Cervical/Lumbar/Thoracic Epidural Name of Policy: **Infusion of Local Anesthetics and/or Opioids for Pain Management** THE UNIVERSITY OF TOLEDO **Policy Number:** 3364-110-05-12 **Department: Nursing Service** Approving Chief Nursing Officer (CNO) Officer: Responsible Chief Nursing Officer (CNO) Agent: 6.1.2023 Scope: **Effective Date:** The University of Toledo Medical Center Initial Effective Date: 9/1995 (UTMC) Minor/technical revision of existing policy New policy proposal Major revision of existing policy Reaffirmation of existing policy

(A) Policy Statement

The infusion of local anesthetics and/or opioids for pain control into a catheter placed in the cervical/lumbar/thoracic epidural space shall be administered under controlled guidelines for nursing and medical staff.

(B) Purpose of Policy

To assure safe and consistent methods of delivery of neuraxial opioids and local anesthetics. To reduce the risks of complications such as infection, hematoma, and respiratory depression.

(C) Procedure

- 1. The attending anesthesiologist will be responsible for the accurate placement of the catheter.
- 2. An order will be written for the epidural infusion of local anesthetics and/or opioids by utilizing the, or entered electronically in the Electronic Medical Record (EMR)
- 3. Epidural local anesthetics and/or opioid infusions will be the sole responsibility of the Department_of Anesthesiology.
- 4. A solution of preservative-free normal saline mixed with local anesthetic and/or opioids totaling 200ml will be obtained from the pharmacy by the nursing staff.
- 5. All epidural/intrathecal opioid orders will be reviewed every 48 hours.
- 6. An Alaris infusion pump specific to Epidural infusions will only be used for all epidural infusions.
- 7. All tubing used on the epidural infusion must be portless and contain a yellow-colored line indicating that it's Epidural tubing.
- 8. A 0.2 micron flat epidural filter will be attached to the distal portion of the epidural tubing.
- 9. All patients with epidural infusions containing narcotics must have continuous ETCO2 monitoring.
- 10. The Registered Nurse (RN), utilizing sterile technique, will attach or spike the epidural solution, and flush the tubing and filter in preparation for the initiation of the epidural infusion.
- 11. RN's may initiate epidural infusions and change the rate of infusion on the order of the anesthesiologist. This requires two RNs or a representative of the <u>Department of Anesthesiology</u>.

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- 12. The RN may maintain epidural infusions by changing epidural syringes, providing the infusion solution is checked by two RNs or a representative of the Department of Anesthesiology_against the current epidural infusion order.
- 13. The epidural infusion tubing and filter will be changed every 72 hours.
- 14. A sign stating "Epidural Infusion" will be prominently placed on the wall above the head of the patient's bed.
- 15. No I.M., I.V., P.O. opioids, sedative, or benzodiazepine drugs are to be given to the patient except when ordered or approved by the Anesthesiology.
- 16. The patient will not receive anticoagulants unless pre-approved by Anesthesiology while the epidural catheter is in place. The pre-approval of anticoagulants must be clearly documented in the patient's medical record.
- 17. Monitoring:

Monitor and document in the EMR:

The epidural infusion rate or PCEA settings, respiratory rate, blood pressure, pulse, pain rating and sedation rating every one-hour X 12 hours.

For the first 12 hours, after the catheter is discontinued, monitor the respiratory rate every two hours. If respiratory rate is still < 12, monitor respiratory rate for 18 hours.

If respiratory rate is ≤ 10 per minute, remain at bedside, stimulate patient, and administer naloxone 0.2 mg over one 1 minute or if patient becomes unarousable during epidural use may repeat for a total of two doses. Prepare naloxone by mixing 0.4 mg (1 ml) with 9 ml's of normal saline; each 5 ml's contains 0.2 mg.

Neuro checks q 2 hrs until 12 hours after epidural is discontinued.

Other vitals as per primary service.

- 18. Maintain IV access drip or saline lock during epidural infusion and for 12 hours after epidural is discontinued.
- 19. Notify anesthesiologist on 1st call for:

Sedation scale = 3 (unarousable)

Respiratory rate < 10 per minute or less, or with pulse ox reading of 92% or below the patient's baseline.

Systolic blood pressure of < 100 mm Hg or when less than 20% of baseline

Inadequate level of analgesia

Temperature of 101.5 F (38 C) or greater

Nausea or pruritus not controlled by therapy ordered

- 20. The dressing over the epidural insertion site will not be changed or removed by the nursing staff. The dressing will be examined once a shift. The site is assessed for placement of epidural catheter or any signs of infection at epidural insertion site. If any problem with the epidural dressing, catheter, or infusion is identified by the nursing staff, the <u>Anesthesiology</u> Service will be notified immediately.
- 21. The UTMC nursing staff will document in EMR all observations concerning the epidural infusion.
- 22. The epidural infusion orders written by the anesthesiologist are followed continuously for the duration of the epidural infusion.
- 23. If the primary service requests discontinuation of the epidural catheter, nursing staff will notify the Anesthesiology Service. Only a member of the Anesthesiology Service shall remove the catheter.

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Approved by:		Review/Revision Date:
		3/1997 6/17/2010
		3/1999 4/27/2012
/s/		4/2002 3.27.15
Kurt Kless, MSN, MBA, RN, NE-BC	Date	4/2004 3.1.17
Chief Nursing Officer		3/2005 3.1.2020
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