

RICOTTA ASSUMES THE CHAIR

*New Leadership Heralds
New Era for Surgery
At Stony Brook*

On June 1, 1997, John J. Ricotta, MD, joined our faculty as professor and chairman of surgery. Dr. Ricotta is a distinguished academic vascular surgeon who comes to us from SUNY-Buffalo, where he held the positions of professor of surgery and chief of vascular surgery, as well as chief of surgery at the Millard Fillmore Hospital.

His arrival at Stony Brook heralds a major new era of positive growth and development for our Department of Surgery and for our entire medical center.

Among his principal duties here, Dr. Ricotta is chief of surgery of Stony Brook's University Hospital and Medical Center and medical director of the newly formed Surgical Hospital. He also serves as director of our residency training programs in both general surgery and general vascular surgery.

Dr. Ricotta has received a number of awards and honors. Recently, he was named among our region's best in the 1996-97 edition of the *Best Doctors in America: Northeast Region*, and was recognized by *Good Housekeeping* this year as one of the top vascular surgeons in the country for his expertise in cerebrovascular disease.



Dr. John J. Ricotta (right) has recently been honored by peer review as one of "The Best Doctors in America, Northeast Region," and recognized by Good Housekeeping as one of the nation's top vascular surgeons for his expertise in cerebrovascular disease.

A graduate of Yale University, Dr. Ricotta received his MD from Johns Hopkins University in 1973. He completed his surgical residency training at the Johns Hopkins Hospital during which time he had advanced training in vascular surgery at Walter Reed Army Hospital and in thoracic surgery at Frenchay Hospital in Bristol, England.

Dr. Ricotta is a Fellow of the American College of Surgeons and a Diplomate of the American Board of

Surgery, and is board certified with special competency in vascular surgery.

Prior to his position in Buffalo, he was on the faculty of the University of Rochester where from 1980 to 1988 he was an assistant professor and later an associate professor. During his tenure at the University of Rochester, he was also the director of the kidney transplant program and the organ procurement organization.

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MICROVASCULAR FREE TISSUE TRANSFER IN HEAD AND NECK RECONSTRUCTION NOW PERFORMED

*Offering Immediate
Restoration of Form
And Function*



Dr. Maisie L. Shindo

With the recent recruitment of new faculty, the Department's Division of Otolaryngology-Head and Neck Surgery has established a state-of-the-art clinical program in microvascular free tissue transfer for head and neck reconstructive surgery. This new program, which offers patients considerable benefits over conventional reconstructive surgery, is made possible by the surgical expertise of Maisie L. Shindo, MD.

A nationally renowned specialist in head and neck reconstruction, Dr. Shindo joined our faculty in February as associate professor of surgery (otolaryngology-head and neck surgery) and director of head and neck oncology.

Dr. Shindo explains, "The goals in the surgical treatment of head and neck cancer are first to completely remove the tumor, and second to restore function and esthetics in a single-stage operation. While these goals were difficult to achieve a decade ago, it is now possible and is the new standard of care with the techniques of microvascular free tissue transfer."

Latest Applications Of Microvascular Free Tissue Transfer Technique In Head and Neck Surgery

- Reconstruction of mandible (jaw)
- Reconstruction of oral cavity soft tissue
- Reconstruction of pharynx (throat)
- Reconstruction of larynx (voice box)
- Reconstruction of esophagus
- Reconstruction of facial skin and muscles
- Restoration of facial movement in facial paralysis

Clinical studies show that primary reconstruction (performed at the same time as ablative surgery) is generally superior to delayed secondary reconstruction, because function is restored earlier, and less scarring and contracture occur.

The potential for restoration of sensation is an exciting new area in head and neck reconstruction, about which Dr. Shindo says, "In the past, removed tissue, such as tongue and pharynx, were replaced with adynamic, insensate tissue. We now have the capability to restore sensation to those sites by anastomosing appropriate sensory nerves."

What It Is

Defects in the head and neck resulting from the surgical removal of malignant tumors frequently lead to disabling functional and cosmetic deformities. In the past, extensive surgical therapy of this kind was restricted by the patient's inability to tolerate the resultant deformity and functional disability, such as speech and swallowing.

Now, with the advance of microvascular free tissue transfer which took place in the mid-1980s, the approach to head and neck reconstruction has been revolutionized.

Microvascular free tissue transfer is the technique of transferring the patient's own healthy tissue, such as bone and skin, together with its blood supply, and ensuring viability by anastomosing the vessels of the transferred tissue to blood vessels in the head and neck.

As revascularized segments of tissue, these free flaps are highly advantageous in the management of head and neck cancer because they can withstand radiotherapy, which many patients require postoperatively. In addition, they are preferable to other methods of reconstruction in patients who have undergone radiotherapy because these flaps have an especially reliable blood supply.

Prior to the use of free tissue transfer in head and neck reconstruction, large complex defects were routinely reconstructed with pedicled flaps, usually the pectoralis muscle and overlying chest skin.

