receive an invitation for a podium presentation during the conference in the Advanced Track. Scoring is based on overall quality, originality and appropriateness to NNP practice. Preference will be given to original research with complete data available. Podium presentations are 10 minutes with 5 minutes for questions. \*Podium presenters will receive a \$75 honorarium.

### POSTER PRESENTATION

All abstracts will be considered for poster presentation. Detailed instructions for the poster presentation will be provided to the Primary Author at the time of abstract acceptance.

### SUBMISSION REQUIREMENTS

Abstracts must be submitted electronically in Word Format (no PDFs). Abstracts should be no longer than 500 words, single-spaced, 12-point font, with up to 2 additional

bibliography pages. The content should be presented in the form of a structured abstract with format appropriate to category. For example...

Research:

- Purpose
- Background/Significance
- Methods
- Results
- Conclusions
- Discussion
- Major References

Case Study: (Please do not include any identifiable information)

- Introduction
- Case Presentation:
  - History of Present Illness
  - Hospital Course
  - Family History (if indicated)
  - Social History (if indicated)
  - Labs, Images, Studies
- Discussion

A signed conflict of interest statement & CV of primary author (required for CE credits) must be submitted with the abstract. Abstracts that do not follow the submission guidelines will not be reviewed. Abstracts previously presented in other arenas are eligible for submission. FANNP would like to publish accepted abstracts in our Newsletter during the year. You will be asked to give your permission when applying.

CONFERENCE EXPENSES: All presenters chosen for the podium and/or poster presentation are responsible for conference registration fees, travel and all other expenses.

**Application and Checklist may be found at  
[www.fannp.org](http://www.fannp.org)**

## EDUCATIONAL OFFERINGS

### Spring 2020 National Advanced Practice Neonatal Nurses Conference-Academy of Neonatal Nursing

April 15-18, 2020

Hilton Hawaiian Village  
Honolulu, HI

[www.academyonline.org](http://www.academyonline.org)

### Nationwide Children's Neonatal/Perinatal Conference

May 19-21, 2020

Nationwide Hotel and Conference Center

Lewis Center, OH

[www.nationwidechildrens.org](http://www.nationwidechildrens.org)

### 19<sup>th</sup> Annual World Congress on Neonatology

July 20-21, 2020

Vancouver, Canada

[www.neonatalconferenceseries.com](http://www.neonatalconferenceseries.com)

### Fall 2020 National Advanced Practice Neonatal Nurses Conference-Academy of Neonatal Nursing

September 9-12, 2020

Bally's Hotel

Las Vegas, NV

[www.academyonline.org](http://www.academyonline.org)

### NANN 36<sup>th</sup> Annual Conference

October 10-13, 2020

Ernest N. Morial Convention Center  
New Orleans, LA

[www.nann.org](http://www.nann.org)

### The 31<sup>st</sup> FANNP Neonatal Nurse Practitioners Symposium: Clinical Update and Review

October 13-17, 2020

Sheraton Sand Key Resort  
Clearwater Beach, FL

[www.fannp.org](http://www.fannp.org)



### Hot Topics in Neonatology

December 7-9, 2020

Gaylord National  
National Harbor, MD

[www.hottopicsonneonatology.org](http://www.hottopicsonneonatology.org)

## POCKET NOTEBOOK

*Diane McNerney DNP, NNP-BC*

### Infant Bottle Nipple Guide

1. Firm standard nipple - Well term newborns should be able to handle the flow of this firm latex nipple. If the infant is gulping or loosing large amounts of liquid from the oral cavity, this may indicate inadequate oral-motor skills or flow is too fast for the infant to pace appropriately. Flow rate per min – up to 20 ml.
2. Soft standard nipple - This soft latex-free nipple is wider at the base and helps infants with weaker suck to transfer milk without excess volume loss. Flow rate per min – up to 15 ml.
3. Slow flow nipple - This soft latex-free nipple is wider at the base and transfers less volume with each suck. This nipple benefits infants who have problems coordinating suck-swallow-breath reflex. Flow rate per min – up to 8 ml.
4. Orthodontic nipple - This latex nipple provides more sensory input. This nipple is beneficial for those infants with high palate, decreased lingual cupping, compression suck and those babies experiencing drug withdrawal. Flow rate per min – up to 35 ml.

#### References

- Britt, F., Park, B., Suzanne, M. et al (2015). Milk Flow Rates from Bottle Nipples Used for Feeding Infants Who Are Hospitalized. *Journal of Speech & Language Pathology* Nov; 24(4): 671-679. doi: 10.1044/2015\_AJSLP-15-00
- Pados, B.F., Park, J., & Dodrill, J. (2019). Know the Flow: Milk Flow Rates From Bottle Nipples Used in the Hospital and After Discharge. *Advances Neonatal Care*; Feb;19(1):32-41. doi: 10.1097/ANC.0000000000000538.



