

DEPARTMENT OF ANESTHESIA & PERIOPERATIVE MEDICINE

University of Western Ontario Teaching Hospitals

**London Health Sciences Centre
St. Joseph's Health Care London**

ANNUAL REPORT
July 1st, 2002 – June 30th, 2003

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Vision and Mission Statement

The Vision and Mission of the Department of Anesthesia & Perioperative Medicine, London Health Sciences Centre and St. Joseph's Health Care London, University of Western Ontario is to be an internationally acclaimed academic department in anesthesia, pain and critical care. Also, to provide exemplary patient care and foster excellence in anesthesia delivery, research and education at the undergraduate, postgraduate levels and in continuing medical education at regional, national and international levels.

Chair/Chief Report

Davy Cheng, MD, MSc, FRCPC



The Department of Anesthesia & Perioperative Medicine is comprised of clinicians, educators, and researchers providing secondary, tertiary, and quaternary anesthesia and perioperative care. We serve the city of London with a population of 340,000 and a drawing area of 2 million people from Southwestern and Northern Ontario

The Department provides clinical support to 36-40 operating rooms/day at both LHSC (University and Victoria Campus), and SJHC London. We also provide the spectrum of medical care from conducting preoperative anesthesia assessment to performing the most advanced life-supporting techniques in all perioperative settings such as ambulatory surgery, subspecialty surgery, obstetric, pediatric care, out-of-OR interventional procedures, acute and chronic pain management, blood conservation management, postanesthetic care unit and intensive care units. The Department provides teaching and training to undergraduate and postgraduate trainees in anesthesia and allied health care fields both at UWO and Out-Reach Community Program. The Department is well

known for its clinical and research excellence in cardiac anesthesia, neuroanesthesia, transplantation, critical care, and pain medicine.

*I*n the past year (2002-2003), we have advanced forward and accomplished considerable with support from our faculty, institutional administration, and the Dean of the Faculty of Medicine and Dentistry. I would like to highlight below our achievements and changes from the past year:

Administrative

New recruitment strategy initiated by the Department includes retention and recruitment of recent UWO and Canadian graduates, Dr. P. Armstrong, Dr. J. McNamara, and Dr. L. Vonguyen. Dr. W. Akhtar was recruited into the residency re-entry program and Dr. R. Taneja was recruited and joined the Department through the academic IMG program. Dr. Su Ganapathy, who is internationally well known in acute pain and regional anesthesia, currently on leave at Duke University, North Carolina, will be returning to join the Department in September 2003.

Our clinical/research fellowship program continues to attract and expand positions in cardiac, neuroanesthesia, transplant, obstetric, regional anesthesia, pain, and thoracic/vascular anesthesia under the leadership of Dr. Rosemary Craen.

Alternate Funding Plan – Phase 1:

The Department entered into an agreement in June 2003 to participate in Phase 1 of the MOHLTC's Alternative Funding Plan including The University of Western Ontario, London Health Sciences Centre and St. Joseph's Health Care. This will provide a foundation for funding initiatives that can serve to maintain and enhance our capacity to meet our mission in clinical service, teaching and research.

The Department continues to contribute in key administrative roles at LHSC and SJHC. Dr. Ian Herrick is Chair of the LHSC Medical Advisory Committee, Dr. John Fuller is the Medical Director-Perioperative Care at SJHC, and Dr. Neal Badner is Medical Director of Preadmission Clinic, LHSC. The Department is also actively engaged in the citywide restructuring and clinical programs transfer for milestone 1 and 2 between LHSC/SJHC.

Clinical

Reorganization of a Citywide Department continues with academic priority programs (cardiac anesthesia, neuroanesthesia, acute and chronic pain, critical care, transplantation, obstetric, thoracic/vascular, pediatric, perioperative blood conservation). With the citywide commitment and devotion of the Site Chiefs (Dr. W. Dobkowski, Dr. M. Lampe, and Dr. J. Watson), the Department continues to integrate our clinical programs.

Education

The Postgraduate Education Program under the leadership of Dr. Dal Spadafora, continues to develop new initiatives and attracted over 100 residency applications this year. Residents are exposed to general and subspecialty rotations. In addition, SWOMEN (South Western Ontario Medical Education Network) offered rich experiences to 13 residents in various voluntary rotations at community hospitals in Windsor and St. Thomas.

Research

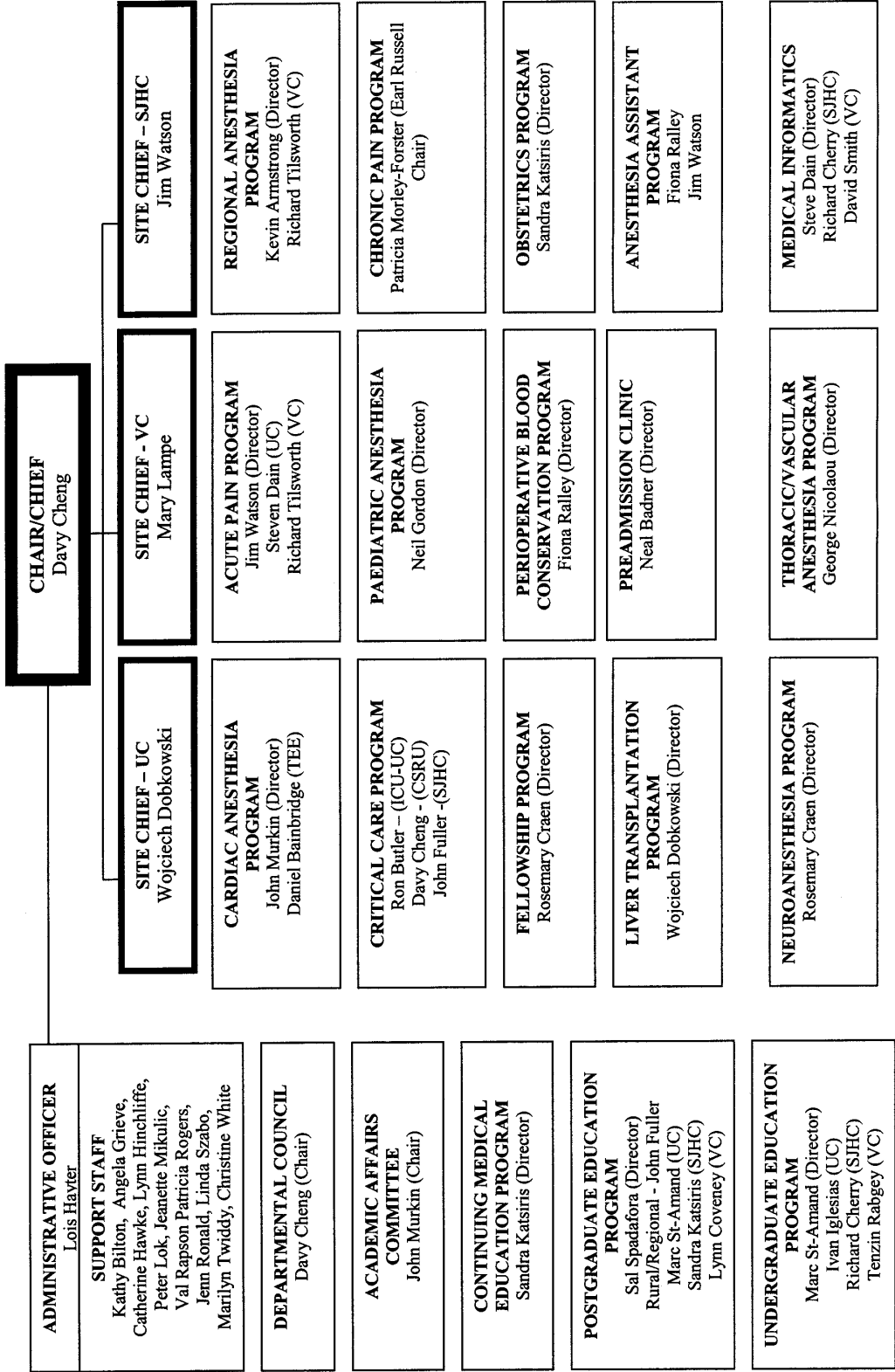
Research opportunities are available in a variety of areas spanning cardiac anesthesia, vascular/thoracic, neuroanesthesia, obstetrics, blood conservation, regional anesthesia, pain management, critical care, and medical informatics. The Department continues to be successful in securing peer reviewed grants from national and international agencies such as the Heart & Stroke Foundation, Medical Research Council, PSI Foundation, Canadian Standards Association and Standards Council of Canada, Canadian Institutes of Health Research, Natural Sciences and Engineering Research Council, and the National Institute of Health, together with non-peer reviewed industry grants.

DEPARTMENT OF ANESTHESIA & PERIOPERATIVE MEDICINE
THE UNIVERSITY OF WESTERN ONTARIO



ORGANIZATIONAL CHART

July 1st, 2002 - June 30th, 2003



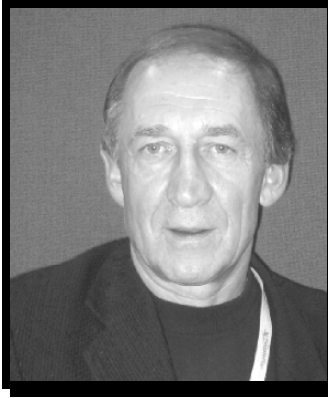
CLINICAL FELLOWS

Ayman Elfar	Cardiac Anesthesia
Christy Goossen	Vascular & Thoracic Anesthesia Cardiac Anesthesia Pain & Regional Anesthesia
Kathryn Searle	Cardiac Anesthesia
Shean Stacey	Neuroanesthesia Obstetric Anesthesia

RESIDENTS

PGY5:	PGY4	PGY3/4	PY3 Family Medicine
Wasim Akhtar	Brian Church	Ibrahim Hadi	Norman Mah
Asha Gopinathan	Katherine Fallon		Rebecca Mallin
Jeff Granton	George Kanellakos		James Menlove
Fawaz Habeeb	Kate Ower		
Lan Vonguyen			

PGY3	PGY2	PGY1/2	PGY1
Phillip Jones	Ahmad Abotaiiban	Michelle Gros	Hesham Al-Babtain
Stephen Lee	Geoff Dugas		Tim Davies
Tim Turkstra	Kevin Ewing		Nezar Khalifah
	El-Hadi Hussein		Lily Liang
	Jon Prychitko		Bobbi-Jo Morrell
	Martin Roos		Manjot Sandhu
			Allison Shaikh
			Kevin Teague
			Anna Toptchieva



During the past year the University Campus site has been very active in accomplishing the goals of our mission in clinical excellence, education and research. Clinically we have improved the standard of care in cardiac anesthesiology by further development and consolidation of the transesophageal echocardiography program. The robotic cardiac surgery program was restarted after two years with significant contributions by our anesthesiologists.

Educationally, we have improved teaching in the undergraduate and postgraduate level. Feedback from students, residents and fellows suggest that we have made significant progress. We have especially emphasized improvements in our fellowship program. Traditionally, many clinical research projects were started and some of these already completed.

