
REFERENCES

- Aitkenhead A.R., and Smith G., (1996):* The Postoperative Care. Textbook of Anesthesia. 3rd edition. Chapter 23, 407:434. Churchill Livingstone. New York, London, Madrid.
- Aldrete J.A., and Kroulik D.; (1970):* post anaesthetic recovery score. Anesth analg. 49:924.
- Aldrete, J. (1995):* "The post Anesthesia recovery score revisited. Journal of clinical Anesthesiology.
- Alhashemi JA, Miller DR, O' Brien HV, Hull KA. (1997):* Cost-effectiveness of inhalational, balanced and total intravenous anesthesia for ambulatory knee surgery. Can J Avesthesia 44: 118-25.
- Altinatas, F.; Bozkurt, P.; Ipek, N.; Yacel, A. and Kaya, G. (2000):* The efficacy of pre-versus post-surgical axillary block on postoperative pain in paediatric patients. Paediatric Anaesth. 10: 23-8.
- Apfelbaum, R.; Grasela, S.; Walawander, C.; and the safe- study team (1997) :* bypassing the PACU-a new parading in ambulatory surgery . anesthesiology, 87 (abstract) A32.
- Bander, N.H.; Knill, K. L.; Brown, J.E.; Novick, T.V. and Gelb, A.W. (1998):* Anesthesiology. 88: 572-578.
- Bevan, D.R.; Donati, F. and Kopman, A.F. (1992):* Reversal of neuromuscular blockade. Anesthesiology. 77: 785-92.
- Beydon, L.; Hassapopoulos, J. and Quera, M.A. (1992):* Risk factors for oxygen desaturation during sleep after abdominal surgery. Br. J. Anaesthesia. 69: 137.
- Bozeman, W. (2001):* "Shock, Haemorrhage" Medicine Journal. <http://www.Emedicine.Com/emerg/topic531.Htm>. 16.

References

- Chaney, M.A. (1995):** Side effects of intrathecal and epidural opioids. *Can J. Anaesth.* 42: 891-903.
- Chung, F., (1995):** Recovery patterns and home readiness after ambulatory surgery. *Anesth Analg.* 80: 896-902.
- Comier, S.; Pickett S.; and Gallagher, J., (1992):** Comparison of nurses and family members perceived needs during post anesthesia care unit visits. *J Post Anesth Nurs.* 387:391.
- Conboy C.E., (1947):** A Recovery Room. *Am. J Nurs.* 47:686.
- Connors, A.F.; Speroff, T. and Dawson, N.V. (1996):** The effectiveness of right heart catheterization on the initial care of critically ill patients. *JAMA.* 276: 889.
- Cravero J, Surgenor S, and Whalen K (2000):** Emergence agitation in pediatric patients after sevoflurane anesthesia and no surgery: A comparison with halothane. *Pediatric Anaesth.* 10 (4): 419-24.
- Curran, J.E., and Grounds R.M., (1998) :** Ward versus intensive Care Management of High- risk Surgical Patients. *Br. J Surg.* 85 (7): 956-61.
- Dalen, J.E. and Bone, R.C. (1996):** Is it time pull the pulmonary artery catheter? *JAMA* 276: 916.
- DeFranco, M., (1990):** Planning the physical structure of the PACU. *Post anesthesia Care Unit.* P187. St Louis. CV Mosby,
- Dexter F., Macario A.; Manbery, P.; and Lubarsky, D. (1999):** labor savings bypassing the Phase I post- anesthesia care unit. Computer stimulation to assist, in Ambulatory Surgery Center Management. *Anesthesia Analgesia* (in press).
- Dexter, F., and Tinker J., (1995):** Analysis of Strategies to Decrease Post Anesthesia Costs. *Anesthesiology.* 82:94.

