ARKANSAS STATE BOARD OF NURSING

1123 S. University Ave., Suite 800 Little Rock, AR 72204 501.686.2700





Arkansas Department of Health

Division of Healthcare Related Boards & Commissions

POSITION STATEMENT

94-1

Role of the Registered Nurse in the Management of Patients Receiving Moderate Sedation,
Anesthetic Agents or Neuromuscular Blocking (paralytic) Agents For Therapeutic or Diagnostic Procedures

The Arkansas State Board of Nursing has determined that it is within the scope of practice of a registered nurse (RN) who has demonstrated competency to administer pharmacologic agents under direct supervision of a physician or advanced practice registered nurse (APRN) to produce moderate sedation and to assist in rapid sequence intubation (RSI). Air and surface transport RNs in the field may administer pharmacologic agents under the direction of the physician or APRN. Consistent with state law, the attending physician, APRN, or a qualified provider must order the drugs, dosages, and concentrations of medications to be administered to the patient. Optimal anesthesia care is best provided by anesthesiologists and certified registered nurse anesthetists (CRNAs). The Board recognizes that the demand in the practice setting necessitates non-APRN RNs to administer anesthetic agents or neuromuscular blocking (paralytic) agents in specific circumstances. The RN shall have the educational preparation and clinical competence to administer anesthetic agents or neuromuscular blocking (paralytic) agents to assist in moderate sedation, RSI, therapeutic, or diagnostic procedures.

These specific circumstances include:

- 1. The RN administering a continuous infusion of an anesthetic agent or neuromuscular blocking (paralytic) agent to a hospitalized patient who is intubated and ventilated in an acute care setting for the purposes of maintaining comfort, stable oxygenation and ventilation, and a viable airway. A physician qualified in the administration of anesthetics or an APRN shall determine the continuous infusion dosage. Dose titrations and boluses of subsequent anesthetic agents or neuromuscular blocking (paralytic) agents to be administered to the intubated and ventilated patient may be administered by the RN upon specific orders or protocols by a physician or APRN.
- 2. The RN administering sedation for comfort care in the final hours of life under the direction of a physician or APRN.
- 3. The RN administering sedation for procedure where the physician or APRN is present but unable to personally inject the agents because the physician or APRN is performing the critical procedure of emergent intubation.
- 4. The air and surface transport RN administering sedation for a procedure in the field setting under the direction of a physician or APRN.
- 5. The RN administering anesthetic agents in placement of peripheral nerve blocks that may require the use of both hands of the physician or APRN to not compromise patient safety.
- 6. The RN administering anesthetic agents for therapeutic care including pain management or treatment of agitated delirium.

POSITION STATEMENT 94-1

Role of the Registered Nurse in the Management of Patients Receiving Moderate Sedation, Anesthetic Agents or Neuromuscular Blocking (paralytic) Agents for Therapeutic or Diagnostic Procedures Page 2

As with all areas of nursing practice, the RN shall apply the *Nurse Practice Act* and *Rules* to the specific practice setting, and shall utilize good professional judgment in determining whether to engage in a given patient-care related activity.

Employing facilities shall have policies and procedures to guide the RN. The Arkansas State Board of Nursing has adopted the attached guidelines.

Adopted November 1994 Revised September 17, 2009 Revised September 12, 2014 Revised May 11, 2017

POSITION STATEMENT 94-1 GUIDELINES

Position Statement on the Role of the Registered Nurse (RN) in the Management of Patients Receiving Moderate Sedation, Anesthetic Agents or Neuromuscular Blocking (paralytic) agents

For Therapeutic or Diagnostic Procedures

A. Definition of Moderate Sedation.

The American Society of Anesthesiologists (ASA) defines the various levels of sedation and anesthesia that are now incorporated into this statement. (ASA Statement on Granting Privileges for Administration of Moderate Sedation to Practitioners Who are not Anesthesia Professionals, approved by ASA House of Delegates on October 25, 2005, and amended on October 19, 2011).