Clinical services includes twelve operating rooms (cardiac surgery, neurosurgery, general surgery, orthopedics, sport medicine, plastic surgery and urology); diagnostic and therapeutic procedures in electrophysiology laboratory, neuroradiology and cardiac angiography, preadmission clinic, acute pain service and 24 hours coverage for liver transplantation.

The key academic programs are:

Cardiac Anesthesia (Dr. John Murkin)

Traditionally, one of the most active academic groups, not only in this department but also nationally and internationally. Over the past year a well-defined group of anesthesiologists has been developed with interests in beating heart surgery and robotic cardiac surgery. This program includes many innovative research projects.

Transesophageal Echocardiography (Dr. Daniel Bainbridge)

Dr. Bainbridge's hard work and commitment to this program has been very well recognized by all members of our cardiac group. During 2003 two of our colleagues obtained TEE certification. A TEE course (CME) for other members of this group has been established over the last year. Also, under the supervision of Dr. Bainbridge the research program related to TEE has been developed which we believe will further improve the standard of perioperative cardiac care.

Neuroanesthesia (Dr. Rosemary Craen)

This has been one of the best groups in our department for many years with a well-established international reputation. We have an excellent fellowship program which includes clinical research and participation in basic science research.

Liver Transplantation (Dr. Wojciech Dobkowski)

This year anesthesiologists from this group provided services to 98 liver transplantation surgeries (the highest number in Canada). They provide 24-hour coverage for this procedure. The group has been involved in international research projects and also provides a fellowship program.

Acute Pain Service (Dr. Steven Dain)

Under Dr. Dain's direction, acute pain service has become a well-developed academic program with an excellent database, research and innovative methods of teaching. Pain management education is provided for residents and fellows.

Medical Informatics (Dr. Steven Dain)

Dr. Dain is very well recognized internationally as an expert in standards for medical equipment. He is a member of many national and international committees and also created an interesting fellowship program in this field.

Undergraduate Education (Dr. Ivan Iglesias)

Dr. Iglesias has been one of the best teachers according to medical students. His commitment to undergraduate education is very well recognized. Over the last year our site improved this part of education based on the Dean's and students' opinions.

Postgraduate Education (Dr. Marc St-Amand)

During the last year we have noticed further development of postgraduate education. Subspecialty rotations like cardiac, neuroanesthesia, and ambulatory anesthesia improved according to residents. Excellent resident training in TEE is unique and well received by residents in cardiac anesthesia.

Fellowship Program (Dr. Rosemary Craen)

Over the last two years our fellowship program has been developing very dynamically. Dr. Craen's innovative approaches to this program from organizational and teaching points of view have made fellowships at our site more attractive. In the opinion of all our fellows, time spent in our department has met educational objectives. We provide fellowship programs in the subspecialties of cardiac, neuroanesthesia, transplantation anesthesia, clinical anesthesia, and regional anesthesia.

Site Chief Report, LHSC-Victoria Campus

Dr. Mary Lampe



Consultant anesthesiologists at Victoria Campus provide a wide range of anesthetic services at both the Westminster Site and South Street Site on a 24/7 basis. South Street continues to be the Trauma, Vascular, and Thoracic centre for the city. Westminster Site is the home to pediatric care, oncologic surgery, and level II obstetrics.

Preadmission assessment clinics are run daily in addition to daily acute pain rounds. Chronic pain management clinics run four days a week and Cancer Clinic services are provided.

The anesthesia-supported MRI and CT sedation day is run on Thursdays at the Westminster Site. Approximately 15 cases of a mixture of MRI and CTs are performed each week.

Rotations in pediatric, trauma, perioperative care, and thoracic/vascular programs are part of the Department's educational focus for anesthesia

residency education. Operating room and clinical teaching for medical students is also an educational focus.

Site Chief Report, St. Joseph's Health Care

Dr. Jim Watson



St. Joseph's Health Care is a major teaching facility within the University of Western Ontario, Department of Anesthesiology and Perioperative Medicine. St. Joseph's acts as the tertiary care obstetrical level III centre performing about 4,800 deliveries per year.

The surgical focus is on the Hand and Upper Limb Centre, Endourology, Ophthalmology, and ENT as well as General Surgery, Gynecology, Plastic Surgery and care of dental patients. Approximately 20,000 surgical cases are performed each year.

The major areas of subspecialty training are regional anesthesia, and obstetrics with chronic pain offered through the Earl Russell Multidisciplinary Pain Centre.

We are pleased to announce that we have a new staff member, Dr. Lan Vonguyen, who has joined our staff after completing his residency program in the UWO system. He continues to pursue his interest in regional anesthesia.

Dr. Su Ganapathy, widely known for her research and presentations on regional anesthesia and acute pain management is currently at Duke University. She will be returning to the UWO system this coming September and will continue to pursue her interests at St. Joseph's Health Centre.

Planned completion date for the new 10 operating rooms, ambulatory surgi-centre and radiologic and diagnostic facility is 2005. This new facility will provide St. Joseph's Health Care with a modern, well-equipped facility to carry the institution into the next century. St.

Joseph's Health Centre provides Fellowships in Obstetrical Anesthesia and Regional Anesthesia. The volumes of high-risk obstetrical patients and hand and upper limb patients provide a very fertile learning and research ground in these areas of subspecialty care. The new ambulatory surgi-centre is a major portion of the restructuring effort and will provide a firm foundation for future study and care of ambulatory patients.

Continuing Medical Education Program

Dr. Sandra Katsiris (Director)

*M*embers of the Department had the opportunity to attend a total of 11 Continuing Medical Education Grand Rounds presentations during the past year. The sessions covered a wide variety of topics. Four sessions were presented by affiliates of the University of Western. These included presentations from the Departments of Pharmacy Services, Anesthesia and Perioperative Medicine, Infectious Diseases, and Cardiovascular Surgery:

Dr. Janet E. Martin – Department of Pharmacy Services

Dr. Davy Cheng – Department of Anesthesia & Perioperative Medicine

Dr. Michael John – Department of Microbiology & Immunology

Dr. Richard Novick, Division of Cardiac Surgery

The other seven presentations were given by faculty participating in the Visiting Professorship Program. These included:

Dr. Jan Davies - University of Calgary

Dr. Richard Cooper - University of Toronto

Dr. A. Leland Albright - University of Pittsburgh

Dr. Homer Yang - McMaster University in Hamilton

Dr. Allen Finley- Dalhousie University in Halifax

Dr. Bernard McDonald - University of Ottawa

Dr. Joanne Douglas - University of British Columbia

All sessions met criteria for accreditation by the Royal College of Physicians and Surgeons of Canada's Maintenance of Certification Program.

Fellowship Program

Dr. Rosemary Craen (Director)



*F*ellowships in cardiac, neurosurgical, transplantation, regional, obstetrics, pain management, vascular & thoracic anesthesia and anesthesia informatics are offered each year at the London Health Sciences Center and St. Joseph's Health Care London. Generally fellowships are 12 months in duration but can be 6 months to 2 years.

Programs are individualized to meet the goals of successful applicants. Generally, clinical experience is the focus along with involvement in clinical research. Fellows spend approximately 4.0 days per week in clinical activities with 1.0 day per week protected for non-clinical activities, and participate in night call schedule (from home). Fellows are also encouraged to be actively involved in resident, medical student and nursing education, give didactic lectures and participate in anesthesia rounds and specialty conferences. Applications are usually considered 12-18 months prior to start date.

Postgraduate Education Program

Dr. Sal Spadafora (Director)



The past year has been a time of transition in the Anesthesia Residency Program. After nine years under the leadership of Dr. John Fuller, a new program director was appointed. Dr. Sal Spadafora of the Victoria Campus of LHSC continues the ongoing task of developing and coordinating our postgraduate education program.

Residency Numbers

Last year we had 30 residents in the FRCPC anesthesia program, and 2 PGY 3 family medicine residents. As well we hosted 18 residents from the Cardiac Surgery, Neuro Surgery, Critical Care, Royal College Emergency Medicine and CCFP Emergency Medicine programs. We had over one hundred applications for training in total and welcomed 7 Canadian Matching Service residents, one Family Medicine Anesthesia resident, as well as 3 residents from overseas.

Educational Activities

The program continues to offer high quality general and subspecialty rotations (pain, cardiac, neuro, ambulatory, regional, obstetric, thoracic vascular, pediatric, pre-admission clinic).

The following are a sampling of educational activities during the past year:

- PGY 1 Introductory Course
- Half day teaching (36 sessions)
- Faculty wide academic half days (8 sessions)
- Journal Clubs (5 meetings)
- UWO / McMaster Resident Research day (June 13/03)
- Midwestern Anesthesia Research Conference (March 14-16/03)
- Making a Mark Exam Prep (Feb 20-22/03)
- ASA/ABA in training examinations

- Metrics Assoc. Anesthesia Knowledge tests 0,1,6
- Annual Mock Oral Examinations
- Weekly site and citywide rounds

New Initiatives

A number of new educational initiatives were introduced this past year:

- Question of the week
- Trouble rounds (every Friday morning VC)
- Summer study time for PGY 3, 4, 5's
- PGY 5 RCPSC protected study time
- Mid year program review
- Acquisition of a Laerdal Airman Simulator for advanced airway skills
- Development of senior TEE elective experience

SWOMEN

The program offered highly structured, educationally rich experiences in the South Western Ontario Region under the South Western Ontario Medical Education Network (SWOMEN). SWOMEN is a joint project of the Faculty of Medicine and Dentistry at the University of Western Ontario and the Ministry of Health and Long Term Care of Ontario.

Last year we had 13 residents pursue voluntary rotations in Windsor, Stratford, and St. Thomas. These rotations included PGY 1 level pediatrics, emergency medicine, general internal medicine, and intermediate and senior level rotations in respirology, critical care and anesthesia. The site of the rotation is selected by the trainee. Financial support for these rotations is fully supported by the SWOMEN program (i.e. meals, travel, and accommodation).

Resident Research Summary

Hadi IA, Dasilva O et al. Opioid Use for Chronic Pain in Pregnancy: A Retrospective Review of Neonatal Effects. Pain Res Manag 8: Suppl. B-P6, Spring, 2003. Also presented at 2003 Midwest Anesthesiology Resident Conf, Chicago, Ill.

Dugas, G. Pheochromocytoma Diagnosed in Third Trimester of Pregnancy. Presented at 2003 McMaster-Western Resident Research Day and 2003 Midwest Anesthesiology Resident Conference.

Church BA. Platelet Transfusion: An Audit to Assess Appropriate Use. Presented at 2003 Midwest Anesthesiology Resident Conference, Chicago, Ill.

Dhir A. Heparin and Epidural Catheter: A Survey of Current Practice in Ontario. Presented at 2003 McMaster-Western Resident Research Day

Resident Research Awards

2003 Dr. Geoff Dugas PGY2.

1st Place in the Obstetrics Section, poster and oral presentation *Pheochromocytoma Diagnosed in the Third Trimester of Pregnancy. A Case Report and Review of Anesthetic Management.* Midwest Anesthesiology Residents Conference (MARC 2003), Chicago Illinois.