There are several disadvantages and limitations of this old technique: 1) only a limited amount of soft tissue is available from the chest; 2) vascularized,

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**STONY
BROOK**

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RICOTTA CHAIRS DEPARTMENT

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Dr. Ricotta and his team of vascular surgeons provide specialized care for a wide variety of circulatory disorders, performing:

- Reconstructive aortic surgery for occlusive and aneurysmal diseases
- Thoracoabdominal surgery
- Surgery for stroke prevention
- Surgery for the treatment of hypertension
- Lower extremity vascular reconstruction
- Surgery for diabetic foot ulcers



Dr. John J. Ricotta

Contributing To His Profession

Dr. Ricotta is a member of numerous professional societies and has served as the president of the Rochester Vascular Society, the Western New York Vascular Society and as the secretary and recorder of the Eastern Vascular Society. He is a member of both the Stroke Council and the Council of Cardiothoracic and Vascular Disease of the American Heart Association.

He has been an examiner for the American Board of Surgery, and is on the Executive Committee for the Association of Program Directors in General Vascular Surgery.

An active academic as well as a practicing surgeon, Dr. Ricotta serves on the editorial board of four national and international journals in his specialty, is the author or co-author of more than 150 publications, and has received local, regional and national peer-reviewed funding for his work in cardiovascular disease.

For consultations/appointments with Dr. Ricotta, please call (516) 444-2565.

Introducing New Clinical Faculty

Stony Brook Surgical Associates, PC, of the Department of Surgery is very pleased to announce that the following physicians have joined their clinical practice. Profiles will appear in future issues of POST-OP.

Mouwafak Al-Rawi, MD
Otolaryngology-Head and Neck Surgery

Irvin B. Kruenkamp, MD
Cardiothoracic Surgery

Allison J. McLarty, MD
Cardiothoracic Surgery

Denise C. Monte, MD
Otolaryngology-Head and Neck Surgery

John J. Ricotta, MD
Vascular Surgery

Maisie L. Shindo, MD
Otolaryngology-Head and Neck Surgery

Thomas R. Smith, MD
Critical Care

HEAD AND NECK RECONSTRUCTION

(Continued from Page 2)

healthy bone is not available for mandible reconstruction; and 3) the patient is left with an unsightly defect (distorted ripple) at the donor site.

Microvascular free flaps are playing an increasingly larger role in the reconstruction of head and neck defects after ablative surgery, as they provide better functional and cosmetic results, thereby improving the quality of the patient's life.

Microvascular free tissue transfer offers the ability to three-dimensionally reconstruct a complex head and neck defect, such as one resulting from removal of jaw, tongue, floor of mouth, and soft palate. In such situations, a flap comprising appropriate tissue components (bone, skin, muscle) from the groin can be transferred to "custom fit" the head and neck defect.

The wide variety of potential donor sites in the body allows the reconstructive surgeon to accomplish this improved care in head and neck reconstruction. The selection of donor tissue is determined by the specific goals of the surgery, as different parts of the body offer different advantages.

Today, the absolute indications for performing microvascular free tissue transfer are for the reconstruction of anterior mandibular and floor-of-mouth defects, circumferential pharyngeal defects, and extensive soft-tissue and bony defects of the face. It can also be considered in many other situations as an alternative to the use of a regional flap.

Recent studies have shown that, compared to pedicled flap reconstruction, free flap reconstruction in the head and neck region yields superior functional and esthetic results, a lower wound complication rate, and less donor-site morbidity / deformity.

For consultations/appointments with Dr. Shindo, please call (516) 444-4122.

STONY BROOK PIONEERS SENTINEL NODE BIOPSY IN PATIENTS WITH BREAST CANCER

First Program of Its Kind on LI

Breast cancer is clearly the most common malignancy facing American women today, accounting nationally for an estimated 215,000 new cases in 1997. Despite an increasing incidence, mortality rates have remained the same. More women with breast cancer, in other words, are surviving in the face of the growing number of cases—most likely as a result of earlier detection, treatment improvements, and an overall increase in breast cancer awareness.

The hopeful news is that advances in the surgical treatment of this disease are still being made by physicians with the help of patients themselves.

New Clinical Trial Of Minimally-Invasive Breast Surgery Seeks Volunteers

Early this year, breast cancer physicians at Stony Brook's University Hospital and Medical Center began a clinical trial to confirm that sentinel node biopsy, an experimental minimally-invasive technique, is a safe and accurate alternative to full removal of the axillary nodes.

Dr. Brian J. O'Hea, assistant professor of surgery and director of the Carol M. Baldwin Breast Care Center, says, "We believe that sentinel node biopsy will indeed prove to be a safe and accurate alternative to full axillary surgery in patients with breast cancer, and thus will constitute an important new advance in breast cancer surgery."

Eligible patients with breast cancer have a sentinel node biopsy. In the current preliminary phase of this

study, all patients also have the remaining axillary nodes removed and analyzed, so that the accuracy of the sentinel node procedure can be validated.

Sentinel Node Biopsy

In recent decades, tremendous strides have been made in the surgical treatment of breast cancer. These strides have brought us from an era of radical surgery (mastectomy) towards more conservative procedures such as lumpectomy.

