

Chest Tube Removal Performed by RN's.

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BACKGROUND/TRIGGERS

- Advanced Practitioners currently remove chest tubes on patients following open-heart surgery
- Registered Nurse-driven removal of chest tubes facilitates decreased length of time chest tubes are in patients
- Decreased chest tube insertion time leads to improved pain scores and decreased length of stay

PICO

Does having critical care RNs remove chest tubes in post cardiac surgery patients decrease total time the chest tubes remain in the patient?

P- post-cardiac surgery patients w/ chest tubes who have been identified by the provider as being eligible for having their chest tubes removed.

I- RN's removing chest tubes

C- APC's removing chest tubes

O- Decrease the time chest tubes remain in patients

EVIDENCE

- Early chest tube removal improves pain scores, increases ambulatory ability, decreases time to mobilization.
- Registered nurses have the ability to remove chest tubes according to Pennsylvania State Board of Nursing.

IMPLEMENTATION PLAN

- Development of LVHN Policy and Procedural Checklist granting RN's the ability to remove chest tubes
- Coordinate with Cardio-Thoracic Surgery team to educate and train RN's on proper techniques
- Allow RN's to remove chest tubes once an APC order is received
- Standardize chest tube removal process

OUTCOMES

- Policy and Procedural Checklist completed, currently pending LVHN approval

NEXT STEPS

- Collaborate with Cardio-Thoracic Surgery team on Policy and Procedural Checklist
- Submit Policy and Procedural Checklist to Nursing Practice Council
- Coordinate training and validation of RNs with Cardio-Thoracic Surgery team
- Have RNs begin to remove chest tubes once an order is received from an APC

REFERENCES

- Demir, Y., & Khorshid, L. (2010). The effect of cold application in combination with standard analgesic administration on pain and anxiety during chest tube removal: A single-blinded, randomized, double-controlled Sstudy. *Pain Management Nursing, 11*(3), 186-196. doi:10.1016/j.pmn.2009.09.002
- Hood, B. S., Henderson, W., & Pasero, C. (2014). Chest Tube Removal: An Expanded Role for the Bedside Nurse. *Journal of PeriAnesthesia Nursing, 29*(1), 53-59. doi:10.1016/j.jopan.2013.11.001
- Thompson, S. C., Wells, S., & Maxwell, M. (1997). Chest tube removal after cardiac surgery. *Critical Care Nurse, 17*(1), 34-38.
- Wiegand, D. J. (2017). *AACN procedure manual for high-acuity, progressive, and critical care* (Vol. 7). St. Louis, MO: Elsevier.

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