2003 Dr. Ibrahim Hadi, PGY 3 / 4.

2nd Place in the Pain Section, poster and oral presentation *Opioid use for Chronic Pain in Pregnancy. A Retrospective Review of Neonatal Effects.* Midwest Anesthesiology Residents Conference (MARC 2003), Chicago Illinois.

2003 Dr. Achal Dhir, Clinical Fellow.

2nd Prize, McMaster-Western Resident Research Day for "Heparin and epidural catheter: A survey of current practice in Ontario"

2003 Dr. Brian Church, PGY4.

3rd Prize, McMaster-Western Resident Research Day for "Platelet transfusion: An audit to assess appropriate use".

Undergraduate Education Program

Dr. Marc St-Amand (Director)



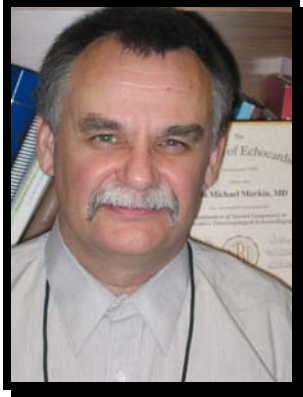
*T*he Undergraduate Anesthesia Program and its rotation continues to be a popular one for the medical students to select. All hospital sites are involved. The program consists of a two-week rotation with hands on experience and clinical teaching.

The students are provided with a text, which is given to them on loan for the duration of the elective. A workbook is also provided for them to direct their reading and intraoperative teaching. Four morning sessions are also given during their surgical rotation. The topics have been standardized across the city and efforts are being made to further standardize the rotation from site to site. At the conclusion of the rotation they hand in a case report and receive an exit oral exam. Their final evaluation is a summary of their performance in the operating room as well as their case report and oral exam.

Effective July 1st, 2003, the Undergraduate Education Program will be under the Directorship of Dr. Tony Vannelli.

Cardiac Anesthesia Program

Dr. John Murkin (Director)



Over the past year a major initiative was undertaken in order to upgrade the skills of cardiac anesthesiology consultants to familiarize them with TEE and incorporate TEE examination into routine clinical care. The series of introductory TEE lectures organized by Dr. Dan Bainbridge have continued and have been archived on the Departmental website by Dr. Steve Dain and Peter Lok.

Proof of the increasing commitment of LHSC anesthesiology to TEE was the attendance of a number of consultants at the SCA introductory and advanced courses in perioperative TEE held in San Diego in February. A specific goal of last year's efforts, this year saw the successful passing of the ASE certification examination in Perioperative TEE by 4 LHSC anesthesiology consultants, Drs. Badner, Iglesias, Murkin and Nicolaou. Another identified goal of last year has also been reached. A perioperative anesthesiology TEE service has just been established at University Campus providing a dedicated anesthesiology consultant to assist in TEE examinations for cardiac surgical cases. This represents a major commitment of both time and resources, but it is felt that the improvements in patient care as well as the enhanced opportunities for teaching and research fully justify this step. This development also substantially enhances our cardiac anesthesiology Fellowship program. Overall, from having essentially no perioperative TEE capabilities only 2 years ago, LHSC cardiac anesthesiology is now well on its way to the forefront of clinical care and continues as a leading Academic anesthesiology center.

Clinical research continues to be a very important and productive area for LHSC cardiac anesthesiology. Preliminary results from the prospective University Campus study examining the role of intraoperative cerebral oximetry in cardiac surgical patients undergoing CABG surgery has demonstrated improved patient outcomes with shorter length of stay associated with such patient centered neuromonitoring, a world first. This study is ongoing as is the CIHR-

funded study of central nervous system outcomes after conventional cardiopulmonary bypass versus beating heart techniques for coronary revascularization. Additionally, the CIHR-funded study of antifibrinolytics and blood product utilization in high-risk cardiac surgical patients is ongoing. Medtronic selected LHSC as the first Canadian site, second in the world, to employ the innovative 'mini-pump' CPB circuit with several clinical studies planned to examine various patient outcomes. The cardiac surgical robotics program is also increasing its activities with Dr. Dobkowski acting as the cardiac anesthesia coordinator for robotics.

Members of the cardiac anesthesiology group have also been well represented in several national and international multidisciplinary meetings focusing on the perioperative management of cardiac surgical patients. Dr. Murkin delivered an invited 'State-of -the-Art' lecture on "CNS Outcomes after Conventional or Beating Heart Surgery" at the November meeting of the American Heart Association. Also in November, Drs. Cheng and Dobkowski were invited speakers at the International Conference on Transplantation in Beijing.

The seventh annual "Outcomes' meeting was held in May in Key West, Florida, Proceedings of which were published in September 2003 issue of Heart Surgery Forum. The fourth annual Cardiac Team meeting was held in September in Orford, Quebec. Both of these multidisciplinary meetings were co-organized and chaired by Dr. Murkin, and were attended by members of both the local and national clinical communities.

The identified goals for the upcoming year continue to be the further acquisition of TEE skills by all cardiac anesthesiologists, as well as consolidation of the newly established perioperative TEE service. A major role for cardiac anesthesiology in the soon to be opened Cardiac Surgery Recovery Unit continues to be pursued. Efforts at the integration of the citywide cardiac anesthesiology group onto one site are ongoing pending the integration of all cardiac surgical services at the UC site. The commitment is to the incorporation of all qualified and interested members of the city wide cardiac group into an internationally-recognized cardiac anesthesiology section at LHSC dedicated to 'exemplary care, teaching and research' is unwavering.

Cardiac Surgery Recovery Unit

Dr. Davy Cheng (Director)

*W*ith the consolidation of the cardiac surgical services from LHSC-Victoria Campus to the LHSC-University Campus during milestone 1 in the restructuring process at LHSC/SJHC, the cardiac surgery program, chaired by Dr. Richard Novick, will have an annual surgical caseload of about 1,600 patients (including the robotic cardiac surgery). A new paradigm of a cardiac surgery recovery unit (CSRU, 16 beds) is being developed and directed by Dr. D. Cheng with the associate directors, Dr. Michael Sharpe and Dr. Richard Novick. This model of parallel care with the main intensive care unit will be staffed by cardiac anesthesia, cardiac surgery and critical care. A fast track cardiac surgery recovery pathway with the support by the nursing team headed by Ms. Lynda Robinson will be implemented to facilitate the flow and recovery of all cardiac surgical patients at LHSC. This CSRU will link the intraoperative cardiac anesthesia management and postoperative surgical ward recovery to provide the full spectrum of cardiac surgical patient care, including the education and research in these patients.

Critical Care Program

Dr. Ron Butler, ICU-UC



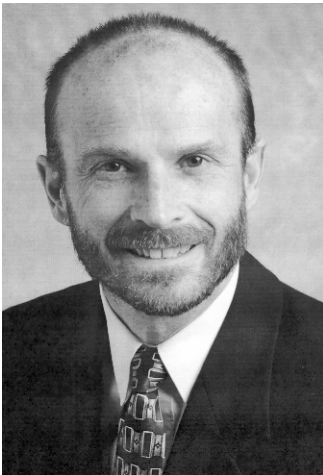
*T*he Critical Care Program at the University of Western Ontario is a multidisciplinary program that provides Royal College postgraduate training in Critical Care Medicine. Trainees gain experience caring for all types of critically ill patients in the Richard Ivey Critical Care Trauma Centre (30 beds) and the W.E. Spoerel Intensive Care Unit (26 beds) including trauma, neurosurgical, transplant and cardiac critically ill patients.

The program in critical care has a well-established educational program for trainees, which has been recognized for its excellence by the Royal

College of Physicians and Surgeons. The faculty within critical care are also involved in basic science and clinical research. Anesthesia intensivists are an integral part of the critical care faculty. The Program in Critical Care is currently undergoing rebuilding at the University Campus to update and expand the critical care capacity at this site. A new critical care unit has also been constructed at the Westminster campus of LHSC. Critical Care services for London will be consolidated at these two sites after the building is complete in 2004.

Critical Care Program

Dr. J. Fuller, ICU-SJHC



*T*he SJHC ICU is a 12-bed Medical/Surgical unit with a special interest in Obstetric Critical Care. The Medical Director is an Anesthesiologist, and the other 3 consultants are Emergency Medicine/Intensivist (1) and Internist/Intensivists (2).

The unit has been innovative in leading the country in the training of Nurse Practitioners, and including them in the clinical practice model. The unit has also been a leader in promoting and utilizing Shared Leadership. Educational opportunities are provided for Medical Students, RT students, Paramedic trainees, and other allied health trainees. Research is an ongoing focus, with participation in local and multicenter studies.

Liver Transplantation Program

Dr. Wojciech Dobkowski (Director)

*T*his department has maintained a liver transplantation anesthesia group for twenty-nine years. Presently, three anesthesiologists,

Wojciech Dobkowski, Fiona Ralley, and Tony Vannelli, provide anesthesia services throughout the entire year. The year we provided anesthesia for the highest number of liver transplants in Canada with a total of 98. We also participated in five combined liver-kidney transplantations, and three living-related liver transplantations. The anesthesiologists from this group are members of a multidisciplinary team in pretransplant assessment, qualification and preparation for transplant surgery.

A fellowship program has been well developed over the years. Fellows from this past year's program will join our department and the liver transplantation group in 2004.

We offer a visiting physician program and have had a visiting anesthesiologist from China. This year we continued our commitment to the University of Beijing transplantation program. Dr. Dobkowski visited the university and participated in a transplantation meeting.

This group has been involved in research projects including a multicentre study (Australia, Europe, and Canada) assessing the benefit and risk of Factor VII as an antifibrinolytic agent in liver transplantation. This project will be finalized in October. Also this year we reviewed mega-dose of Aprotinin in fulminant hepatitis patients undergoing liver transplantation and our results will be presented during the World Congress to be held in Paris in 2004. Two other projects should be finished in the upcoming year.

Neuroanesthesia Program

Dr. Rosemary Craen (Director)

*T*he aim of the Neuroanesthesia Fellowship Program is to provide advanced training to those individuals who either plan to enter academic anesthesiology with an emphasis in neurosurgical anesthesia or those who wish to practice in a setting that has a large number of neurosurgical procedures. Trainees gain knowledge not just through case experience, but also through an organized teaching program. The fellowship is designed to gain expertise in the following areas:

CLINICAL NEUROANESTHESIA:

Cerebrovascular surgery and Endovascular Treatment: we are an international referral centre for the management of patients with cerebral aneurysms and arteriovenous malformations.

Surgery for Intractable Epilepsy: While we have been doing this type of surgery for more than two decades, it is only recently that neurologists and neurosurgeons worldwide have come to realize the therapeutic potential of such surgery and this has resulted in epilepsy surgery becoming one of the “fastest growth areas” in neurosurgery. We are one of Canada’s two major national referral centres. The majority of these patients are done awake but sedated so that their speech and motor areas of the brain can be mapped prior to surgical excision.

Stereotactic Surgery: This is used for diagnostic biopsies, management of chronic pain and movement disorders, and the management of intractable epilepsy. Each of these requires different anesthetic approaches.

In addition to the above “special” areas, fellows will be exposed to a wide variety of the more usual neurosurgical procedures including endoscopic neurosurgery, craniotomies for tumours and hemifacial spasm, carotid endarterectomy, spinal instrumentation etc.

