

CURRICULUM VITAE

PERSONAL INFORMATION

Name: Edward Carden
Date of Birth: July 7,1939
Place of Birth: Manchester, England
Nationality: British
Marital Status: Married

EDUCATION

High School: Manchester Grammar School
University: Cambridge England/M.A.1961

Medical School: Cambridge University England/M B: B. Chir: 1964, (M.D.)

INTERNSHIP

Whipps Cross Hospital Leytonstone, England
House Surgeon September 1964- March 1965

Plaistow Hospital London, England
House Physician April 1965- September 1965

RESIDENCY

St. Bartholomew's Hospital
Senior House Officer September 1, 1964- September 1966

University of British Columbia Vancouver, Canada
January 1, 1968- June 1969
July 1, 1970- December 31, 1970

FELLOWSHIP

Hyperbaric Research Fellow, University of British Columbia
July 1, 1969- June 30, 1970

LECTURES

Too numerous to list but of note:

American Society of Anesthesiology Refresher Course on Ventilators San Francisco 1974

Anesthesia for Micro Laryngeal Surgery delivered to the Australian Society of Anesthesiology in Adelaide 1972

Positive Pressure Ventilation with the Magill circuit Delivered to the British Anesthesia Research Society in Nottingham 1984

Testified Before the California State Senate regarding Reflex Sympathetic Dystrophy June 2004.

ACADEMIC APPOINTMENTS

Assistant Professor- University of North Carolina 1971-1974

Associate Professor- University of California Los Angeles, Westwood, California 1974-1977

Chief of Anesthesia- Wadsworth Veterans Hospital 1974-1976

Clinical Professor- University of Southern California, Los Angeles, California 1996-2013

ANESTHESIA RELATED INVENTIONS

The Micro-Vent Ventilator

The Carden Laryngoscopy Tube

The Carden Bronchoscopy Tube

The Carden CPAP Device

The Engstrom Carden Ventilator

The Carden Laser Laryngoscopy Tube

The Chin-Up

SOCIETY MEMBERSHIPS

American Society for Orthopedic Medicine

American Society of Anesthesiologists

International Anesthesia Research Society

International Society for Injection of the Spine

International Association for the Study of Pain

North American Cervicogenic Headache Society

American Society of Interventional Pain Physicians

HIGER QUALIFICATIONS AND DEGREES

MA: MB: B CHIR: 1964

Licentiate of the Royal College of Physicians of the United Kingdom 1965

Diploma of Anesthetics Faculty of Anesthetists Royal College of Surgeons of England January 1967

Educational Council for Foreign Medical Graduates
October 1966

L M C C (M.D.) (Canada) 1969

Fellow of the Royal College of Physicians of Canada 1971

Fellow of the American College of Anesthesiologist 1972

American Anesthesia Board 1972 by reciprocity

FELEX (M.D) 1973

SPEX 1993

Diplomat American Academy of Pain Management 1993

LICENCES

United Kingdom 1965

British Columbia 1969

District of Columbia 1973

California 1975 A26774

Nevada 1985

Oregon 1994

AWARDS

Second British Oxygen Corporation Prize in the Residents Competition of the Canadian Anesthetic Society 1971

C.A.S. Resident's Competition 2nd Place -1970

Academy of Pediatrics Scientific Exhibit 3rd Place – 1973

A.S.A. Meeting Gadget Fair 1st Place- 1974

LICENSING EXAMINATIONS

1965 E.C.F.M.G.

1970 L.M.C.C.

1973
1994

F.L.E.X.
S.P.E.X.

BNDD

AC 661 8497

Publications Attached.

PUBLICATIONS

- 1. Carden, E: A tube Supporting "Fork". Can. Anesth. Soc J. 15:505-6.1968.**
- 2. Carden, E: The Microvent Ventilator. Anesthesia 24:90-3.1969.**
- 3. Carden, E: A Ventilation System for an Intensive Care Unit. Can.Anesth.Soc.J.16:433-36.1969.**
- 4. Carden, E: Simple Portable Ventilator for Emergency Resuscitation. Anesthesiology 32:269-73.1970.**
- 5. Carden,E: Bernstein, M: Investigation of the Nine Most Commonly Used Resuscitation Bags. JAMA 212:589-92.1970.**
- 6. Carden, E: Hyperbaric Oxygen in Cyanide poisoning. Anesthesia 25:442-43.1970.**
- 7. Carden, E: A New Pressure Relief (Safety) Valve, A Special Unit Designed for Miniature Ventilators. Anesthesia 25:411-17.1970.**
- 8. Carden, E: Doll, W: A Doppler Flow Meter for Detecting Air and Other Emboli, incorporating a Simple Method of Screening against Interference. Anesthesiology 33:551-52.1970.**
- 9. Carden, E: Trapp, WG, Oulton, J: A new and Simple Method for Ventilating Patients Undergoing Bronchoscopy. Anesthesiology 33:454-58.1970.**
- 10. Carden, E: Oxygenation during Chest surgery in the Right Lateral Position in dogs. Can. Anesth. Soc. J. 18:110-15.1971.**
- 11. Carden, E: A new Pediatric Ventilator. Can. Anesth.Soc.J. 18:215-24.1971.**
- 12. Carden, E: A Modification to Increase the Versatility and Safety of the Manley Ventilator. Can.Anesth.Soc.J.18:675-80.1971.**