Now that the safety of breast conservation is no longer an issue, breast cancer researchers have shifted their focus to the treatment of the axillary (underarm) lymph nodes. These nodes, which are part of the lymphatic system that removes wastes from body tissue, may be the first place affected when breast cancer begins to spread.

Axillary nodes are routinely removed during breast cancer surgery in order to determine whether or not the cancer has spread to them. Additionally, removing the lymph nodes greatly reduces the chance of tumor recurrence in the underarm area. However, today as many as 70% of patients with breast cancer have nodes that are free of tumor.

Clearly, in these patients, removal of the axillary nodes provides no benefit at all. In fact, removal of the axillary nodes is occasionally associated with some scarring, numbness, and swelling of the arm.

This dilemma has led researchers to develop a less invasive procedure that would accurately determine whether or not the axillary nodes are affected by cancer, without having to

In Sentinel Node Biopsy . . .

A small amount of radioactive dye is injected into the breast around the site of the cancer. This test helps to determine the location of the lymph nodes that are draining the breast cancer. The amount of radioactivity is very small, less than that used for a chest x-ray or a bone scan, and generally does not cause any problems.

In the operating room, a small amount of blue dye is injected around the tumor as well. Both the blue dye and the radioactive dye travel towards the patient's underarm via lymph vessels, helping the surgeon to find that first draining lymph node.

Next, the surgeon uses a geiger counter-like device (probe) to locate and count the small amount of radioactivity injected earlier, which is now trapped in the first draining axillary lymph node (sentinel node). An incision is then made in that location, and the sentinel node, identified by both the gamma probe and the blue dye, is removed.

remove them all. The newly developed procedure is called sentinel node biopsy. It enables the surgeon to identify and remove the first draining lymph node—the "sentinel" node—in the underarm area. The status of this representative node is then used to assess the health of the remaining nodes.

Preliminary results from studies in Vermont and California are encouraging, and strongly suggest that sentinel node biopsy is an accurate predictor of whether or not the cancer has spread to these remaining nodes.

For more information about Stony Brook's clinical trial of sentinel node biopsy, please call the Carol M. Baldwin Breast Care Center at (516) 444-4550 to arrange for a consultation with one of our breast surgeons.

SIVARAMAN AND COLLEAGUES FIND CELL "SWITCH" IS "ON" IN BREAST CANCER

New Discovery Offers Hope

In April, Dr. Vimala S. Sivaraman, clinical assistant professor of surgery, and colleagues at University Hospital and Medical Center announced the exciting new discovery of a key abnormality thought to trigger human breast cancer. Their findings—detailed in the featured article in the April issue of *The Journal of Clinical Investigation*—could result in a fundamentally new approach to its diagnosis and treatment.

Specifically, the multidisciplinary team of researchers found that in patients with breast cancer, cancerous cells in the breast tissue have 5 to 20 times the amount of an enzyme called MAP kinase (mitogen-activated protein kinase) than in normal breast tissue cells.

In addition to Dr. Sivaraman, the research team includes Drs. Hsien-yu Wang (Physiology and Biophysics), Gerard Nuovo (Pathology), and Craig Malbon (Molecular Pharmacology) who directed the study.

Based on their findings, they conclude that elevated MAP kinase causes cells to proliferate, likely producing human breast cancer. By comparison, patients with benign fibrocystic breast disease or non-malignant fibroadenoma (fibrous tumor) show normal levels of MAP kinase, a level much lower than that found in patients with breast cancer.

The elevated level of MAP kinase in primary breast cancer was observed in lymph nodes of patients that went on to metastatic cancer.

Because abnormal cell growth is a major hallmark of cancer, scientists like the Stony Brook team are trying to

understand the steps needed to convert a normal cell into a cancer cell that does not stop growing. The discovery made at Stony Brook sheds important new light on this cancer process.

It is not yet clear whether having excess amounts of MAP kinase is a cause, or a result, of cancer.



Dr. Vimala S. Sivaraman

The Hope Offered

If the findings of the study reported by Dr. Sivaraman and colleagues are borne out, as expected, by independent research and evaluation, MAP kinase could become an important, easily-measured marker for detecting primary breast cancer. The elevated MAP kinase may be treatable by crafting a molecule to turn off the MAP kinase signal and delivering it to the cancerous cell.

MAP kinase is part of a growth-control pathway regulated by a gene called *ras*, which is known to often be damaged in cancer cells. The prediction has been that the MAP kinase pathway would be altered in tumor cells.

The new discovery concerning MAP kinase in breast cancer demonstrates the alteration in the *ras* path-

way, and thus identifies a viable target for new approaches to treatment.

At present, there are drugs in the very early phases of development that can inhibit this pathway. If the MAP kinase finding can be shown to be related to many cancer cases, new drugs could be very rapidly developed.

Treatment using anti-sense DNA/RNA approaches to target molecules for suppression—now experimental—has been developed at Stony Brook and is currently in early clinical trials for other human diseases. Such treatment for breast cancer would be subject to much further study and eventual FDA review, an application process that could progress rapidly in the next few years.