MONITORING/DIAGNOSTIC SKILLS

Fellows will have the opportunity to learn how to use Transcranial Doppler, Evoked Potential and EEG monitoring during surgery.

NON-ANESTHESIA EXPERIENCE:

Fellows will spend a brief period on the Epilepsy Service to have a better understanding of the total management of patients with epilepsy and to learn (much) more about the reading, use and potential of EEG monitoring.

As well, a similar brief period will be offered in the Neuroradiology Department to learn more about the indications and uses of diagnostic and interventional neuroradiology and to become much more facile with the interpretation of CT scans, MRI, etc.

RESEARCH/ACADEMIC ACTIVITIES:

The Department offers a variety of research opportunities that span the range from cell culture studies, in vitro vasculature, whole animal (brain blood flow, blood volume and ICP, experimental ischemia) and human (cerebral blood flow, evoked potentials, EEG, ICP, patient controlled sedation, and clinical outcome studies).

It is our expectation that each fellow will complete at least one research project taking it from conception through to completion. In addition, each fellow is expected to write at least one review article/book chapter. Further participation in research and writing activities is always welcome and encouraged.

Under supervision fellows will also review manuscripts submitted to a variety of anesthesia journals, abstracts submitted to anesthesia scientific meetings and grant applications. These activities together with the research activities outlined above will provide fellows with an excellent insiders view of the entire research process.

For fellows interested in medical education, we encourage them to take the 2-day or the 5-day course in "Teaching At The University Level" offered by our University. For those who anticipate that teaching will be a major component of their career, we advise our 30-week teaching course for medical educators.

Acute Pain Program

Dr. Jim Watson (Director)

The acute Pain Service at St. Joseph's Health Care has been well established for 15 years. We continue to provide care to 35-40 new patients each week and provide a variety of modalities, including PCA, epidural and continuous regional techniques. The citywide Acute Pain Task Force has standardized procedures and techniques across the city and produced self-directed teaching packages for nursing staff at all sites, which has served to standardize management of acute pain patients. At St. Joseph's Health Centre our nurse practitioner/clinical

nurse specialist, Kim Horrill has also helped to coordinate the education of staff and care of patients on the APS.

Recently, Dr. Kevin Armstrong and Ms. Horrill have established an ambulatory continuous regional anesthesia program. This allows placement of continuous regional anesthesia catheters in patients prior to discharge and allows for care of these patients at home postoperatively.

Dr. Kevin Armstrong and Dr. Jim Watson have taken part in satellite broadcasts of live demonstrations of regional blocks. The most recent was from London, Ontario to Victoria, BC during the 2002 Canadian Anesthesia Society Meeting. Blocks were performed on four patients in real time and broadcast live in interactive sessions with participants in Victoria. The Acute Pain Service at St. Joseph's Hospital has also taken part in national initiatives to improve and standardize care of patient and education of practitioners in the field of acute pain.

Perioperative Blood Conservation Program

Dr. Fiona Ralley (Director)



This program has continued to thrive and grow over the past twelve months. Since patient interviews were started in September 2003, 714 orthopedic patients and 77 vascular patients were assessed, with 23-26% meeting the criteria for blood conservation interventions. Of these 18.5% of the orthopedic and 5% of the vascular patients received EPREX and 26% of the orthopedic patients and 14% of the vascular patients undergoing preoperative autologous donation.

This resulted in a reduction in transfusion rate of 8-12% in orthopedic patients and 11% in vascular patients, with those being transfused receiving less number of units. Of note 31% of all orthopedic patients were found to be iron deficient and by simply starting iron therapy for 3-4 weeks preoperatively many had a significant increase in hemoglobin

concentration with no other therapy required. No vascular patients were iron deficient.

During the past year many members of the blood conservation program committee have been involved in several educational endeavors including: presenting at various regional conferences including Canadian Blood Services SW Ontario Regional Meeting and Anemia Awareness-Blood Safety and Supply, lectures to nursing staff and other related hospital staff, and presentations at anesthesia and surgical grand rounds.

As part of their off-service commitments, five anesthesia residents rotated through Blood Transfusion Services, each spending a month at a time. This gave rise to two collaborative research projects: 1) the comparison of platelet transfusion practices in patients undergoing coronary artery grafting surgery between University Campus and Victoria Campus. The data collected from this study was presented at the McMaster University Resident competition and Dr. Brian Church won third prize for his presentation. 2) audit of blood transfusion therapy in CABG patients at the LHSC. Data from this project is being presented to the cardiac surgeons with a view to implement new strategies to reduce transfusion rates in the near future. Both projects are being submitted for possible publication. A grant request is to be submitted for funding into assessing the impact of implementing a one-unit vs. the current standard of two-unit transfusion of concentrated red blood cells in orthopedic patients.

With the introduction of the new policy for Informed Consent for Blood Transfusion at LHSC coming into effect in October 2003, the Perioperative Blood Conservation Program will be offered to all surgical services on a by request basis. Each service is to be sent an updated list of transfusion rates for each surgical procedure and an algorithm as to whom, how and when to request the services of the perioperative blood conservation program. The impact this has on the blood conservation program will be reviewed after several months prior to presenting the program to the MAC for recognition as a hospital funded facility.

Preadmission Clinic

Dr. Neal Badner (Director)

*T*he Preadmission Clinic of the London Health Sciences Centre is a multidisciplinary unit including members of the Department of Anesthesia and Perioperative Medicine, Department of General Internal Medicine, Nursing, and other allied health professionals. When initiated in the early 1990s the goal was to preadmit 50% of patients. However, currently the preadmission rate is well over 95% of elective surgical patients encompassing complex patients undergoing difficult procedures at a busy tertiary care center. The department has recently revised the preoperative testing guidelines to minimize preoperative laboratory testing in conjunction with changes to the Canadian Anesthesiology Society guidelines and the American Society of Anesthesiology practice advisory. Future planning is underway to allow consolidation to two sites in conjunction with city-wide hospital restructuring.

Thoracic/Vascular Anesthesia Program

Dr. George Nicolaou (Director)

*T*he Vascular/Thoracic Program at the Victoria Campus is an extremely busy program, covering all types of elective and emergency cases, with the exception of lung transplantation. The endovascular stent program for abdominal and thoracic aneurysms is one of the best in North America. Our residency program encompasses four-week blocks of subspecialty training in Vascular/Thoracic anesthesia with clear objectives and daily assessments. The residents are encouraged to take part in clinical research. Our Fellowship program is well established with ongoing clinical research opportunities. Overall, the Vascular/Thoracic program at Victoria Campus has an incredible variety of interesting and complex cases. This offers excellent opportunities for Fellows and Residents to become proficient in Vascular/Thoracic anesthesia, both in a clinical and research setting.

Ambulatory Regional Anesthesia/Analgesia Program

Dr. Kevin Armstrong (Director)

Over the last academic year regional anesthesia continues to be an integral component of patient care at UWO. Regional anesthesia is a viable option for procedures amenable to this anesthetic technique. Regional analgesia techniques directed at postoperative pain management continue to improve. Many patients admitted to hospital post-operatively are done so for pain control. The patient with chronic pain for surgical procedure presents us with special challenges in which “regional” can play an important role in their post-operative management.

Resident training

Resident exposure to regional anesthesia occurs at all sites within the participating UWO hospitals. Each with their own contribution based on the surgical population at these sites. The volume of pediatric cases at the Westminster Campus provides an opportunity for regional anesthesia in this population. The thoracic, abdominal and vascular caseload at South Street Campus means that thoracic neuraxial techniques are performed routinely. Neuraxial techniques and some peripheral nerve block for minimally invasive cardiac surgery are utilized at the University Campus. Peripheral nerve block of the upper and lower limb is a main stay at St. Joseph’s Health Care (SJHC)). Regional anesthesia/analgesia in Obstetrics is extensive because of the sheer volume of clinical work within the city.

Home regional anesthesia

At SJHC we have continued the implementation of the ambulatory regional anesthesia/analgesia (ARAA) program. This was conceived as a natural extension of our use of regional analgesia on the acute pain service. Kevin Armstrong (MD) and clinical nurse specialist Kim Horrill have brought the main players to the table (anesthesia, surgery, physiotherapy, pharmacy and nursing from PACU, inpatient, pre-admission, patient education and home care), to develop a comprehensive approach to providing optimal pain management for appropriate patients, all in the home environment.

As SJHC moves to an ambulatory facility this appears to be a “reasonable approach”. In the current setting there is a reduction in hospital stay for these patients.

A presentation of the initial work and patient responses to the ARAA program was made by Kim in May.

Horrill K, Bettger-Hahn M, Armstrong K. Ambulatory Regional Anesthesia/Analgesia: A Quality Improvement Initiative, a poster presentation at the Canadian Pain Society, Toronto, 2003.

Publication

“Brachial plexus anesthesia compared to general anesthesia when a block room is available” by Kevin Armstrong and Richard Cherry was accepted for publication by the Canadian Journal of Anesthesia and is to be published in the January 2004 issue. This study reports the use of a “block room” to improve operating room efficiency when regional anesthesia is used in the setting that is present at SJHC. It also demonstrates the improved recovery phase of patients who received RA for upper limb surgery. These individuals spend on average 90 minutes less in the hospital compared to those who had a general anesthetic. Our block room, which has been functional since 1997, also provides an appropriate area for residents to learn regional anesthesia in a less hurried setting.

In progress

Data is currently being analysed with respect to the role regional anesthesia can play in persistent post operative pain. Proposed title, “The Impact of regional anesthesia on complex regional pain syndrome following wrist fracture”.

Fellows

We continue to offer fellowships in regional anesthesia at UWO. From January to July 2003, Dr. Christy Goosen a recent graduate of the UWO residency program was our regional anesthesia fellow. Starting in July 2003 Drs. Lisa Kenway and Waseem Ashraf will be our clinical fellows.

Developments

As of July 2003, Dr. Sugantha Ganapathy will replace Dr. K. Armstrong as program director of Regional anesthesia for the UWO program. The

upcoming year will also see introduction of ultra sound as an adjunct to peripheral nerve blockade.

We will also be moving to a City-wide Access/Integration of clinical practice for regional anesthesia. This will initially concentrate on peripheral nerve blockade of the upper and lower limb. The goal is to be:

- 1) able to meet the needs of the anesthesiologists interested in RA.
- 2) capable of providing a sustainable educational setting for RA.
- 3) capable of providing a sustainable delivery of RA.
- 4) capable of promoting the use of RA for operative and post-operative care.
- 5) capable of fostering an environment conducive to research.
- 6) able to increase the volume of RA done at this site (SJHC) and LHSC.

Chronic Pain Program

Dr. Patricia Morley-Forster (Earl Russell Chair)



*I*n 2003, a number of new education initiatives were undertaken to expose medical students, anesthesia residents and faculty to new ideas in pain management.