"Moderate Sedation/Analgesia" is a drug-induced depression of consciousness during which patients respond purposefully to verbal commands, either alone or accompanied by light tactile stimulation. No interventions are required to maintain a patent airway, and spontaneous ventilation is adequate. Cardiovascular function is usually maintained. Also, note that procedural sedation involves the use of sedative and analgesic agents to reduce the anxiety and pain suffered by patients during procedures (American College of Emergency Physicians [ACEP] Policy Statement, Sedation in the Emergency Department, Approved by the ACEP Board January 13, 2011).

"Deep Sedation/Analgesia" is a drug-induced depression of consciousness during which patients cannot be easily aroused but respond purposefully following repeated or painful stimulation. The ability to independently maintain ventilatory function may be impaired. Patients may require assistance in maintaining a patent airway, and spontaneous ventilation may be inadequate. Cardiovascular function is usually maintained.

Rescue of a patient from a deeper level of sedation than intended is an intervention by a practitioner proficient in anesthesia care, proficient in airway management, and trained in advanced life support. The qualified anesthesia practitioner corrects adverse physiologic consequences of the deeper-than intended level of sedation (such as hypoventilation, hypoxia and hypotension) and returns the patient to the originally intended level of sedation.

"General Anesthesia" is a drug-induced loss of consciousness during which patients are not arousable, even by painful stimulation. The ability to independently maintain ventilatory function is often impaired. Patients often require assistance in maintaining a patent airway, and positive pressure ventilation may be required because of depressed spontaneous ventilation or drug-induced depression of neuromuscular function. Cardiovascular function may be impaired.

B. Position Statement 94-1 Guidelines for Management and Monitoring

It is within the scope of practice of a registered nurse to manage the care of patients receiving moderate sedation during therapeutic or diagnostic procedures provided the following criteria are met:

- 1. Administration of moderate sedation medications by non-anesthetist RNs is allowed by state laws and institutional policy, procedures, and protocol.
- 2. An anesthesia provider or attending physician selects and orders the medications to induce moderate sedation.
- 3. Guidelines for patient monitoring, drug administration, and protocols for dealing with potential complications or emergency situations are available and have been developed in accordance with accepted standards of anesthesia practice.
- 4. The RN managing the care of the patient receiving moderate sedation shall have no other responsibilities that would leave the patient unattended or compromise continuous monitoring.
- 5. The RN managing the care of the patient receiving moderate sedation is able to:
 - a. Demonstrate the acquired knowledge of anatomy, physiology, pharmacology, cardiac dysrhythmia recognition and complications related to moderate sedation and medications.

POSITION STATEMENT 94-1 GUIDELINES

- b. Assess total patient care requirements during moderate sedation and recovery. Physiologic measurements should include, but not be limited to, respiratory rate, oxygen saturation, blood pressure, cardiac rate and rhythm, and patient's level of consciousness.
- c. Understand the principles of oxygen delivery, respiratory physiology, transport and uptake, and demonstrate the ability to use oxygen delivery devices.
- d. Anticipate and recognize potential complications of moderate sedation in relation to the type of medication being administered.
- e. Possess the requisite knowledge and skills to assess, identify and intervene in the event of complications or undesired outcomes and to institute nursing interventions in compliance with orders (including standing orders) or institutional protocols or guidelines.
- f. Demonstrate skill in airway management resuscitation.
- g. Demonstrate knowledge of the legal ramifications of administering moderate sedation or monitoring patients receiving moderate sedation, including the RN's responsibility and liability in the event of an untoward reaction or life threatening complication.
- 6. The institution or practice setting has in place an education and competency validation mechanism that includes a process for evaluating and documenting the RNs demonstration of the knowledge, skills, and abilities related to the management of patients receiving moderate sedation. Evaluation and documentation of competence occurs on a periodic basis according to institutional policy.