Stony Brook's researchers have also developed a technique that allows small numbers of metastatic cells to be detected in a patient's lymph nodes. If cells expressing excess MAP kinase are found in lymph nodes, it is a sign that the tumor is very dangerous.

Biologist Dawn Willis, scientific program director of the American Cancer Society, in Atlanta, says that she sees the Stony Brook discovery "as offering a very good way to detect metastatic cells in lymph nodes and possibly elsewhere in the body."

Testing for such cancer cells, she added, might be "very important as a prognostic tool for metastatic breast cancer." In addition to spotting tumors that are very dangerous, such tests also could tell which are less threatening, and thus spare women from taking "very, very aggressive treatments that they may not need."

RESEARCH UPDATE

The diverse and dynamic research conducted in the Department reflects our commitment to the University Hospital and Medical Center's mission to distinguish itself as an academic medical center that brings problems from the bedside to the laboratory and returns laboratory advances to the bedside—in addition to providing excellence in patient care, education, and community service.

What follows is a summary of selected research programs of some of our faculty.

Improving Heart Surgery

Dr. Irvin Krukenkamp (Division of Cardiothoracic Surgery) and his team, Glenn Gaudette and Hitoshi Hiromoto, have just set up their laboratory. The general aim of their research is to protect the heart of patients undergoing cardiac surgery, by improving current techniques as well as by developing new ones. In laboratory experiments, they have already found a way to reduce cardiac damage by 50% by infusing certain drugs into the heart.

Preventing Muscle Loss

An NIH-funded collaboration of Drs. Margaret McNurlan and Peter Garlick (Division of Surgical Research) with Dr. Marie Gelato of the Division of Endocrinology/Department of Medicine has recently yielded some important insights into the value of growth hormone treatment to enhance the recovery of muscle in wasting diseases.

Improving Cancer Surgery

The National Cancer Institute in collaboration with the Office of Dietary Supplements (NIH) has recently awarded a grant to Dr. Garlick to study the metabolic implications of dietary supplements of arginine, which is an amino acid found in body protein.

Studies have suggested that it may improve recovery from surgery and inhibit tumor growth. His research aims to determine which types of patients would possibly benefit from postoperative arginine supplements, as he has found that it might stimulate, rather than inhibit, the growth of some tumors.

Preserving Hearing In Inner Ear Surgery

Surgery of the inner ear with in neurotology. So far this type of surgery has been suitable only for very selected cases. Dr. Eric Smouha (Division of Otolaryngology-Head and Neck Surgery) is doing basic research to understand how to routinely preserve hearing after surgery of the inner ear, so that new operations might be developed for removing skull base tumors and for treating vertigo. He has already identified certain surgical manipulations that effectively preserve hearing.

Ensuring Transplant Success

Drs. Kazimierz Malinowski and Wayne Waltzer (Division of Transplantation) are testing the ability of genistein to inhibit mitogen-, alloantigen-, and xenoantigen-induced proliferative responses in normal human lymphocytes. They have shown that this naturally occurring isoflavone modulate the initiation of lymphocyte proliferation and the transition of cells through the cell cycle. Genistein, therefore, may hold significant potential as a novel immunosuppressant.

The Department of Surgery is also involved in a wide range of other research endeavors in humans, animals and cells. These include the award of a substantial grant by NIH to

Recent Awards of Research Grants to Our Faculty

Dr. Peter Garlick

■ Metabolic implications of dietary arginine supplements. National Cancer Institute in collaboration with the Office of Dietary Supplements (National Institutes of Health) \$100,000

Dr. Subir Maitra

■ Hemorrhagic shock effect on Glu-6-Pase gene expression. National Institute of General Medical Sciences \$522,312

■ Regulation of glucose-6-phosphatase gene expression in hemorrhagic shock. Office of the Dean/ University Hospital and Medical Center \$6,000

Dr. Subir Maitra (Division of Trauma/ Critical Care) to study the effect of hemorrhagic shock on the expression of the glucose-6-phosphatase gene.

Among other projects are a study of the control of muscle protein synthesis by insulin and amino acids (Dr. McNurlan) and immunomodulation during cardiopulmonary bypass (Dr. Thomas Bilfinger, Division of Cardiothoracic Surgery). Dr. Vimala Sivaraman is currently doing major work in breast cancer (see page 5), and Dr. Brian O'Hea is conducting a clinical trial of a

Bringing problems from the bedside to the laboratory and returning laboratory advances to the bedside

promising technique to improve breast cancer surgery (see page 4).

Progress in these and other research activities of

the Department will be described in more detail in future issues of POST-OP.

RAPAPORT RECEIVES FOUNDERS AWARD OF INTERNATIONAL SOCIETY FOR ORGAN SHARING

On July 11, Felix T. Rapaport, MD, SUNY distinguished professor (surgery), was one of four recipients of the first Founders Award of the International Society for Organ Sharing. This honor was bestowed upon Dr. Rapaport for "his unending dedication to the Society and his tireless support of transplantation medicine." The presentation of the award took place during Transplantation Congress Week in Washington, DC. The award citation highlights Dr. Rapaport's numerous scientific and clinical contributions to transplantation. Dr. Rapaport is the honorary president and co-founder of the International Society for Organ Sharing. The three other recipients of the Founders Award—also distinguished contributors to the Society and to transplantation medicine—are Drs. Raffaello Cortesini, Thomas E. Starzl, and Luis H. Toledo-Pereyra.