Citywide Interdisciplinary Pain Rounds were held monthly from September - June. Visiting Professors were invited to London to give presentations between July 2002 and June 2003:

Dr. Joel Katz, Psychology

Dr. Allen Finley, Anesthesiology

Dr. Arthur Lipman, Pharmacology

A Meds IV Selective Course "Pain and its Management in the New Millenium" was developed and taught in collaboration with departments of Clinical Neurological Sciences, Internal Medicine, Rehabilitation

Medicine, and Physiology and Pharmacology. One of the sessions focused on Acute Post-operative Pain Management, another on the Role of Nerve Blocks in Diagnosis and Treatment of Chronic Pain.

Anesthesia Residents' Core Curriculum "Evaluation of Patients with Chronic Pain" was presented in March 2003.

A Medical Student Academic Half-Day "Assessment and Management of Chronic Pain" took place in April 2003".

Ms. Kim Horrill received the prestigious Joan Garrison Award in October 2002 in honour of her contributions towards the development of Acute and Chronic Pain Programs at St. Joseph's Health Care.

Obstetrics Program

Dr. Sandra Katrisis (Director)

The volume of deliveries in the city is approximately 6000. This is split between the tertiary level care site - SJHC (60%) and the secondary level care site - LHSC-WC (40%). The current epidural rate is approximately 70%, and the c-section rate is approximately 20% (8% elective, 12% emergent). This equates to an extremely busy obstetrical anesthesia service in the city. In addition, we continue to see an increase in the number of parturients requiring advanced anesthesia care due to the acuity of their presenting conditions.

With the approach of milestone 1 (final date still unconfirmed) and loss of the intensive care unit and other support services at SJHC, there will be a transfer of some high-risk maternal care patients to LHSC-WC. The coordination of care of these patients will involve higher acuity than has previously been available at LHSC-WC.

The obstetrical anesthesia resident rotations continue to be well subscribed. There is an obstetrical anesthesia subspecialty resident each month of the year, and occasionally two residents have been assigned during a month when requests have exceeded the number of available months. To date, high delivery volumes have meant this does not dilute the resident's educational experience.

The obstetrical anesthesia fellowship program has accepted Dr. Lisa Kenway from Australia to participate for the upcoming year. She will begin her fellowship in August, and will be focusing on clinical obstetrical anesthesia.

Efforts are underway by Dr. Indu Singh to compile an obstetrical anesthesia database, to be used for research projects, as well as case tracking.

Anesthesia Assistant Program

Dr. Fiona Ralley (Director)

*T*his program is moving slowly through the necessary committees before any directives can be implemented. At present the medical directives have been passed by the P & T committee of LHSC and is awaiting acceptance by the same committee at SJHC before a joint proposal is submitted to both MACs. Once the medical directive has been passed by the MAC, the format for training criteria will be established so that enrollment of personnel into this program can start. It is anticipated that these assistants will be in place within the next twelve months.

Medical Informatics

Dr. Steven Dain (Director)



*I*nformatics is the scientific field that deals with the storage, retrieval, sharing, and optimal use of biomedical information, data, and knowledge for problem solving and decision-making. It touches on all basic and applied fields in biomedical science and is closely tied to modern information technologies, notably in the areas of computing and communication.

Its ultimate role of the division is to evaluate, implement and maintain an electronic preoperative anesthesia record-keeping system. Current activities include evaluation of the marketplace to see what record-keeping systems are available. Over the next 18 months we will participate in the design and implementation of the Cerner "Surginet" module which will be available November 2004.. This is necessary for the Cerner Anesthesia Record-keeping module, perhaps in 2005-6. Steven Dain is a member of the Canadian Anesthesiologist's Society Data Dictionary Taskforce, which is working with the American Patient Safety Foundation to develop a common ontology for coding of anesthesia data, so that data can be compared between centers.

Other projects include the UC Acute Pain Service data, which is approaching 30,000 patient visits recorded.

Dr. David Smith continues to provide excellent service and support of the CLAS Internet web-based anesthesiology conference and holiday scheduling software system for Victoria Campus and St. Joseph's. He is also providing a website for the 'question of the week' teaching session.

Dr. Steven Dain and Peter Lok continue to maintain and organize the departmental website <http://anesthesia.lhsc.on.ca> which also provides interactive streaming audio and video of visiting professors lectures and the early morning TEE teaching sessions.

Drs. Dain, Murkin, Bainbridge, Iglesias and Peter Lok are in the process of developing an Internet-based TEE Teaching Archive <http://anesthesia.lhsc.on.ca/mediagallery/skin1/> organized by cardiac findings. This will be available initially to faculty and residents within London. We have applied for an academic development fund grant to enhance the site and to provide on-line interactive quizzes.

FACULTY AWARDS

2003 - Dr. Daniel Bainbridge

Abbott Laboratories Award
Fellow Teacher of the Year



2003 - Dr. Dave Smith

Abbott Laboratories Award
2003 Resident Teacher of the Year.

2003 - Dr. Richard Cherry
Abbott Laboratories Award
Undergraduate Teacher of the Year

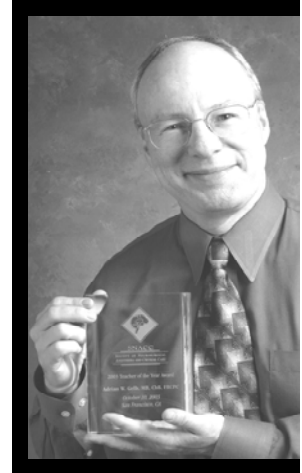
2003 - Dr. Steven Dain

UWO recipient of the Occupational
Health & Safety Employee Recognition
Award



2003 - Dr. Adrian Gelb

Society of Neurosurgical Anesthesia & Critical
Care
Teacher of the Year Award



2003 - Dr. Michael Sharpe

Best Poster. 23rd International Symposium
on Intensive Care and Emergency Medicine.
Brussels, Belgium – March 18-21, 2003.

2002 Dr. John Fuller

UWO recipient of the Canadian Association
of Medical Educators Certificate of Merit Award.

2002 Dr. Lois Champion

Best Curriculum on Earth” - Certificate
of Appreciation for excellence in
undergraduate medical education –
outstanding strengths in teaching Year 2
Cardiovascular System



Didactic Teaching and Education

Dr. Kevin Armstrong

Departmental classroom courses:

Regional anesthesia for the upper limb

Interdepartmental classroom courses:

Postoperative pain management and regional anesthesia.

Dr. Neal Badner

Postgraduate seminars:

Coronary artery disease, risk assessment and perioperative management

Local anesthetics

Undergraduate seminars:

Medical students - Regional anesthesia

Dental students - Intravenous anesthesia

Co-Director of Journal Club

Dr. Ron Butler

Departmental classroom courses:

ICU Junior Resident Lectures – Critical Care

1. Meds III Anesthesia Clerkship Lecture Series

2. CCTC Junior Resident Lectures – Critical Care

4. Lecturer, Anesthesia Core Lecture Series

Interdepartmental classroom courses:

Coordinator, Evidence Based Medicine Series – Critical Care Senior Residents

Coordinator, Department of Anesthesia Journal Club

Coordinator, Journal Club for Critical Care Senior Residents – LHSC, University Campus

Dr. Lois Champion

Postgraduate Education:

Junior Resident Seminar Series – Critical Care

Senior Resident Lectures Series – Critical Care

Coordinator, Practical Care Seminar Series – Senior Residents,
Program in Critical Care Medicine
Cardiovascular Surgery Resident Seminars (Academic Half Day)
Department of Surgery Academic Half Day for Surgery Residents
Faculty Wide Postgraduate Education Academic Half Day – Critical
Appraisal and Evidence Based Medicine
Department of Anesthesia Academic Half Day Seminars – Heart
Failure
Medicine Rounds

Undergraduate Education:

Undergraduate Education Clinical Methods and Patient Centered
Learning – Year 1 and 2

Supervisor – medical student electives in intensive care unit.

Pharmacology lectures:

antiarrhythmic therapy, adrenergic pharmacology, cholinergic
pharmacology and principles of toxicology; **Emergency Care
Week Yr 2** – PCL Learning Case of the Week: Human Error;
Integrated Medicine III – shock, cardiopulmonary resuscitation;
emergency week wrap-up.

Course Coordinator - Year 4 Transition Period Course – Legal, Ethical
and Organization Aspects of Medicine (CLEO).

Surgery Clerkship Seminar – respiratory failure.

Patient Centered Learning (PCL) – electronic tutor – Yr. 1.

PCL – small group tutor – Yr. 2.

Dr. Rosemary Craen

Anesthesia Resident Series lectures:

Anesthesia for Neuroradiology

CNS Anatomy

Dr. Steven Dain

UWO Postgraduate Medical Education for Residents:

Gas Monitoring, Capnometry, Pulse Oximetry and the Anesthesia Work
Station.

Organized by UWO Postgraduate Office for UWO Academic Half Day
Program:

Two lectures:

- .Health Informatics: Introduction to Medical Computing
- So, You Want to Present Rounds in Powerpoint? Learn How to Effectively Present a Powerpoint Presentation.

Dr. John Fuller

Airway Management, ICU Teaching Rounds, SJHC
Airway Management, ICU Teaching Rounds, SJHC
Oral Examiner, Making A Mark Anesthesia Course
Meeting Organizer, McMaster/UWO Research Day

Dr. Ivan Iglesias

Meds III Seminars:

- Conduct of general anesthesia with special reference to monitoring.
- Pre-anesthesia assessment and preparation of the patient.

Residents Lecture:

- Cardiac valve disease and non-cardiac surgery.

Dr. Trevor Lobb

Patient-Centered Learning, Undergraduate Medical Education Program
Trimester 2

Dr. P. Morley-Forster

Developed and taught Meds IV Selective Course "Pain and its Management in the New Millenium" in collaboration with Dr. Dwight Moulin

Acute Post-operative Pain Management (Meds IV). March 2003.

Role of Nerve Blocks in Diagnosis and Treatment of Chronic Pain (Meds IV). March, 2003.

Anesthesia Residents' Core Curriculum

Evaluation of Patients with Chronic Pain. March, 2003.

Anesthesia resident seminar: Evaluation of Patients with Chronic Pain, March, 2003

Medical Student Academic Half-Day: Assessment and Management of Chronic Pain, April 2003

Academic Half-Day

The Assessment and Management of Chronic Pain (Meds II). June, 2003.

Teaching ability ranked in the first quartile according to resident citywide evaluations of anesthesia faculty for 2003

Dr. John Murkin

University of Western Ontario Anesthesia Residency Academic Program:

Seminar: Complications in Cardiac Surgery.

Meds III Seminars:

Management of Blood Volume, Electrolytes and Acid Base Balance

Supervisor for Cardiac Anesthesia Observership:

Dr. Yong Shin Kim, St. Vincent's Hospital, Catholic University, Seoul, Korea.

Dr. Fiona Ralley

Lecture to Anesthesia Residents Wednesday afternoon sessions:

All you need to know about anesthesia for CABG but were afraid to ask.