References

- Dickson, D.M.; Pringle, H.M.A. and Bamber, D.B. (1988):* A comparison of two anaesthetic techniques for day-case arthroscopy. *Anesthesia* 43: 470-473.
- Dienemann, J.; (1992) :* continuous Quality Improvement in Nursing Washington D.C., american Nurses Publishing.
- Doyle, J.D. (1997):* Physiology of hypoxia. *Anesthesia and Critical Care medicine.*
- Drain CB, Shipley SB (1979):* The recovery room. Philadelphia, WB. Saunders.
- Dunn E.F., and Shapp M.G., (1943) :* The recovery room, a war time economy. *Am. J Nurs.* 43:279.
- Egbert LD (1983):* Spinal Anesthesia for anro-rectal surgery, in *Anesthesia clin* 1: 811.
- Egbert, A.M.; Parks, L.H. and Short, L.M. (1990):* Randomized trial of postoperative patient-controlled analgesia Vs intramuscular narcotics in elderly men. *Arch Internal Med.* 150: 1897-1903.
- England MR (1999):* The changes in bispectral index during a hypovolemic cardiac arrest. *Anesthesiology.* 91 (6): 1947-9.
- Fan KT, Lee TH, Yu KL, Tang CS, Lu DV, Chen PY, and Soo LY() :* Influence of tramadol on emergence characteristics from sevoflurane anesthesia in pediatric ambulatory surgery. *Kaohsiung J Med Sci.* 16 (5): 255 -60.
- Feeley T.W., and Macario A., (2000):* The post anesthesia care unit. *Anesthesia.* Edited by Ronald D Miller, 5th ed. Chapter 68. 2302:2322. Churchill Livingstone. Philadelphia, Montreal.
- Figueroa M Jr. (1972):* "The post Anesthesia recovery score: A second look" *South Med. J.*

- Finch JS (1987):* Equipment and monitoring: Recovery room care, p25. Chicago, Year book Medical publishers,
- Forster ER, Palmer JL, Bedding AW and Smith JTL (1994):* Syrup of ipecacuanha-induced nausea and emesis is mediated by 5HT₃ receptors in man. *J Physiol (London)*;477:72.
- Frank, S.M.; Hesel, T.W.; El-Rahmany, H.K.; Tran, K.M. and Bamford, O.S. (2000):* Warmed humidified inspired oxygen accelerates postoperative rewarming. *J. Clin Anesth.* 12(4): 283-7.
- Frost EAM (ed) (1990):* Post Anesthesia care unit, p 187. St. Louis, CV Mosby.
- Frost EMA.; and Goldiner P.L., (1990):* Post anesthetic care. Appleton and Lange. Norwalk.
- Gallimo S.C., Hoile, R.W., Ingram G.S., and Sherry K.M.(1997):* The report of the national confidential inquiry into perioperative deaths 1994/95. London NCEPD.
- Gentil, B. (1995):* Enhancement of postoperative desaturation in heavy snorers. *Anesth Analg.* 81: 389-392.
- Gift, A.G.; Stanik, J. and Karpenick, J. (1995):* Oxygen saturation in postoperative patients at low-risk for hypoxemia. *Anesth Analg.* 80: 368.
- Goldstein, A.; Grimault, P.; Henique, A.; Keller, M.; Fortin, A. and Darai, E. (2000):* Prevention of postoperative pain by local anesthetic instillation after laparoscopic gynaecologic surgery: a placebo-controlled comparison of bupivacaine and ropivacaine *Anesth Analg.* 91(2): 403-7.
- Gravenstein, D. (1995):* For routine postoperative oxygen administration in the PACU. *J. Clinic Monit.* 11: 406.

- Greenberg, C. et al (1997):** "Medigant Hyperthermia the unknown killer"
Saturday evening post Non -Dec.
- Groudine, S.B.; Lumb, P.D. and Sandison, M.R. (1995):** Pressure support ventilation with the laryngeal mask airway: A method to manage sever reactive airway disease postoperatively. *Can J. Anaesth.* 42:34.
- Hahn RG (1988):** Ethanol monitoring of irrigating fluid absorption in transmethral postatic surgery, *Anesthesiology* 68: 867.
- Hardisty, R.M. and Weatherall, D.J. (eds) (1993):** Blood and its Disorders. 2nd edition. Blackwell Scientific Publications. Oxford.
- Harvey, A.M., Neurosurgical genius (1974):** Walter Edward Dandy. John Hopkins Med. J. 135:358.
- Hawkey CJC (1999):** Cox -2 inhibitors. *Lancet* 353: 307-14.
- Hickey, P.R. (1991):** Cardiac dysrhythmias in pediatric patients during anesthesia and the role of oximetry and capnography (ed). *Anesth Analg.* 73: 686-688. Chapter 38.
- Hind March:** Tests for psychomotor function during early and late recovery from anesthesia. In SK Kallar, J. G. Whitwam Outpatient anesthesia. Chapter 29. pp 44-57. The NetherLands: Medicom Europe.
- Hines, H.R., Barash, P.G.; and Watrous G., (1992):** Complications occurring in the post anesthesia care unit: A survey. *Anesth Analg.* 74:503.
- Hoffbrand, A.V. and Pettit, J.E. (1993):** Essential haematology. 3rd edition. Blackwell Scientific Pyblications. Oxford.
- Issioui, T et al., (2002):** The efficacy of premedication with celecoxib and acetaminophen in preventing pain after atolaryngologic surgery. *Anesth analg* 94: 1188-9.