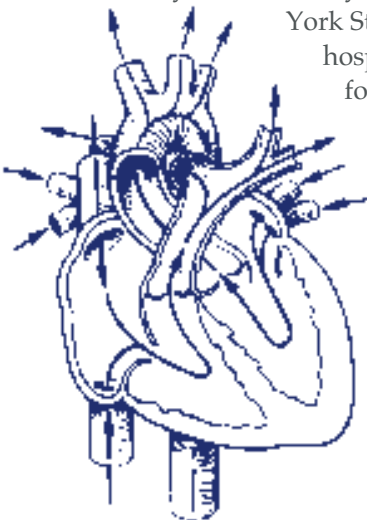


Dr. Felix T. Rapaport

The citation concludes: "The very diversity of Rapaport's contributions may have obscured recognition of their individual importance. That is like saying that it is easier to watch the stars than to gaze at the sun."

CARDIAC SURGERY PROGRAM RECEIVES HIGH RANKING

In September, University Hospital and Medical Center (i.e., our cardiac surgery program, which performs the only open-heart surgery in Suffolk County) was officially ranked in the top group of the New York State Department of Health's listing of hospitals statewide that are licensed to perform heart bypass surgery.



Of the 18 Long Island and New York City hospitals that perform these open-heart operations, we are ranked fifth. Statewide among 31 hospitals, we are ranked 11th.

Hospitals were ranked by their risk-adjusted mortality rates per 100 bypass operations in 1995.

Recent Publications*

- Barle H, Nyberg B, Essen P, Andersson K, **McNurlan MA**, Wernerman J, **Garlick PJ**. The synthesis rates of total liver protein and plasma albumin determined simultaneously in vivo in humans. *Hepatology* 1997;25:154-8.
- Bilfinger TV**, Hartman AR, Liu Y, Magazine HI, **Stefano GB**. Cryopreserved veins in myocardial revascularization: possible mechanism for their increased failure. *Ann Thorac Surg* 1997;63:1063-9.
- Bilfinger TV**, Magazine HI, Casares F, **Stefano GB**. Neurovascular immune opiate actions. *Chin J Neuroimmunol Neurol* 1997;4:22-3.
- Carty CS, Huribal M, Marsan BU, **Ricotta JJ**, Dryjski M. Nicotine and its metabolite cotinine are mitogenic for human vascular smooth muscle cells. *J Vasc Surg* 1997;25:682-8.
- Christensen VB, Tonnesen E, Sorensen IJ, **Bilfinger TV**, Sanchez RG, **Stefano GB**. Effects of anesthesia based on high versus low doses of opioids on acute the cytokine and acute phase protein levels in patients undergoing cardiac surgery. *Acta Anaesthesiol Scand* 1997;41:1-8.
- Dilmanian FA, Wu XY, Parsons EC, Ren B, Kress J, Button TM, Chapman LD, Coderre JA, **Giron F**, Greenberg D, Krus DJ, Liang Z, Marcovici S, **Petersen MJ**, et al. Single- and dual-energy CT with monochromatic synchrotron x-rays. *Phys Med Biol* 1997;42:371-87.
- Fricchione GL, **Bilfinger TV**, **Stefano GB**. The macrophage and neuropsychiatric disorders. *Chin J Neuroimmunol Neurol* 1997;4:27.
- Huribal M, **Ricotta JJ**. Arterial and vascular graft infection. In: Sidawy AN, Sumpio BE, DePalma RG, editors. *The basic science of vascular disease*. Armonk, NY: Futura Publishing, 1997: 837-50.
- King JM, Srivastava KD, **Stefano GB**, **Bilfinger TV**, Bahou WF, Magazine HI. Human monocyte adhesion is modulated by endothelin B receptor-coupled nitric oxide release. *J Immunol* 1997;158:880-6.
- Lawson WE, Hui JC, Oster ZH, Zheng ZS, Cabahug C, Katz JP, Dervan JP, Burger L, Jiang L, **Soroff HS**, Cohn PF. Enhanced external counterpulsation as an adjunct to revascularization in unstable angina. *Clin Cardiol* 1997;20:178-80.
- Liu Y, **Bilfinger TV**, **Stefano GB**. A rapid and sensitive quantitation method of endogenous morphine in human plasma. *Life Sci* 1997;60:237-43.
- Malinowski K**, Kono K, Takayama T, Terashima T, Tsukuda K, **Waltzer W**, **Rapaport FT**. Inhibition of lymphocyte proliferative responses by renal cell carcinoma extract. *Transplant Proc* 1997;29:839-41.
- Malinowski K**, Tsukuda K, Terashima T, **Rapaport FT**. Effects of end-stage renal disease on the expression of differentiation and HLA-DR markers on the surface of T and B lymphocytes. *Transplant Proc* 1997;29:1020-4.
- Macallan DC, Smith LM, **Ferber J**, Milne E, Griffin GE, Benjamin N, **McNurlan MA**. Measurement of NO synthesis in humans by L-[¹⁵N]₂arginine: application to the response to infection. *Am J Physiol* 1997;272:R1888-96.