Dr. Michael Sharpe

Postgraduate Education:

Junior Resident Seminar Series – Critical Care

Critical Care Grand Rounds

Senior Resident Teaching Sessions – Critical Care

Examiner:

Oral Exam for Senior Residents – Program in Critical Care Medicine

Oral Exam for Residents in Anesthesia

Mid-Level PhD Exam, Department of Medical Biophysics, UWO

Educational Materials Developed for Postgraduate Education:

Program in Critical Care Medicine, UWO Senior Resident Seminar Series

- 1) Ventilator Induced Lung Injury
- 2) New Modes of Septic Therapy

Program in Critical Care Medicine, UWO – Senior Resident Practical Sessions

- 1) Neuromuscular Blockade Part 1 (Pharmacology);
- 2) Neuromuscular Blockade Part 2 (Clinical Application)

Department Publications

Peer Reviewed Publications

Hagen SA, Kondyra AL, Grocott HP, El-Moalem H, **Bainbridge D**, Mathew JP, Newman MF, Reves JG, Schwinn DA, Kwatra MM. Cardiopulmonary bypass decreases G protein-coupled receptor kinase activity and expression in human peripheral blood mononuclear cells. *Anesthesiology* 98:343-48, 2003.

Cheng DCH, Wall C, Djaiani G, Peragallo RA, Carrol JA, Li C, Naylor CD. A randomized assessment of resource utilization in fast-track cardiac surgery one-year after hospital discharge. *Anesthesiology*. 98:651-7, 2003.

Mosa MM, Cheng DCH. Oxygen therapeutics (blood substitutes) in Cardiac Surgery. *Current Opinion in Anaesthesiology* 16:21-6, 2003.

Ott E, Nussmeier NA, Duke PC et al and the **(McSPI) Research Group (Cheng D)** (and the Ischemia Research and Education Foundation (IREF) Investigators. Efficacy and safety of the cyclooxygenase 2 inhibitors parecoxib and valdecoxib in patients undergoing coronary artery bypass surgery. *J Thorac Cardiovasc Surg*, 125:1481-92, 2003.

Dowd NP, Karski JM, **Cheng DCH**, Carroll JA, Lin Y, James RL, Butterworth J. Pharmacokinetics of Tranexamic Acid During Cardiopulmonary Bypass. *Anesthesiology*, 97:390-99, 2003.

Mangano DT for the **Multicenter Study of Perioperative Ischemia Research Group (Cheng D)**. Aspirin and mortality from coronary bypass surgery. *N Engl J Med* 347:1309-17, 2002. (Accompanied by an Editorial. Topol EJ. Aspirin with bypass surgery - from taboo to new standard of care. *N Engl J Med* 347:1359-60, 2002.)

Laffey JG, Boylan JF, **Cheng DCH**: The systemic inflammatory response to cardiac surgery-implications for anesthesiologist. *Anesthesiology*, 97:215-52 2002.

Dain S. Normal accidents: Human error and medical equipment design. *The Heart Surgery Forum* 2002;5(3):254-257.

Dain S. Current equipment alarm sounds: friend or foe? (Editorial). *Can J Anesth* 2003;50(3):209-214.

Bainbridge DT, Iglesias I, Dain S. TEE detection of paradoxical air emboli in a patient with a sinus venosus atrial septal defect. *The Heart Surgery Forum* 2003;6(4):207.

Dobkowski WB. Myocardial protection during minimally invasive cardiac surgery. *Seminars in Cardiothoracic and Vascular Anesthesia*. 6:319-324, 2002.

Van Aken H, **Gelb AW**. Future challenges for anaesthesia departments. Introduction. *Best Pract Res Clin Anaesthesiol*. Sep;16(3):200-08, 2002

Foell BT, **Gelb AW**. Cold comfort from tepid temperatures. *J Neurosurg Anesthesiol* Oct;14(4):277-8, 2002.

Gelb AW. What Consumers Expect. Editorial. *CARG News* (Cochrane Anaesthesia Review Group) May 6(1):2, 2003.

Gelb AW. Near Misses in Neuro-Anesthesia. Book Review *Can J Anesth* 50(1):97, 2003.

Gelb AW. Foreword. *Anesth & Analg* (Chinese edition) 10: 2002.

Hughson RL, Shoemaker JK, Topor ZL, Edwards MR, O'Leary DD, Lin DC, **Gelb AW**. Optimizing an LBNP Protocol to Test Cardiopulmonary and Arterial Baroreflex Control of Vascular Resistance. Life in Space for Life on Earth. Proceedings of the 8th European Symposium on Life Sciences Research in Space, Sweden. June 177, 2002.

Herrick IA. Cerebrovascular disease. *Current Opinion in Anesthesiology*. 16:337-342, 2002.

Murkin JM. Hemodynamic changes during cardiac manipulation in off-CPB surgery: Relevance in brain perfusion. *The Heart Surgery Forum* 5:221-224. 2002.

Murkin JM. A novel hemostatic agent: The potential role of recombinant activated factor VII (rFVIIa) in anesthetic practice. *Can J Anesth* 49:S21-26, 2002.

Murkin JM, Stump DA. Introduction Outcomes 2002. *The Heart Surgery Forum* 5(3):246. 2002.

Murkin JM, Stump DA. Management of the high-risk patient, the inflammatory response and beating heart surgery: The Outcomes Symposium. *Seminars in Cardiothorac Vasc Anesth* 6:285-286, 2002.

Murkin JM, Stump DA (Guest Editors). Introduction: Outcomes 2003. *The Heart Surgery Forum* 6:190, 2003.

Murkin JM. Inflammatory responses and CNS injury: Implications, prophylaxis and treatment. *The Heart Surgery Forum* 6:193-195, 2003.

Sharpe, MD, Parnes LS, Drover J., Harris C. Translaryngeal Tracheostomy: Experience of 340 Cases. *Laryngoscope* 113(3):530-6, 2003.

Sharpe MD, Young GB, Mirsattari S, Harris C. Prolonged Desflurane Administration for Refractory Status Epilepticus. *Anesthesiology* 97(1):261-264, 2002.

Book Editor

Gelb, AW, Van Aken H. Future Challenges for Anaesthesia Departments. Preface, Guest Editor. *Best Practice & Research, Bailliere's Clinical Anesthesiology*, 2002.

Book Chapters

Bainbridge D, Cheng D. Initial perioperative care of the cardiac surgical patient. *Sem Cardiothorac Vasc Anesth* 6:229-236, 2002.

Fabregas N, **Craen RA** Anaesthesia for minimally invasive neurosurgery. *Bailliere's Best Practice & Research Clinical Anesthesiology*, Volume 16(1): 81-93, 2002

Herrick IA. Occlusive cerebrovascular disease. In: Roizen MF, Fleisher LA, Editors. *Essence of Anesthesia Practice*, 2nd Edition, Orlando, WB Saunders Co., 2002.

Iglesias I, Murkin JM. Protection of the Brain During Cardiac Surgery (Chapter 23). *A Practical Approach to Cardiac Anesthesia* 3rd Edition. Editors: FA Hensley JR., DE Martin, GP Gravlee. Lippincott Williams & Wilkins pp 593-613, 2002.

Non-Peer Reviewed Publications

Craen RA. 2002 Recent Trends in Neurosurgical Anesthesia. 11th Asian Australasian Congress of Anesthesiologists, Kuala Lumpur, Malaysia. *Asean Journal of Anaesthesiology*, July; Vol 3 suppl: pp 89-92, 2002.

Craen RA, Stacey S. SNACC Bibliography on cerebral aneurysms and malformations October 2002.

Gelb AW. The view from here and why I went there, Guest Editorial. *European Academy of Anaesthesiology* 16: 4, 2002.

Gelb AW. Control of Cerebral Circulation. *ASA Annual Meeting Refresher Course Lectures*. 10:183, 2002.

Gelb AW. Drug Choices in Neuroanesthesia. *IARS Review Course Lectures*. Supplement to *Anesth & Analg* 33, 2003.

Granton JT, **Gelb AW**. Neuroprotection During Carotid Endarterectomy. Seminars in Cardiothoracic and Vascular Anesthesia, 6: 21-25, 2002.

Young GB, Bayliff C, Bruni J, Camfield P, Jones M, Lovell S, **Sharpe MD**. Antiepileptic Drug Therapy. Canadian Pharmacists Association, L36-40, 2002.

International Standard Publications

Dr. Steven Dain is Canadian Expert to the International Standards Organization (ISO) and the International Electrotechnical Commission (IEC) for the writing of standards for medical electrical equipment, and to the Canadian Standards Association (CSA) for the modification and adoption of these International standards.

CSA Z305.8-03 Medical Supply Units. Canadian Standards Association Z305.8-03: 1-30, January 2003.

Medical Electrical Equipment Part 2-12: Particular requirements for the safety of lung ventilators – critical care ventilators. IEC/ISO – National Standard of Canada CAN/CSA-C22.2 No. 60601-1-12:03: 1-41, April 2003.

Medical suction equipment – Part 1: Electrically powered suction equipment – safety requirements. ISO – National Standard of Canada CAN/CSA-Z10079-1-03:1-28, May 2003.

Medical suction equipment – Part 2: Manually powered suction equipment. ISO – National Standard of Canada CAN/CSA-Z10079-2-03: 1-13, May 2003.

Medical suction equipment – Part 3: Suction equipment powered from a vacuum or pressure source. ISO – National Standard of Canada CAN/CSA-Z10079-3-03:1-19. May 2003.

Anaesthetic and respiratory equipment – Tracheal tubes and connectors. ISO – National Standard of Canada CAN/CSA-Z5361-03: 1-23, May 2003.

Abstracts

Bainbridge D, Cheng DCH, Martin JE, Novick RJ. Off-pump versus on-pump coronary artery bypass surgery: A meta-analysis of clinical outcomes from randomized controlled trials. SCA 25th Annual Meeting & Workshops 2003. *Anesth Analg* 96(4S): SCA 100, 2003.

Bainbridge DT, Iglesias I, Dain S. TEE detection of paradoxical air emboli in a patient with a sinus venosus atrial septal defect. *The Heart Surgery Forum* 6(4):207, 2003.

Cheng DCH, Bainbridge D, Martin JE, Novick RJ. Off-pump coronary artery surgery versus percutaneous transluminal coronary angioplasty: A meta-analysis of clinical outcomes from randomized controlled trials. SCA 25th Annual Meeting & Workshops 2003. *Anesth Analg* 96(4S): SCA 76, 2003.

Shayan C, Carroll JA, Fedorko L, Karski JM, Poonawala H, Klein AA, Djaiani GN, **Cheng DCH.** Acupressure and prevention of postoperative nausea and vomiting after cardiac surgery: A prospective randomized trial. SCA 25th Annual Meeting & Workshops 2003. *Anesth Analg* 96(4S):SCA 84, 2003.

Iglesias I, Ralley F., Novick R., Murkin J., Development of a Predictive Index for Complications in Cardiac Surgery: Preliminary Report on Retrospective Observations. *Ann Thorac Surg* 73:S372. 2002.

Iglesias I, Murkin JM, Hachinski V, Silver B, Franc C, Peterson R, Adams SJ. Perioperative changes in DW-MRI in patients undergoing OPCAB or conventional CABG. *The Heart Surgery Forum* 5:270, 2002.

Iglesias I, Murkin JM, Bainbridge D, Adams S. Monitoring cerebral oxygen saturation significantly decreases postoperative length of stay: A prospective randomized blinded study. *The Heart Surgery Forum* 6(4):204, 2003.