- 13.** Carden, E; Nelson, D: A New and Highly Efficient Circuit for Pediatric Anesth. Can. Anesth. Soc. J. 19:572-82. 1972.
- 14.** Carden, E: Positive Pressure Ventilation during Anesthesia for Bronchoscopy, a Laboratory Evaluation of Two Recent Advances. Anesth. Analg. (Cleve) 52:221. 1973.
- 15.** Carden, E: Letter, Ventilation with an Oxygen Injector for Suspension Laryngoscopy Under General Anesthesia. Anesth. Analg. (Cleve) 52:221. 1973.
- 16.** Carden, E; Crutchfield, W: Anesthesia for Microsurgery of the Larynx (A New Method). Can. Anesth. Soc. J. 20:378-89. 1973.
- 17.** Carden, E: A Modification of the Magill Circuit. Can. Anesth. Soc. J. 20:575-7. 1973.
- 18.** Carden, E; Burns, WW; McDevitt, NB, Carson, T: A Comparison of Venturi and side Arm Ventilation in Anesthesia for Bronchoscopy. Can. Anesth. Soc. J. 20:569-74. 1973.
- 19.** Carden, E; Schwesinger, WB: Further Advances in Bronchoscopic Anesthesia. Anesthesiology 36:551-55. 1973.
- 20.** Carden, E: Oxygenation during Chest Surgery in Dogs. Anesth. Intensive Care 1:248. 1973.
- 21.** Carden, E: A New Technique of Ventilation during Laryngeal Surgery. Anesth. Intensive Care 1:251. 1973.
- 22.** Carden, E; Ferguson, G: A New Technique for Micro Laryngeal Surgery in Infants/Laryngoscopy. 83:691-99. 1973.
- 23.** Carden, E; Levin, K; Steinback, RB: A New Simple Device for delivering CPPB in Infants. Can. Anesth. Soc. J. 21:110-13. 1974.
- 24.** Carden, E: Book Review. Anesthesiology 39:665-66. 1973.

- 25.** Carden, E: A Rational Choice of Ventilators, A.S.A. Re-fresher Course Lecture NO. 212.1973.
- 26.** Carden, E; Levin, K; Fisk, G; Vidyasaggar, D: A New method of Providing Continuous Positive Pressure Breathing in Infants. *Pediatrics*.53:757-69.1974.
- 27.** Carden, E; Ferguson, G; Crutchfield, W: A New Silicone Elastomer Tube for use during Microsurgery of the Larynx. *An. Otol. Rhino. Laryngeal*. 83:360-65.1974.
- 28.** Carden, E; West, HR: Further Advances in Anesthetic Techniques for Micro Laryngeal Surgery. *Anesth.Analg. (Cleve)* 53:584-87.1974.
- 29.** Carden, E; Levin, K: A New Simple Device for obtaining CPPB in Infants Suffering from Respiratory Distress Syndrome. *Anesthesiology Review*. 1:24-6.1974.
- 30.** Carden, E: Letter, The Doppler Flow Meter and the prevention of Interference. *Anesth.Analg. (Cleve)* 53:973-4.1974.
- 31.** Carden, E: Letter to the Editor. *Anesth. Intensive Care*. 2:189.1974.
- 32.** Carden, E: Recent Avances in Anesthesia for Bronchoscopy. *Ann. Otol. Rhino. Laryngeal*. 83:777-85.1974.
- 33.** Carden, E; Hughes, T: Evaluation of Manually Operated Self-Inflating Resuscitation Bags. *Aesth. Analg. (Cleve)* 54:133-38.1975.
- 34.** Carden, E: Letter, the Carden Tube. *Anesth. Anagl. (Cleve)* 54:345-46.1975.
- 35.** Carden, E; Steinback, RB: 1973 Assessment of Eight Adult Resuscitator Bags. *Respiratory Care*. 20:69-79.1975.
- 36.** Carden, E: Recent Improvements in Anesthetic Techniques for Use During Bronchoscopy. *Trans. Am. Broncho-Esophagological Assoc*. 166-74.1974.