C. Additional Guidelines

- 1. Intravenous access must be continuously maintained in the patient receiving moderate sedation.
- 2. All patients receiving moderate sedation will be continuously monitored throughout the procedure as well as the recovery phase by physiologic measurements including, but not limited to, respiratory rate, oxygen saturation, blood pressure, cardiac rate and rhythm, and patient's level of consciousness.
- 3. Supplemental oxygen will be immediately available to all patients receiving moderate sedation and administered per order (including standing orders).
- 4. An emergency cart with a defibrillator must be immediately accessible to every location where moderate sedation is administered. Suction and a positive pressure breathing device, oxygen, and appropriate airways must be in each room where moderate sedation is administered.
- 5. Provisions must be in place for back-up personnel who are experts in airway management, emergency intubation, and advanced cardiopulmonary resuscitation if complications arise.

D. Definitions/Implications for Rapid Sequence Intubation

The American College of Emergency Physicians (ACEP) defines Rapid Sequence Intubation (RSI) as an airway management technique in which a potent sedative or anesthetic induction agent is administered simultaneously with a paralyzing dose of a neuromuscular blocking agent to facilitate rapid tracheal intubation. The technique includes specific protection against aspiration of gastric contents, provides access to the airway for intubation, and permits pharmacologic control of adverse responses to illness, injury, and the intubation itself.

Additionally, the American College of Emergency Physician claims the licensed provider who is managing the patient's airway is to have no other responsibilities or duties at that time. To require the licensed provider to leave the patient's airway in order to administer medications for the purpose of RSI compromises patient safety (ACEP, 2006)

E. Guidelines for Management and Monitoring of RSI

It is within the scope of practice of a RN who has completed special education and demonstrated evidence of competency and skill to administer anesthetic agents or neuromuscular blocking (paralytic) agents to the non-intubated patient for the purpose of RSI, as well as manage and monitor the patient receiving RSI, provided specific criteria are met.

POSITION STATEMENT 94-1 GUIDELINES

- 1. Administration of anesthetic agents or neuromuscular blocking (paralytic) agents by non-anesthetist RN is allowed by state laws and institutional policy, procedure, and protocol.
- 2. Medications for RSI are ordered by a physician or APRN.
- 3. The RN managing the care of the patient receiving RSI shall have no other responsibilities that would leave the patient unattended or compromise continuous patient monitoring.
- 4. The RN managing the care of the patient receiving RSI shall be able to:
 - a. Demonstrate knowledge of airway management, arrhythmia recognition, and emergency resuscitation appropriate to the age of the patient, utilizing Advanced Cardiopulmonary Life Support (ACLS), Pediatric Advanced Life Support (PALS), and/or Neonatal Resuscitation Program (NRP) guidelines.
 - b. Understand principles of pharmacology related to sedation, anesthetic induction, and neuromuscular blocking (paralytic) agents, including drug actions, side effects, and reversal agents.
 - c. Demonstrate knowledge of physiologic parameters that are to be monitored during medication administration and RSI such as respiratory rate, oxygen saturation, blood pressure, cardiac rhythm, heart rate, and patient's level of consciousness.
 - d. Assess the total patient care requirements before and during the administration of anesthetic agents or neuromuscular blocking (paralytic) agents, including the recovery phase.
 - e. Demonstrate knowledge of the appropriate nursing interventions in the event of a complication, unsuccessful RSI, or untoward outcome.
 - f. Demonstrate knowledge of the legal ramifications of administering medications for the purpose of RSI and patient monitoring, including the RNs responsibility and liability in the event of an untoward reaction or life threatening complication.

F. Practice Setting/Agency Responsibilities for RSI

Based on agency standards, regulations, accreditation requirements, personnel, and equipment, each employing agency may determine if medication administration by RNs for the purpose of RSI is authorized in their setting. If medication administration by non-anesthetist RNs for the purpose of RSI is permitted, the following shall be in place:

- 1. Written policy and procedure to address RSI.
- 2. Credentialing requirements for non-anesthesiologist physicians.
- 3. Documentation of required and ongoing education and competency for RNs administering medications for the purpose of RSI.
- 4. Requirement that the physician or APRN be physically present at the bedside throughout the time RSI medications are being administered by a RN to ensure the physician or APRN performs the intubation and is readily available in the event of an emergency, except when administration occurs in the field by air and surface transport RNs. In the field setting, a second provider who will perform intubation must be physically present and ready to intubate as soon as possible once the medications have been administered.
- 5. Emergency Equipment
 - a. Age and size appropriate emergency supplies must be immediately accessible at every location where RSI is performed. Required supplies include emergency resuscitative drugs, basic and advanced airway and ventilator adjunct equipment, cardiac monitor and defibrillator, and source for 100% oxygen administration.
 - b. Suction devices
 - c. Positive pressure breathing device/bag-valve mask (BVM)
 - d. Supplemental oxygen
 - e. Blood pressure cuff(s)
 - f. Stethoscope
 - g. Pulse oximetry