Kim YS, **Murkin JM**. A comparison of heparin management test and activated coagulation time with anti-Xa heparin concentration during cardiac surgery. *The Heart Surgery Forum* 6:203, 2003.

Murkin JM, Menkis A, Adams SJ, MacKenzie R, Peterson R. Epi-aortic scanning significantly decreases intervention-related and total cerebral emboli. *The Heart Surgery Forum* 6:203, 2003.

Cheung AK, Schulz, V, **Morley-Forster PK**. Origins of Palliative Care and its Evolution in Canada. Royal College of Physicians and Surgeons of Canada, Abstracts 2002:35 (6);7(Faculty Supervisor)

Hadi IA, Dasilva O, Natale R, Boyd D, **Morley-Forster PK**. Opioid Use for Chronic Pain in Pregnancy: A Retrospective Review of Neonatal Effects; Midwest Anesthesia Residents Conference, Chicago, March 2003

Hadi IA, Dasilva O, Natale R, Boyd D, **Morley-Forster PK**. Opioid Use for Chronic Pain in Pregnancy. A retrospective Review of Neonatal Effects; Can Pain Society 2003, Toronto

Bateman RM, **Sharpe MD**, Ellis CG. Capillary ischemia and abnormal capillary O₂ flux during sepsis is not prevented by nitric oxide inhibition. Critical Care 23rd International Symposium on Intensive Care and Emergency Medicine. Brussels, Belgium. Crit Care Vol 7 Suppl 2, S25., p51, March 2003.

Piluk J, **Sharpe MD**. Use of anabolic steroid therapy in critically ill ICU patients. 23rd International Symposium on Intensive Care and Emergency Medicine. Brussels, Belgium. Crit Care Vol 7 Suppl 2, S2., p14, March 2003.

Invited Lectures/Visiting Professorships

Dr. Neal Badner

17th Annual Can-Am Meeting. *NSAIDs/COX2s What's the difference and does it matter?* Niagara Falls, Ontario. May 17, 2003.

A CME Event. *NSAIDs/COXIBs Is there a difference?* Sudbury, Ontario. May 28th, 2003.

Dr. Daniel Bainbridge

Outcomes 2003, Management of the High Risk Cardiac Surgical Patient Symposium. *TEE and Cardiopulmonary Bypass.* Key West, May, 2003.

Cardiac Anesthetists' Group Meeting. *Effect of Inhalational Anesthesia on Myocardial Protection.* London, Ontario, June 2003.

Cardiac Anesthetists' Group Meeting. *Effect of Inhalational Anesthesia on Myocardial Protection.* Hamilton, Ontario, June, 2003.

Dr. Ron Butler

Grand Rounds ICU. *Adverse Event Trigger Tool.* London Health Sciences Centre University Campus. London, Ontario. September 25, 2002.

Grand Rounds, CCTC. *Adverse Event Trigger Tool.* London Health Sciences Centre, University Campus, London, Ontario. October 4, 2002.

New Horizons in Critical Care & Emergency Medicine Symposium. *Critical Care Sedation.* Windsor, Ontario. May 30, 2003.

18th Annual Challenges in Critical Care Conference. *Acute Brain Failure: Delirium in the ICU.* The Best Western Lamplighter Inn. London, Ontario. June 6, 2003.

Dr. Lois Champion

Sepsis Symposium. *Pathophysiology and Management of Sepsis.* Sheraton Four Points Centre, London, Ontario. February 2003.

Dr. Davy Cheng

Department of Anesthesiology, Chao Yang Hospital, Beijing P.R. China. *Off-pump Cardiac Anesthesia and Robotic Cardiac Surgery*. August 22-27, 2002.

3rd Annual Cardiac Team Meeting. Montebello Quebec. Lecture: *Artificial Blood Substitutes: Where do we go from here? Hemolink: Safety, Efficacy and Application*. September 13-15, 2002.

Canadian Society of Cardiac Surgeons Post-Graduate Course 2002. Edmonton, Alberta. Lecture: *Anesthesia for Cardiac Surgery: Latest Techniques*. October 27, 2002.

Department of Anesthesiology and Critical Care, Harvard Medical School, Boston. Lecture: *Fast Track Cardiac Anesthesia & Surgery: Past, Present, Future*. October 30, 2002.

Department of Anesthesia & Perioperative Medicine, Division of Cardiac Surgery, Critical Care Program, London Health Sciences Center, UWO. Lecture: *Fast Track Cardiac Anesthesia & Surgery: Past, Present, Future*. November 27, 2002.

22nd Annual Symposium Clinical Update in Anesthesiology, Antigua, West Indies. Lecture: *Fast Track Cardiac Surgery: Cost-Containment*. January 19-25, 2003.

Abbott Anesthesiology Advisory Board Meeting, Montreal, Quebec. Lecture: *Clinical Use of Sevoflurane in Cardiac Anesthesiology*. March 22, 2003.

Anemia Institute for Research & Education, Blood Safety, Supply and Alternatives: A Townhall Series. London, Ontario. Lecture: *Update on Anemia Treatment Effectiveness; Blood Safety, Supply and Alternatives: Issues and Priorities*. April 22, 2003.

Society of Cardiovascular Anesthesiologists 25th Annual Meeting, Miami, Florida OPCAB Lecture Panel: *Anesthesia Advances: Physiology & Management of the displaced Heart*. April 27, 2003.

Society of Cardiovascular Anesthesiologists 25th Annual Meeting, Miami, Florida. PBL Lecture: *Transfusion Best Practice*. April 28, 2003.

The Key West Meeting 2003 Cardiac Outcomes, Key West, Florida.
Lecture: *Fast Track Cardiac Anesthesia: Update*. May 21-23, 2003.

European Association of Cardiothoracic Anesthesiologists Annual Meeting, Prague, Czech Republic. Lecture: *Fast Track Cardiac Anesthesia & Surgery: Past, Present, Future*. May 24-27, 2003.

Dr. R. Craen

American Society of Anesthesiologist's Annual Meeting, Orlando, USA
Panel on What's New in Neuroanesthesia: *Management of Posterior Fossa Craniotomy – An Update.*, October 16, 2002.

Making the Mark Toronto, Canada. *Essential Neuroanesthesia*.
February 21, 2003.

21st Annual Can-Am Clinical Anaesthesia Conference, Niagara Falls, Canada. *New Anesthetic Agents – Added Benefit or Just Added Cost?*.
May 17, 2003.

Mount Sinai School of Medicine, New York, USA. *What's New in Neuroanesthesia*. June 11, 2003.

Dr. Steven Dain

47th Annual Meeting OMA/CSA, University of Guelph, Guelph, Ontario.
Normal Accidents, Human Error and the High Risk System, September 21-22, 2002.

Faculty of Health Sciences, University of Western Ontario, London Ontario. *Introduction to Health Informatics Course*. February 2003.

University of Toronto Refresher Course Lecture, , Toronto, Ontario. *Risk Management in the O.R.* (canceled because of SARS). April 2003.

Dr. Adrian Gelb

Klinik für Anaesthesiologie, University of Heidelberg, Heidelberg, Germany. Lecture: *Continuing Challenges with Carotid Endarterectomy*.
September 2002.

Department of Anesthesiology, Hopital Pitie-Salpetriere, Paris, France.
Lectures: *Continuing Challenges with Carotid Endarterectomy* and *Propofol - My Research Romance*. September 2002.

American Society of Anesthesiologists Annual Meeting. Orlando, Florida. Refresher Course Lecture: *Control of the Cerebral Circulation*. October, 2002.

7th American Japanese Anesthesiology Congress, Kofu, Japan. Title: *Auditory Evoked Potentials for Depth of Anesthesia Monitoring*. October, 2002.

Department of Anesthesiology, Cornell University, New York. Lecture: *Managing ICP*. November 2002.

Department of Anesthesiology & Perioperative Care, University of California, San Francisco. Lecture: *Anesthetic Imprints on the Brain*. January 2003.

International Anesthesia Research Society 77th Clinical and Scientific Congress, New Orleans. Title: *Drug Choices for Neuroanesthesia*. March, 2003.

Dr. Pat Morley-Forster

Ontario Perianesthesia Nurses Association Meeting, October, "Acute Post-op Pain Management Challenges in the Chronic Pain Patient" October, 2002, Toronto

Lawson Health Research Institute Rehabilitation and Geriatric Care Research Day. London, Ontario. Keynote Address: *Peripheral Opioid Analgesia: Mechanisms and Clinical Implications*,. November, 2002.

Dr. John Murkin

American Heart Association 4th Scientific forum on Quality of Care and Outcomes Research in Cardiovascular Disease and Stroke, Washington, DC. Concurrent Session Speaker: *Stroke after CABG Surgery: Identification of Risks and Opportunities for Improvement*. October 13-14, 2002.

The Miriam Hospital, Providence RI. Lecture: Lectures (1) *Aprotinin, Inflammatory Processes and (2) Outcomes in Cardiac and Non-Cardiac Surgery*. December 3-4, 2002.

The International Society for Minimally Invasive Cardiac Surgery, First Annual ISMICS Winter Workshop, Escorts Heart Institute and Research Centre, New Delhi, India. Lecture: *Neurological Injury Following Cardiac Surgery*. December 12-15, 2002.

32nd Annual Meeting of German Society of Thoracic and Cardiovascular Surgery, Munster, Germany. Lecture: *CNS Injury After Cardiac Surgery: Mechanisms and Avoidance*. February 23-27, 2003.

University Clinic Munster, Munster, Germany. Lecture: *Neurologic outcome after cardiac surgery*. February 28, 2003.

9th Annual CIT Meeting (Cardiothoracic Techniques and Technologies) Ft. Lauderdale, Florida. Lecture: *Anesthesia and pain control for endoscopic surgery: an overview*. March 19, 2003.

25th Columbian Congress of Anesthesiology, Cartagena, Columbia. Lectures: (1) *Historical Considerations and Future of Bypass Cardiopulmonary Surgery*. (2) *Neurological Morbidity in Cardiac Surgery*. March 20-23, 2003.

Tongariro Cardiac Surgery Meeting, Tongariro, New Zealand. Lectures: (1) *Optimal Management of High CNS Risk Cardiac Surgery Patients*. (2) *Assessment and Management for Adult DHCA*. March 20-23, 2003.

University of Maryland, Division of Cardiac and Thoracic Surgery, Baltimore, MD. Lecture: *Attenuation of Neurologic Injury During Cardiac Surgery*. April 24, 2003.

Society of Cardiovascular Anesthesiologists 25th Annual Meeting, Miami Beach FL. Lectures: (1) *Novel Approaches to the Management of Perioperative Stroke*. (2) *Neurocognitive Dysfunction, Can We Make a Difference?* April 26-30, 2003.

University of Pittsburgh Medical Center. Orthopedic Surgery Grand Rounds. Lecture: *Serine protease inactivators, blood loss, and transfusion in orthopedic surgery*. , May 14, 2003.

St. Mary's/Duluth Clinic Health System, Anesthesiology Grand Rounds, Duluth MN. Lecture: *Serine Protease Inactivators, CNS Injury, and Cardiac Surgery*. June 10, 2003.