- Jacobson, W.K., (1992):** Manual of post anesthesia Care. Saunders.
- Javin Vadam, C. Malek, L. Dupont, H. Marmuse, J. P. and Desmonts, J. M. (2000):** Postoperative recovery after desflurane, propofol or isoflurane anesthesia among morbidly obese patients: A prospective randomized study. *Anesth Analg.* 91(3).
- Johans TG (1995):** The cost of porfofol. *Anesth Analg* 80: 1248-53.
- Jollis, J.G. (1996):** Mayo Clinic proceeding. 71: 1016-7.
- Kalish, R.L.; Daley, J. and Duncan, C. (1995):** American Journal of Medical Quality. 10: 98-54.
- Kantor, G. (2001):** "Chapter 31-Anesthesiology". The medical Algorithms project: Release 8.0. h [ttp://www. Medal. Org/index. Html](http://www.Medal.Org/index.Html).
- Kirk. J. et al. (2001):** "Some clinically important drug interactions" pharmacy times. [http://www. Pharmacytines. Com](http://www.Pharmacytines.Com). July.
- Kissan, I. (1996):** Pre-emptive analgesia: why its effect is not always obvious? *Anesthesiology.* 84: 1015-9.
- Kortilla, K.; Nuotto, E.; Lichtor, J.L. and Rupanii, G. (1992):** Sedation and recovery of psychomotor function after intravenous administration of various doses of midazolam and diazepam. *Anesth Analg.* Chapter 29. 74: 265-271.
- Kovac, A.L. (2000):** Prevention and treatment of postoperative nausea and vomiting. *Drugs.* 59(2). 213-43.
- Lake C (1990):** Evoked. Potential. In, Lake C (ed). Clinical Monitoring. WB Saunders company. Philadelphia. USA. 757.
- Langer, R. (2001):** "Post operative nusea and vomiting" [http://anestit. Unipa it /gta/nausea](http://anestit.Unipa.it/gta/nausea). December 29.

References

- Lorlocker, T.T. and Heit, J.A. (1997):* Low molecular weight heparin: biochemistry, pharmacology, perioperative prophylaxis regimens and guidelines for regional anesthetic management. *Anesth Analg.* 85: 874-885.
- Lubarsky, D., Gan T., and Glass, P. (1996) :* Clinical outcomes and financial savings following a pharmaceutical cost containment programs in anesthesia practice guidelines. *Anesth Analg.* 82:285.
- Lubenow, T.R.; Ivankovich, A.D. and McCarthy, R.J. (1997):* Management of postoperative pain. *Clinical Anesthesia*. Edited by Paul, G. Bruce, F. cullen, Robert, K. Stoelting. Philadelphia. Lippincott-Raven. 1305-1338.
- Macario, A., Vitez, T., and Dunn B., (1995):* What Preoperative Care Really Cost? Analysis of Hospital costs and Charges for In-Patients surgical Care. *Anesthesiology.* 83:1138.
- Malviya, S.; Voepel- Lewis, T., Prochaska G, and Tait A.R. (2000):* Prolonged recovery and delayed side effects if sedation for diagnostic imaging studies in children. *Pediatrics*, 105 (3): E42, Mar. 2000.
- Manded, M E TAL. (2002):* University of pittsburg Department of anesthesiology/ CCM post Anesthesia care manual. <http://www.Pitt.Edu/~mandel/CVI.htm>.
- Marley RA and Molien B (1996):* Patient discharge from ambulatory setting *J Post Anesth Nurs* 11:39-49.
- Marshall SI, et al (1999):* Discharge criteria and complication after ambulatory surgery: *Anesth Analg* 88: 508-17.
- Mayer, G.S. and Eagle, K.A. (1992):* Patient-controlled analgesia masking pulmonary embolus in postoperative patients. *Crit Care Med.* 20: 1619-21.