## FANNP Dates to Remember

Event/Item	Date/Deadline of Event/Item
FANNP Grant.....	Ongoing
Poster Presentation Abstracts .....	July 15
Kim Nolan Spirit Award.....	July 15
FANNP Scholarship .....	Sept. 15
National Neonatal Nurses Day.....	Sept. 15
Annual National Neonatal Nurse Practitioner Symposium: Clinical Update and Review* .....	Oct. 13-17, 2020
Nurse Practitioner Week* .....	Nov. 8-15, 2020

*\*Dates change annually*

### FANNP Newsletter Submission Calendar

Edition	Article Submission Deadline	Publish Date
Spring 2020	02/08/20	03/09/20
Summer 2020	05/10/20	06/08/20
Fall 2020	08/09/20	09/07/20
Winter 2020	11/07/20	12/07/20

In addition to the core components of the newsletter, we would love to hear what you have to say! Please send in anything you would like to see added to the newsletter, whether it is an interesting article, a hot topic in the neonatal world, or even a shout out regarding a fellow FANNP member who is doing awesome things! We want to hear from you! Please submit following the above guidelines to [newsletter@fannp.org](mailto:newsletter@fannp.org). \*\*Interested in helping with the editing of the newsletter?? Please email the above link!\*

## BRING IT ON ANSWERS from page 12

1. A. A late deceleration is defined as a gradual decrease in the fetal heart rate below baseline, typically following the uterine contraction.
2. B. Double aortic arch causes esophageal and tracheal compression, and is the most common type of complete vascular ring. Patients typically present with dysphagia and exacerbating respiratory symptoms.
3. A. While both infant of diabetic mother (IDM) and birth asphyxia are known etiologies for hypocalcemia following birth, low birth weight preterm infants are at greatest risk of hypocalcemia with rates as high as 89%.

## Calling for Research Proposals... FANNP Grants Available

Each year FANNP sets aside funds for the support of research projects. Applications for funding are reviewed by the Research Committee. The Research Committee makes recommendations to the Board of Directors on proposals received. Members of the Research Committee are appointed by the Board of Directors. The grant application period is rolling—there is no deadline for grant submission. Grants will be awarded within six weeks following submission, based on the Research committee and BOD decision.

Please visit [www.fannp.org](http://www.fannp.org) for more details

## The Kim Nolan Spirit Award... In Memory and Honor of Kim Nolan

Do you know a special NNP? The Kim Nolan Spirit Award is given annually to a NNP who exemplifies Kim’s exuberance and “can-do” attitude in service to profession, community, and/or family. To read more about Kim visit [www.fannp.org](http://www.fannp.org), and nominate someone today at [award@fannp.org](mailto:award@fannp.org)! Nominations due July 15, 2020.



*Kim Nolan*



## Newsflash – FANNP Online

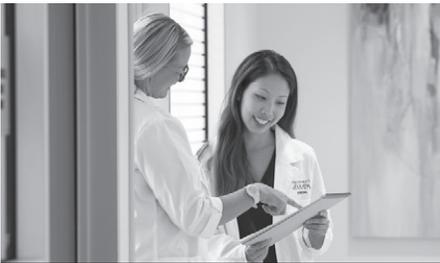
Get the latest news and updates from FANNP, including valuable conference information at [www.fannp.org](http://www.fannp.org).

Also, remember to join us on Facebook and follow us on Twitter and Instagram @FANNPorg. Be sure to tag us and let us know when you PASS YOUR BOARDS!!

# THE UNIVERSITY OF TAMPA

## New Online DNP Program

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Questions? Contact Patricia Washington at [patricia.washington@childrensMN.org](mailto:patricia.washington@childrensMN.org) or 952-992-5325.

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Bring it On...



**Practice Questions  
to Prepare  
for the NNP  
Certification Exam**

1. A symmetric fall in the fetal heart rate beginning at or after the peak of the uterine contraction and returning to baseline only after the contraction has ended is a/an:
  - A. Late deceleration
  - B. Acceleration
  - C. Variable deceleration
  
2. An infant with stridor, wheezing, and retractions has a contrast esophogram that shows compression at the level of the aortic arch with marked posterior indentation and less marked right and left indentation. These findings are most consistent with:
  - A. Anomalous retro-esophageal subclavian artery
  - B. Double aortic arch
  - C. Truncus arteriosus
  
3. Which of the following infants would most likely develop hypocalcemia?
  - A. Preterm 1 kg infant
  - B. Infant of a diabetic mother (IDM)
  - C. Birth asphyxiated term infant

Answers on page 10

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