Conference Chair/Moderator

Dr. Davy Cheng

Chair, Emerging Issues and Treats session. Reviewing Canada's Commitment. A Blood System for the 21st Century. Anemia Institute for Research & Education. Toronto, Ontario. November 23, 2002.

Judge, Resident abstracts Pharmacology section, Midwest Anesthesiology Resident's Conference (MARC 2003), Chicago, Illinois. March 15, 2003.

Co-Moderator, Poster discussion session on CPB outcomes/perioperative management. Society of Cardiovascular Anesthesiologists 25th Annual Meeting. Miami, Florida. April 29, 2003.

Moderator, Pro/Con Debate: Is Sevoflurane beneficial in preconditioning and myocardial protection? Abbott Laboratories Ltd. London, ON. June 5, 2003.

Co-Chair, Cardiovascular Thoracic Section Symposium. Analgesia management of cardiothoracic patients. Canadian Anesthesiologists' Society 59th Annual Meeting. Ottawa, ON. June 21, 2003.

Dr. R. Craen.

Moderator in Poster Discussion Session. Canadian Anesthetists' Society Annual Meeting, Ottawa, Canada, June 23, 2003.

Dr. Steven Dain

Multi-Media Director, Cardiac Team Meeting, Montebello, Quebec, September 13-15, 2002.

Canadian Head of Delegation to ISO/IEC Technical Committee 121 Meeting, Berlin Germany, January 11-19, 2003.

Multi-Media Director, Outcomes 2003, Key West FL, May 21-25, 2003.

Dr. Adrian Gelb

Panel Member. Organ Donation, Neuroanesthesia. American Society of Anesthesiologists Annual Meeting. Orlando, Florida. October, 2002.

Dr. John Murkin

Organized and Chaired third annual three-day multidisciplinary Cardiac Team Meeting, “Minimizing Blood Loss and Exposure to Blood Products” held at Chateau Montebello, Quebec, September 13-15, 2002.

Organized and Chaired one-day symposium, “Management of the High Risk Cardiac Surgical Patient” in Key West, Florida, May 25, 2003.

Lecture: Neurological Monitoring During Cardiac Surgery: INVOS, brain Oxygenation and Outcomes.

Co-organized and Chaired the four-day Outcomes 2003 Key West Meeting, “Cardiac and Vascular Surgery: Neurobehavioral assessment, Physiological Monitoring and Cerebral Protective Strategies”, May 21-24, 2003. *Lecture: Inflammatory Responses and CNS Injury: Implications, Prophylaxis and Treatment.*

Dr. Fiona Ralley

Co-Chair PBLD Session. 25th Annual Meeting of the Society of Cardiovascular Anesthesiologists. Miami Beach, Florida. April 26-30, 2003.

Dr. Michael D. Sharpe

Chair, Sepsis Symposium, Sheraton Four Points Centre, London, Ontario – Feb. 15, 2003.

Workshop Leader, Meningococemia, Sepsis Symposium, Sheraton Four Points Centre, London, Ontario – Feb. 15, 2003.

*Delegate, 'Severe Brain Injury to Neurological Determination of Death',
A Canadian Forum, Vancouver, April 9-11, 2003*

Department Research Grants/Funding

Peer Reviewed Grants/Funding

Dr. Ron Butler

A cluster randomized trial to improve weaning and extubation from mechanical ventilation in community hospitals. 2 year funding, \$145,000.00 - Total Award. PSI Foundation. 2001-2002

Principal Investigator

Metoprolol after vascular surgery (renewal). 2 year funding, \$112,415.00 – Total Award. Heart and Stroke Foundation. 2001-2002

Principal Investigator

Dr. Davy Cheng

The effect of a merger on a two site cardiac surgery and anesthesia service on patient outcomes and institutional safety culture. \$12,500. Lawson Health Research Institute. Internal Research Fund (IRF). 2002-2004.

Co-Investigator with Dr. Richard Novick (PI)

Continuous Cell-Saver, Neurocognitive Outcome and Cardiac Surgery. \$199,995. Heart and Stroke Foundation of Ontario, Canada Grant #NA 4915.

Co-Investigator with Dr. George Djaiani (PI)

Dr. Rosemary Craen

*Hypothermia during Intracranial Aneurysm Surgery (IHAST2) University of Iowa Multicenter Trial.” Total Grant 6.5 million
National Institute of Health: 2000 - 2004.*

Site Investigator with Dr. Mike Todd (PI).

2 substudies: Myocardial ischemia during subarachnoid hemorrhage (funded by UCSF);

Dr. Steven Dain

Healthcare Policy Development. \$7,200. Canadian Standards Association and Standards Council of Canada

Dr. Adrian Gelb

Hypothermia during Intracranial Aneurysm Surgery (IHAST2). University of Iowa Multicentre trial. Total Grant: 6.5 million. National Institute of Health. 2000-2004. Dr. Mike Todd (PI). Advisory Committee Member.

A Multi-slice CT and MR CBF Mapping in the Assessment of Cerebral Ischemia. Total Grant \$98,585. Heart and Stroke Foundation of Ontario. 2000-2002. Co-Investigator with T-Y. Lee (PI).

Cardiovascular dynamics: from model to physiology. (\$103,975; \$102,210; \$98,925). December 2000 - November 2003. NSERC (Natural Sciences and Engineering Research Council) Co-Investigator with RL Hughson (PI).

Multi-slice CT and MR CBF perfusion mapping in thrombolytic treatment of stroke. (\$34,772; \$69,544; \$69,544; \$34,772). CIHR (Canadian Institutes of Health Research) 2001-2004. Co-Investigator with T-Y Lee (PI).

Dr. P. Morley-Forster

“Disentangling the placebo effect: The relative roles of pharmacology and response expectancy in sleep and pain”. \$1,200,000. CIHR (Canadian Institutes of Health Research) - New Emerging Teams Program. 2003 - 2008. Co-Investigator with L. Swartzman (PI).

Dr. John Murkin

“The influence of cardiopulmonary bypass on CNS outcome following coronary artery surgery”. \$181,187. MRC/CIHR (Medical Research Council/ Canadian Institutes of Health Research). 2000 - 2004.

Principal Investigator

Blood conservation using antifibrinolytics: a randomized trial in high risk cardiac surgery (BART). CHIR (Canadian Institutes of Health Research). Multicentre ongoing study.

Site Principal Investigator.

Non-Peer Reviewed Grants/Funding

Dr. Neal Badner

A retrospective review of Canadian patterns for the treatment of surgical pain. \$3,705. Innovus Research Inc. 2002

Site Principal Investigator.

Dr. Davy Cheng

Phase III comparison of Neutralase™ to Protamine in patients undergoing primary coronary artery bypass graft surgery. A North American, multicenter, randomized, double blind, placebo-controlled trial. US \$84,000. Biomarine Pharmaceutical Inc. 2003-2004.

Site Principal Investigator

Maintenance Anesthesia with Desflurane or Propofol for OPCAB Surgery. US \$90,000. Baxter Healthcare Corporation. 2002-2003.

Co-Principal Investigator with **Dr. D Bainbridge**

Dr. Rosemary Craen

The Addition of Hyperventilation to Mannitol Therapy Does not Further Reduce Raised Intracranial Pressure. \$,4,600.

London Health Sciences Centre, Internal Research Fund, 2000-02.

Site Principal Investigator

Co-Investigator **Dr. A.W. Gelb**

Dr. Pat Morley-Forster

Distraction vs pain-focusing strategies in response to an experimental pain stimulus: differences among empirically-derived personality clusters.

Shapiro AP, Jones K, Rollman G, Getty H, Carvadhho N, Teasell R, **Morley-Forster PK.**

Funded with Earl Russell Pain Program funds.

Effect of Stellate ganglion blocks on cerebral blood flow.

Foell B, **Morley-Forster PK**, Lee TY, Shoemaker K, Kozak R.

Funded with Earl Russell Pain Program Funds

Dr. John Murkin

Predictive value of brain oxygen saturation in cardiac surgery.

Somanetics - ongoing study.

Dr. Fiona Ralley

Clinical protocol for a double-blind multicenter study of the safety and efficacy of parecoxib/valdecoxib and placebo/valdecoxib compared to placebo for treatment of post-surgical pain in patients who have coronary bypass graft via median sternotomy. \$90,000.

Pfizer Pharmacia

Principal Investigator

Co-Investigators: **Dr. D. Cheng, Dr. N. Badner**

Dr. Michael D. Sharpe

Validation of the Datex-Ohmeda continuous EEG Module: Comparison with the standard, multi-channel EEG Monitor XL-TEK. \$45,988.00.

Datex-Ohmeda Division, Instrumentarium Corp., 2002-03.

Principal Investigator

A Phase 3, Randomized, Double-Blind, Comparative Study of Micafungin (FK463) versus Placebo in the preemptive antifungal therapy in patients in the intensive care unit. \$47,539.00. Fujisawa Healthcare Inc., 2002-2003

Principal Investigator

Research-in-Progress (non funded)

Dr. Ivan Iglesias

Temperature influence on neurologic outcome in cardiac surgery, prospective study in preparation.

ADH alterations during One Lung Ventilation, prospective study in preparation.

Influence of sternal infiltration with local anesthetics on the response to sternotomy in cardiac surgery, data collection to begin November 25 2002.

Endowment Funds

Dr. Allan and Eleanor Stewart Fund in Anesthesia \$50,000 endowed at Foundation Western

Dr. C. Allan Stewart was an anesthetist in London who graduated from UWO in 1933. He served his country during W.W. II with #10 Canadian General Hospital. He then practiced anesthesia in London until his retirement in December of 1971 from the Department of Anesthesia, University of Western Ontario where he held the rank of Honorary Lecturer. Dr. Stewart was also a member of the Executive Committee of Anaesthesia Associates of London, Canada at its inception.

The Dr. Allan and Eleanor Stewart Fund in Anesthesia was established to support the Department of Anesthesia & Perioperative Medicine in the Faculty of Medicine and Dentistry, The University of Western Ontario at \$2,500 annually. The funds will be used for the highest priority needs of the Department with allocation to rest with the Dean of the Faculty of Medicine & Dentistry.

Department of Anesthesia & Perioperative Medicine
Visiting Observers

Arvind Chaturved	August 6-18, 2002	Dept. of Neuroanesthesiology & Neuro Intensive Care All India Institute of Medical Sciences Ansari Nagar, New Delhi
Yong-Shin Kim	August 12, 2002 - July 2003	Department of Anesthesiology St. Vincent's Hospital, The Catholic University of Korea Suwon, South Korea
Peter Moran	October 4-11, .2002	Director of Anesthesia Princess Alexandra Hospital Brisbane, Australia
Zongbin Jiang	July 1 - January 20, 2003	Department of Anesthesiology The First Affiliated Hospital of Gungxi Medical University China

Department of Anesthesia & Perioperative Medicine Web Site

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<http://anesthesia.lhsc.on.ca/stjoes/sjhca.htm>

<http://www.lhsc.on.ca/>

UWO Faculty of Medicine

<http://www.med.uwo.ca/>

<http://www.med.uwo.ca/newfaculty/>