References

- McConkey, P.P. (2000):** Postoperative pulmonary oedema: A case series and review. *Anesth Intensive Care*. 28(1): 72-6.
- McGalligan, P.A. (1998):** Hazards of hypoxemia. How to protect your patient from low oxygen levels. *Nursing CE Handbook*.
- Mebust WK, Holtgrewe HL, Cockette TK et al (1989):** Transurethral prostatectomy: Immediate and postoperative complications. 3.885 patients, *J urol* 141: 243.
- Mecca R., (1997) :** Postoperative Recovery. *Clinical Anesthesia*, Edited by Paul G. Barash, Bruce F. Cullen, Robert, K Stoelting, 3rd ed. Chapter 53, 1279-1301; Lippincott- Raven. Philadelphia, New York.
- Merck Manual for Diagnosis and Therapy. (2002):** <http://www.Merck.Com/pubs/mmanual>. February 20, 2002.
- Modified from Marshall S.L., and Chung, F. (1999):** Discharge criteria and complications after ambulatory surgery. *Anesth Analg*. 88:508-517.
- Moiniche S et al. (2003):** Nonsteroidal anti-inflammatory drugs and risk of operative site bleeding after tonsillectomy a quantitative review. *Anesth analg* 96 (1): 60.
- Moller J.T.; Johanessen N.W., and Espersen, K.; (1993):** Randomized evaluation of pulse oximetry in patients, II preoperative events and postoperative complications. *Anesthesiology*., 78:445.
- Moller, J.J. (1994):** Anesthesia related hypoxemia: The effect of pulse oximetry monitoring on perioperative events and postoperative complications. *Dan Med Bull*. 41: 489.
- Morgan, G.E., Jr., and Mikhail, S.M., (1995):** Post anesthesia care. *Clinical Anesthesiology*, 2nd edition. Chapter 49:793-803. Appleton and Lange. Los Angeles.

- Ng, A. et al. (2001):** "Gastroesophageal reflux and aspiration of gastric contents in onesthetic practice" *Anesth Analg.*
- Nightingale, F., (1863) :** notes on hospitals 3rd ed. London, Longman, Green, Longman, Roberts and Green.
- Nightingale, J.J. and Lewis, I.H. (1992):** Recovery from day-case anesthesia: Comparison of total I.V. anesthesia using propofol with an inhalational technique. *Br. J. Anesth.* Chapters 20, 22, 31, 45, 51. 68:356-359.
- Prowse M.A., and Lyne P.A., (2000):** Clinical effectiveness in the Post anesthesia care unit. How nursing knowledge contributes to achieving intended patient outcomes. *J. Adv. NURS.* 31 (5): 1115-24, May 2000.
- Raj, P.P. (1992):** Practical Management of Pain. 2nd Ed. Mosby Year Book.
- Rappase, R.; Egan, K.J. and Ross, K. (1996):** A multidimensional comparison of morphine and hydromorphone patient-controlled analgesia. *Anesth Analg.* 82: 1043.
- Reihmer, E. Grunditz, R. Giesecke, K. and Gustafsson, L.L. (2000):** Postoperative nausea and vomiting: efficiency of prophylactic ondansetron and droperidol in a randomized placebo-controlled study. *Eur. J. Anaesthesiol.* 17(3): 197-203.
- Reihmier, E.; Grunditz, R.; (2000) :** Postoperaive nausea and vomiting: efficacy of prophylactic ondansetron and droperidol in a randomized placebo-controlled study. *Eur J. Anaesthesiol:* 17 (3): 197-203. Mar 2000.
- Reihner, E.; Grunditz, R.; Giesecke, K. and Gustafsson, L. (2000):** Postoperative nausea and vomiting: efficiency of prophylactic ondansetron and droperidol in a randomized placebo-controlled study. *Eur. J. Anaesthesiol.* 17(3): 197-203.