- 37.** Carden, E; Galido, J: Foot Pedal Control for Jet Ventilation during Bronchoscopic and Micro Laryngeal Anesthesia. *Anesth. Analg. (Cleve)* 54:405-6.1975.
- 38.** Carden, E; Raj, PP: Special New Low Resistance to Flow tube and End Tracheal Tube Adapter for use during Fiber Optic Bronchoscopy. *Ann. Otol. Rhino.Laryngeal.*84:631-34.1975.
- 39.** Carden, E; Raj,PP: Special New Low Resistance to Flow Tube and End tracheal Tube Adapter for use during Fiber optic bronchoscopy. *Trans.Am. Broncho-Esophagological Assoc.*131-34.1975.
- 40.** Carden, E; Ferguson, GB: Large Tracheal Papilloma's; A difficult Anesthetic problem and an Apparent Cure. A Case Report.*Ann.Otol.Rhinol.Laryngol.*84:233-37.1975.
- 41.** Carden, E; Browder,P; fischer,N:Teflon injectionof the Vocal Cords under General Anesthesia, a new method.*Anesth.Analg. (Cleve)* 54:739-41.1975.
- 42.** Carden,E: Letter, Anesthesia for Microsurgery of the Larynx. *Anesth. Intensie Care* 3:267-68.1975.
- 43.** Carden, E; Lechtman, a; Calcaterra, TW: Pneumatocoele of the Larynx. A complication of Percutaneous Transtracheal Ventilation. *Anesth Analg. (Cleve)* 55:600-01.1975.
- 44.** Carden, E; Raj, PP: Letter, Fiber optic Bronchoscopy. *BR. J. Ansth.* 46:502.1976.
- 45.** Carden, E; Hamood, H; Becker, G: Percutaneous Jest Ventilation *Ann. Otol.Rhinoi.Laryngol.*85:652-55.1976.
- 46.** Carden, E; Hamood, H; Becker, G: Precutaneous Jest Ventilation.*Trans Of 1976 Bronchoesophagological soc.*

- 47.** Carden, E; Friedman, D: Further studies of Manually Operated Self-inflating resuscitation bags. *Anesth.Analg. (Cleve)* 56:202-06.1977.
- 48.** Carden, E; Becker,G; Hammod,H: An Improved Percutaneous Jetting System for sue during Micro laryngeal Operations. *Can.Anesth.Soc.J.*24:118-25.1977
- 49.** Carden, E; Raj,PP; Rosenblatt,R; Miller,K; Katz,RL: Dynamics of Local Anesthetic compounds in Regional Anesthesia. *Anesth. Analg.(Cleve)* 56:110-17.1977.
- 50.** Carden, E: Recent Improvements in techniques for General anesthesia for Bronchoscopy.*Chest* 73:697-700.1978.
- 51.** Carden, E; Bridges, BB; Takacs, FA: Introduction of Central Venous Pressure Catheters through Arm Veins with a High Success Rate. *Can.Anesth.Soc.J.*26:128-31.1979.
- 52.** Carden, E: Letter, Carden Tube. *Can.Anesth.Soc.J.*27:512.1980.
- 53.** Carden, E; Fletcher, IR; Healy, TEJ; Poole, TR: The MIE Carden Ventilator, A description and Laboratory Assessment.*Anesthesia.* 38:1082-89.1983.
- 54.** Carden, E: Chapter 9 (Anesthesia). *Alexander's Care of the patient in Surgery.* 7th edition. C.V.Mosby Co.1983:pp.131-39.
- 55.** Carden, E; Jetton,J; McCarthy, et al: A Malleabel Copper Tube with a Jetting System for laser surgery to the vocal cords. *Trans. Of Amer. Brocho-Esoph Assoc.* 131-133.1984.
- 56.** Carden, E; Healey,T: Positive Pressure Ventilation with a MagillCircuit *Trans of Meeting Anesth.Soc.of G.B. & I.*1981.
- 57.** Carden, E; Hungerford,Dorr,et al: *Journal of Video Orthopedics.* Vol 9, No 4, August 1994.
- 58.** Carden, E; Aranda, M: The Chin Up. *Anesth, Anal.*82:462-39.1996.

- 59.** Carden, E; Matias, E; Steen; This Effect of NAHCO₃ on the diffusion of lidocaine through the wall of the Endotracheal tube cuffs. Proceedings of 24th Central European Congress of Anesthesiology.1995.
- 60.** Carden, E; Matias, E; Steen,S: The diffusion of local anesthetic through Endotracheal tube cuffs proceedings of 23rd Congress of Scandinavia Society of Anesthesiologist. 1995.
- 61.** Carden, E; Stefcó, JM; Jobe, FW; Van-Wilde, R; Pink, M: Electro Myo Graphic Analysis of the Subscapularis Lift off Test, proceedings to International Congress of Shoulder Surgery 1995.
- 62.** Carden, E; Ori A: A New Test for Upper Extremity C.R.P.S.1 Pain Physician.
- 63.** Carden, E; Ori, A: Applied Cervical Spine Anatomy to Interscalene brachial Plexus Blocks. Pain Physician.2005;8;357-361.
- 64.** Carden, E: The Bidigital Compression Test for Confirming Epidural Placement. Pain Physician. 2006.
- 65.** Carden, E; Ori, A: A Modification Technique for performing Interscalene Blocks. Pain Physician. 2006;9:15:157-158.
- 66.** Carden, E: Positive Options for Reflex Sympathetic, Dystrophy (RSD). 2004. Hunter House 2004: 67-83 (Chapter4)
- 67.** Carden,E: Reflex Sympathetic Dystrophy for Orthopedists. Forgrace.org.2002.
- 68.** Carden,E; Orti A: Complications with the use of a #22 Toughy needle.