(Continued on Page 10)

* The names of faculty authors appear in boldface type.

RESIDENCY UPDATE

Dr. John J. Ricotta, professor and chairman of surgery, is the new director of our surgical residency program. The former program director, Dr. Brian E. Pinard, clinical associate professor of surgery and acting chief of surgery at Winthrop-University Hospital in Mineola, now serves as associate director.

Our fully accredited five-year nonpyramidal residency program fulfills the standards for professional excellence adopted by the American Board of Surgery, and leads to Board eligibility.

Five surgical residents are selected each year through the National Resident Matching Program. This year's incoming residents all matched highly—in fact, the best ever (since our residency program was established in 1975).



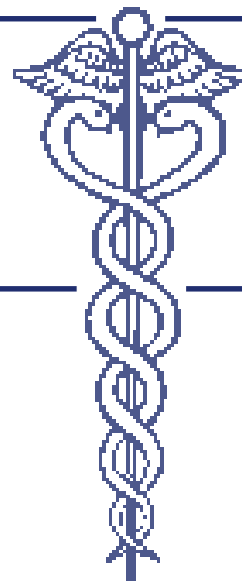
Drs. John Ricotta (left) and Brian Pinard (right) with 1997 graduating chief residents (from left to right) Drs. Mary Fogerty, Pierre Sfeir, Maurice Mawad, Faisal Khan, Michael Sacca, and Alex Argotte, at the celebration banquet held on June 22.

1997 Graduating Chief Residents

<u>Name</u>	<u>Medical School (Grad. Year)</u>	<u>Career Direction</u>
Alex Argotte, MD	Indiana U ('92)	Private Practice in General Surgery (Florida)
Mary Fogerty, MD	U of New Mexico ('92)	Thoracic Surgery Fellowship U of New Mexico
Faisal Khan, MD	King Edward U ('87)	Cardiovascular Surgery Fellowship Texas Heart Institute (Houston)
Maurice Mawad, MD	St. Louis U ('92)	Cardiovascular Surgery Fellowship SUNY-Brooklyn
Michael Sacca, MD	SUNY-Albany ('92)	Vascular Surgery Fellowship SUNY-Stony Brook
Pierre Sfeir, MD	American U of Beirut ('88)	Cardiothoracic Surgery Fellowship Mt. Sinai Medical Center (New York)

New Chief Residents

<u>Name</u>	<u>Medical School (Grad. Year)</u>
Michael Ajemian, MD	Eastern Virginia Medical School ('93)
Mitchell Chorost, MD	New Jersey Medical School ('93)
Ravindra George, MD	U of Madras ('78)
Javad Golzarian, MD	Brussels Free U ('88)
James Wu, MD	U of Chicago ('93)



Incoming Residents/All Matched Categorical PGY-1*

<u>Name</u>	<u>Medical School (Grad. Year)</u>
Salvador Cuadra, MD	SUNY-Stony Brook ('97)
Zhanna Logman, MD	SUNY-Brooklyn ('97)
Steve Martinez, MD	U of Washington ('97)
John Platz, MD	New York Medical College ('97)
Colleen Willet, MD	George Washington U ('97)

* As of July 1, 1997.

ALUMNI NEWS

Since the class of 1975 entered the profession of surgery, 124 physicians have completed their residency training in general surgery at Stony Brook. The alumni of our residency program now practice surgery throughout the United States, as well as in numerous other countries around the world.

Dr. Gerald I. Schiff ('78) has long been practicing general surgery in Torrance, CA, where he is on the medical staff of the Little Company of Mary Hospital. Active in California's medical community, he is a member of the executive board of the California Medical Association. He organized its medical staff section. In addition, at Little Company of Mary Hospital, he has been a member of the medical executive committee since 1982. He also serves as vice president of the LA County Medical Association (District 9).

Dr. Tom R. Karl ('81), director of the cardiac surgical unit at the Royal Children's Hospital in Melbourne, Australia, has been named associate editor of the *Annals of Thoracic Surgery*. He also has been admitted to the European Association for Cardiothoracic Surgery. A new research project of his focuses on the long-term neurodevelopmental outcome following the arterial switch operation for transposition of the great arteries. This year so far, some of his publications are:

- **Karl TR**. Circulatory support in children. In: Hetzer R, Hennig E, Loebe M, editors. *Mechanical circulatory support*. Berlin: Springer, 1997: 7-20.
- **Karl TR**. Atrioventricular septal defect with tetralogy of Fallot or double-outlet right ventricle: surgical considerations. *Semin Thorac Cardiovasc Surg* 1997;9:26-34.
- **Karl TR**, Weintraub RG, Brizard CP, Cochrane AC, Mee RB. Senning plus arterial switch operation for discordant (congenitally corrected) transposition. *Ann Thorac Surg* 1997;64:495-502.
- Murakami T, Lloyd B, **Karl TR**. Anomalous origin of left coronary artery from the right pulmonary artery with coarctation of aorta. *Asia Pac Heart J* 1997;6:22-2.
- Brizard CP, Cochrane A, Austin C, Nomura F, **Karl TR**. Management strategy and long-term outcome for truncus arteriosus. *Eur J Cardiothorac Surg* 1997;11:687-96.