References

- Rendy, L.B.; Ashburn, M. and Caplan, R.A. (1995):** Practice guidelines for acute pain management in the perioperative setting. *Anesthesiology*. 82: 1071-1081.
- Rennotte, M.T.; Baele, P. and Aubert, G. (1995):** Nasal continuous positive airway pressure in the perioperative management of patients with obstructive sleep apnea submitted to surgery. *Chest*. 107: 367.
- Rose, D.K.; Ciehn, M.M. and DeBoer, D.P. (1996):** *Anesthesiology*. 84: 772-781.
- Rosenberg MK, Bridge P, Brown M. Cost comparison (1994):** a desflurane versus a propofol based general anesthesia technique. *Anesth Analg*, 79-852-5.
- Rosenfeld, B.A. (1996):** Postoperative management strategies may obviate the need for most preoperative cardiac testing. *Anesthesiology*. 84: 1266-7.
- Rosow C, Manberg PJ (1998):** Bispectral index monitoring *Anesthesiology Clinics of North America. Ann Anaesth Pharmacol*. 2: 89-107.
- Sadasivan, S.; Shende, D. and Mandan, R. (2000):** Prophylactic ondansetron on prevention of postoperative nausea and vomiting following pediatric surgery: a dose response study. *Anesthesiology*. 92(4): 1035-42.
- Schindler E.; Benson, M., Junger, A.; Muller, M.; Sticher, J.; and Hemplemann- G.; (2000):** *Anesthesiol intensive Med Notfallmed Schmerzther. English Abstract* 35(6): 375-80, Jun. 2000.
- Schindler, E. Benson, M. Junger, A. Muller, M. Sticher, J. and Hemplemann, G. (2000):** *Anesthesiol Intensity Med Notfallmed Schmerzther. English Abstract*. 35(6): 375-80.

There are four stages of recovery after anesthesia.

Stage I: In the operating room.

Stage II: a- Phase I in PACU.

b- Phase II in Surgical ward.

The Aldrete Score System was developed for discharging patients from Phase I to Phase II. By fast track anesthesia, the patients can pass the Phase I (PACU) and transfer directly to Phase II (Surgical ward).

Stage III: Home readiness

Stage IV: Street fitness.

Many complications may occur in the post- anesthesia care unit that need prompt intervention. There may be respiratory complications, cardiovascular complications, nausea and vomiting, pain, bleeding, temperature changes agitation or delayed awakening.

- Scuderi, P. Wetchler, B. and Sung, Y.F. (1993):** Treatment of postoperative nausea and vomiting after outpatient surgery with the %-HT3 antagonist ondansetron. *Anesthesiology*. 78: 15.
- Sessler, D.I.; Moayeri, A. and Stoen, R. (1990):** Thermoregulatory vasoconstriction decreases cutaneous heat loss. *Anesthesiology*. 73: 656.
- Song, D.; (1997) :** Titration of volatile anesthetics using bispectral index facilitate recovery after ambulatory anesthesia. *Anesthesiology* 87:842-8.
- Sostmami, H.J.; Sostmann, H.; Crivossier, C. and Bricher, J. (1989):** Dose equivalence of midazolam and triazolam. A psychometric study based on flicker sensitivity, reaction time and digit symbol substitution test. *Eur, J. Clin Pharmacol*, chapter 29. 36: 181-187.
- Stefan Suttner, Joachin Boldt and Christian Schmielt (1990):** Cost analysis of target controlled infusion-Based anesthesia compared with standard anesthesisa regimens, quoted from *Anesth. Analg.* 88:77-82
- Steward, D. (1975):** "A simplified scoring system for the post operative recovery room" *Canadian Anesthesiology Society Journal*.
- Stoelting, R.K., and Miller R.D., (1994):** Post anesthesia care unit. *Basics of Anesthesia*. 3rd ed. Chapter 31: 425:441 churchill livingstone. New York, London, Madrid.
- Sujit K, and Pandit U.A., (1997):** Phases of the recovery period ambulatory Anesthesia and Surgery. Edited by Paul F. white. Chapter 28. 457:476. WB. Saunders Company Limited. London, Philadelphia, Tokyo.
- Sunderrajan S, Bauer JH, Vopat RL et al. (1984):** Post-trans, urchtral prostatic resection hyponatremic syndrom: case report and review of the literature, *Am J Kidney Dis* 4: 80.