References

American Nurses Association. (2007) Procedural Sedation and Rapid Sequence Intubation (RSI) Consensus Statement. Retrieved March 2016 from: http://nursingworld.org/MainMenuCategories/Policy-Advocacy/Positions-and-Resolutions/ANAPositionStatements/Position-Statements-Alphabetically/Procedural-Sedation-Consensus-Statement.html

American Association of Nurse Anesthetists. (2010). Position statement number 2.2: Qualified providers of sedation and analgesia. Retrieved from

 $\underline{http://www.aana.com/resources2/professional practice/Documents/PPM\%20PS\%202.2\%20Qualified\%20Providers\%20of\%20Sedation\%20Analgesia.pdf}$

American Association of Nurse Anesthetists. (2010). Considerations for policy development number 4.2: Registered nurses engaged in the administration of sedation and analgesia. Retrieved from

 $\frac{\text{http://www.aana.com/resources2/professionalpractice/Documents/PPM\%20Consid\%204.2\%20RNs\%20Engaged\%20in}{\%20Sedation\%20Analgesia.pdf}$

American College of Emergency Physicians (ACEP). (2012). Rapid Sequence Intubation

Approved by the ACEP Board of Directors September 1996. Reaffirmed by ACEP Board of Directors October 2000; October 2006; April 2012. Retrieved March 2016 from: http://www.acep.org/content.aspx?id=29662 Emergency Nurses Association (ENA). Procedural sedation and analgesia in the emergency department. [Position Statement]. (Developed 1992; revised and approved by the ENA Board of Directors in July 2005). Retrieved from http://www.ena.org/SiteCollectionDocuments/Position%20Statements/ProceduralSedation.pdf

Arizona State Board of Nursing. (2003, January). Advisory Opinion: Anesthetic Agents Administered by Registered Nurses for Limited Purpose: Airway Management Or Peripheral Nerve Block

Georgia Board of Nursing. (2015, April). Position Statement: Administration of Propofol, Etomidate, and Neuromuscular Blocking Agents. Retrieved March 16 from http://sos.ga.gov/PLB/acrobat/Forms/38%20Reference%20-%20Position%20Statement%20-

%20Administration%20of%20Propofol,%20Etomidate%20and%20Neuromuscular%20Blocking%20Agents.pdf

Oklahoma Board of Nursing. (2012, November). Rapid Sequence Intubation Guidelines-Medication Administration by Registered Nurses, West Virginia Board of Examiners for Registered Professional Nurse. (2010, October). Position Statement: Administration of Anesthetic Agents Revised October 22, 2010

American Association of Critical-Care Nurses

American Association of Neuroscience Nurses

American Association of Nurse Anesthetists

American Association of Spinal Cord Injury Nurses

American Association of Occupational Health Nurses

American Nephrology Nurses Association

American Nurses Association

American Radiological Nurses Association

American Society of Pain Management Nurses

American Society of Plastic and Reconstructive Surgical Nurses

American Society of Post Anesthesia Nurses

American Urological Association, Allied

Association of Operating Room Nurses

Association of Pediatric Oncology Nurses

Association of Rehabilitation Nurses

Dermatology Nurses Association

NAACOG, The Organization for Obstetric, Gynecologic, and Neonatal Nurses

National Association of Orthopaedic Nurses

National Flight Nurses Association

National Student Nurses Association

Nurse Consultants Association, Inc.

Nurses Organization of Veterans Affairs

Nursing Pain Association

Adopted November 1994 Revised September 17, 2009 Revised September 12, 2014 Revised May 11, 2017