- Kleinert S, Sano T, Weintraub RG, Mee RB, **Karl TR**. Anatomic features and surgical strategies in double-outlet right ventricle. *Circulation* 1997;96:1233-9.

In the past year, he and colleagues have also given several presentations at national and international meetings, a few of which are:

- **Karl TR**, Weintraub RG, Cochrane AC, et al. Senning and arterial switch: a good option for children with discordant (corrected) transposition. Society of Thoracic Surgeons, San Diego, 1997.
- **Karl TR**, Cochrane AD, Mullaly R, et al. Extracorporeal circulatory support in infants and Children. Cardiac Society of Australia and New Zealand, Brisbane, Australia, 1996.
- Brizard CP, Nomura F, Austin C, Cochrane A, **Karl TR**. Management strategy for truncus arteriosus. European Association for Cardiothoracic Surgery, Prague, Czech Republic, 1996.

He co-authored six presentations at the Second World Congress of Pediatric Cardiology and Cardiac Surgery, held in May in Honolulu. In addition, since June of last year, he has given several invited lectures on heart surgery—in Honolulu, Bergamo (Italy), Taipei (Taiwan), Prague, and London.

Dr. Curtis C. Marder ('82) has, since 1986, been in private practice in Marquette, MI, performing cardiac, thoracic, and vascular surgery at Marquette General Hospital.

Dr. Andreas G. Tzakis ('83) is professor of surgery at the University of Miami, and director of the liver/gastrointestinal transplant program at Jackson Memorial Hospital, as well as co-director of the transplantation division. He continues to contribute to the latest clinical and scientific advances in transplantation. Current interests are new directions in intestinal/multi-

Recent Presentations At Regional, National And International Biomedical/ Surgical Meetings

ASSOCIATION FOR RESEARCH IN OTOLARYNGOLOGY, St. Petersburg, FL, February 1997: **Smouha EE**, Namdar I, Sobol L. Partial labyrinthectomy with hearing preservation: histological findings in guinea pigs.

INTERNATIONAL CONGRESS ON THE IMMUNE CONSEQUENCES OF TRAUMA, SHOCK AND SEPSIS, Munich, Germany, March 1997: **Maitra SR**, Gestring M, Pan W, el-Maghrabi MR. Glucose-6-phosphatase gene expression following hemorrhagic shock and resuscitation.

FEDERATION OF AMERICAN SOCIETIES FOR EXPERIMENTAL BIOLOGY, New Orleans, LA, April 1997: **Garlick PJ**, **McNurlan MA**, Bark T, Lang CH, Gelato MC. Hormonal regulation of protein metabolism in relation to nutrition and disease • **Maitra SR**, el-Maghrabi MR, Pan W, Gestring M. Effect of resuscitation on glucose-6-phosphatase gene expression following hemorrhagic shock.

INTERNATIONAL SYMPOSIUM ON ADVANCES IN NEUROIMMUNOLOGY, Beijing, China, May 1997: **Bilfinger TV**, Magazine HI, Casares F, Stefano GB. Neurovascular immune opiate actions.

ANNUAL CONFERENCE ON SHOCK, Indian Wells, CA, June 1997: **Maitra SR**, el-Maghrabi MR. Hormonal regulation of glucose-6-phosphatase gene expression in hemorrhagic shock and following fluid resuscitation.

CONGRESS OF THE INTERNATIONAL SOCIETY OF THROMBOSIS AND HAEMOSTASIS, Florence, Italy, June 1997: Ravn HB, **Bilfinger TV**, Hartman A, Liu Y, Tonnesen E, Stefano GB. Magnesium sulphate stimulates nitric oxide release from saphenous veins in vitro.

AMERICAN ACADEMY OF OTOLARYNGOLOGY-HEAD AND NECK SURGERY, San Francisco, CA, September 1997: **Smouha EE**, Namdar I, Sobol L. Histologic findings after semicircular canal occlusion in guinea pigs • **Soliman AM**, **Katz AE**. Mouthgag suspension in tonsillectomy.

Also at this meeting, Dr. Arnold E. Katz, professor of surgery and chief of otolaryngology-head and neck surgery, presented three continuing education courses: • **Katz AE**, Grande DJ. Reconstruction of large facial defects after Moh's surgery • **Katz AE**, Kakani RS. Complications in facial reconstruction: prevention and management • **Katz AE**, Hadden JE. Head and neck tumor immunology (*highlighted as an "out-standing" course in the Academy's bulletin*).