- Tang J et al (2003):** Antiemetic prophylaxis for office based surgery are the 5. H T3 -receptor antagonists beneficial? *Anesthesiology* 98: 293-8.
- Tang J, et al (2001):** Fast-track office-based anesthesia: A comparison of propofol versus desflurane with anti-emetic prophylaxis in spontaneously breathing patients. *Anesth analg* 92: 95-9.
- Thornton and Newton DEF (1989):** The auditory response: a measure of depth of anaesthesia. *Ballier's clinic Anesth.* 3: 559.
- Thornton C (1991):** Evoked Potentials in anaesthesia. *Eur J Anaesth* 8: 89.
- Twersky, R.S., (1994):** The post anesthesia care unit and ambulatory care. *Ballier's Clin. Anesth.* 8(4): 873-96.
- Uezono S, Goto T, Terui K, Ichinose F, Ishiguro Y, Nakata Y, and Morita S (2000):** Emergence agitation after sevoflurane versus propofol in pediatric patients. *Anesth Analg*, 91 (3): 563-6.
- Vander Walt, J.H.; Webb, R.K. and Osborne, G.A. (1993):** The Australian incident monitoring study: Recovery room incidents in the first 200 incident reports. *Anaesth Intensive Care.* 21: 650.
- Vandermeulen, E.P.; Van Aken, H.; Vermeylen, J. (1994):** Anticoagulant and spinal-epidural anesthesia. *Anesth Analg.* 79: 1165-1177.
- Venable, C (2000):** "Standards for post. Anesthesia care" penn state milton hershey medical centre. *Anesthesiology intranet.* <http://discuss.hmc.psu.edu/intranet/handbook>.
- Vender J.S., and Speiss B.D., (1992):** Post anesthesia care. Saunders.
- Vernon JM, Lang E, Sebel PS, and Manberg P (1995):** Prediction of movement using bispectral electroencephalographic analysis during propofol/alfentanil anesthesia. *Anaesth Analg.* 80: 780-5.

References

- Waddow, J., Piccirillo, J., and Evers A., (1996):* Inappropriate length of stay in the post anesthesia care unit. What is it and how after does it occur? *Anesth Analg.* 82:5472.
- Wang GM, Greel DJ, and Wong KC (1989):* Transurethral resection of the prostate, serum glycine levels and ocular evoked potentials, *Anesthesiology* 70: 36.
- Warfield, C. A. and Kahn, C. H. (1995):* Acute Pain Management Programs in U. S. hospitals, and experiences and attitudes among U.S. adults. *Anesthesiology.* 83: 1090-4.
- Warfield, C.A. and Kahn, C.H. (1995):* Acute Pain management programs in U.S. hospitals and experiences and attitudes among U.S. adults. *Anesthesiology.* 83: 1090-4.
- Warfield C.A.; and Kahn C.H.; (1995):* Acute Pain, Management Programs in U.S. Hospital, and experiences and attitudes among U.S. adults . *anesthesiology.* 83:1090-4.
- Watcha MF, et al (2003):* Cost and effectiveness of rofecoxib, celecoxib and acetaminophen for preventing pain after. Ambulatory otolaryngologic surgery. *Anesth Analg* 96: 987-94.
- Watcha, M.F.; White, P.F. (1992):* Postoperative nausea and vomiting. *Anesthesiology.* 77: 162-84.
- White PF, et al. (1999):* New criteria for fast-tracking after out patient anesthesia: a comparison with the modified Aldrete's scoring system. *Anesth analg* 88: 1069-72.
- White, P.F. (1986):* Pharmacological and clinical aspects of preoperative medication. *Anesth Analg.* 65: 963-974.
- Wilson M (2000):* Giving post anesthesia care in the critical care unit. *Dimens Crit Care Nurs.* 19 (2): 38-43.

- Zacny, J.P.; Lichtor, J.L.; Flemming, D.; Coalson, D.W. and Thompson, W. (1994): A dose-response analysis of the subjective, psychomotor and physiological effects of intravenous morphine in healthy volunteers. J. Pharmacol Eexp. Ther. 268: 1-9. Chapter 29.*
- Zarate, E, et al. (2000): A comparison of the costs and efficacy of ondansetron versus dolasetron for antiemetic prophylaxis. Anesth analg 90: 1352-8.*
- Zuck D., Anesthetic and Postoperative Recovery Rooms. (1995) : some notes on their Early History. Anesthesia. 50:435.*