NEW YORK SYMPOSIUM ON VASCULAR AND ENDOVASCULAR TECHNIQUES, New York, NY, September 1997: **Ricotta JJ**. Special techniques to facilitate the surgical repair of a difficult perirenal aneurysm.

* The names of faculty presenters appear in boldface type.

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ALUMNI NEWS

(Continued from Page 9)

visceral transplants, addition of mycophenolate mofetil in immunosuppression, studies of chimerism with bone marrow infusions, and wider application of living-related and split-liver transplantation. Last fall, he was awarded an NIH grant (\$1,231,435) for his research. Between January and June of this year alone, he and colleagues had already published 24 peer-reviewed papers, among which are:

- **Tzakis AG**, Nery JR, Thompson J, et al. New immunosuppressive regimens in clinical intestinal transplantation. *Transplant Proc* 1997;29:683-5.
- Karatzas T, Khan F, **Tzakis AG**. Clinical intestinal transplantation: experience in Miami. *Transplant Proc* 1997;29:1787-9.
- Mathew JM, Carreno M, Fuller L, Ricordi C, **Tzakis A**, et al. Modulatory effects of human donor bone marrow cells on allogeneic cellular immune responses. *Transplantation* 1997;63:686-92.
- Sustento-Reodica N, Ruiz P, Rogers A, Viciano AL, Conn HO, **Tzakis AG**. Recurrent Crohn's disease in transplanted bowel. *Lancet* 1997;349:688-91.
- Cirocco R, Zucker K, Contreras N, Olson L, Cravero J, Markou M, Babischkin S, Fernandez E, Burke GW 3rd, Esquenazi V, **Tzakis A**, Miller J. The presence of hepatitis B core antibody does not preclude kidney donation: lack of viral DNA in the serum and biopsies of core antibody-positive donors and clinical follow-up. *Transplantation* 1997;63:1702-3.
- Jin Y, Fuller L, Carreno M, Zucker K, Roth D, Esquenazi V, Karatzas T, Swanson SJ 3rd, **Tzakis AG**, Miller J. The immune reactivity role of HCV-induced liver infiltrating lymphocytes in hepatocellular damage. *J Clin Immunol* 1997;17:140-53.
- Garcia-Morales R, Carreno M, Mathew J, Zucker K, Cirocco R, Ciancio G, Burke G, Roth D, Temple D, Rosen A, Fuller L, Esquenazi V, Karatzas T, Ricordi C, **Tzakis A**, Miller J. The effects of chimeric cells following donor bone marrow infusions as detected by PCR-flow assays in kidney transplant recipients. *J Clin Invest* 1997;99:1118-29.

In addition, he and colleagues have recently published four book chapters on liver transplantation and intestinal/multivisceral transplantation.

Dr. Richard J. Ricca ('85) is currently performing general and vascular surgery at Southampton Hospital and Central Suffolk Hospital. Con-

cerning personal news of interest, he simply says: "Three beautiful children and one beautiful wife."

Dr. Steven J. Busuttill ('94) writes that after leaving Stony Brook, he completed a two-year vascular surgery fellowship at Geisinger Medical Center in Danville, PA. Soon after, he was certified by the American Board of Surgery. He then joined the vascular surgery department at Case Western Reserve University and the Cleveland VA Medical Center, as an assistant professor and medical director of the vascular lab. This position affords him the opportunity to collaborate and conduct research with scientists at the Cleveland Clinic Foundation, where he and his colleagues have been looking at the role of plasminogen in the inflammatory reaction created by arterial injury or biomaterial implants. Among his recent publications are:

- **Busuttill SJ**, Franklin DP, Youkey JR, Elmore JR. Carotid duplex overestimation of stenosis due to severe contralateral disease. *Am J Surg* 1996;172:144-7; discussion 147-8.
- **Busuttill SJ**, Morehouse DL, Youkey JR, Singer HA. Antisense suppression of protein kinase C-alpha and -delta in vascular smooth muscle. *J Surg Res* 1996;63:137-42.

In June, at the Congress of the International Society on Thrombosis and Haemostasis, he and colleagues presented a study on the inflammatory response to biopolymer implants in plasminogen-deficient mice. This November, at the annual meeting of the Association of Academic Surgery, he and colleagues presented the following study:

- **Busuttill SJ**, McHugh, French, et al. Biomaterial-induced inflammatory response in mice deficient for components of the plasminogen system.

Recently, he has also given presentations on aortoiliac occlusive disease and on volume expanders, at other professional meetings. While a vascular resident in Pennsylvania

last year, he won the Northeast, PA Resident Research Award for his study titled "Carotid Duplex Overestimation of Stenosis Due to Severe Contralateral Disease." His personal note: "Carmelina and I and enjoying Cleveland, with our two puppies, Nekko and Sasha, more than we expected—and we invite friends to visit us in the Rock-&-Roll City."

Dr. M. Dorothy Fogerty ('97), now doing a thoracic surgery fellowship at the University of New Mexico, in Albuquerque, writes: "Twins Carolyn and Christian are doing fine and have adjusted quite well to their mom's busy schedule."

The next issue of Post-Op, forthcoming this winter, will include news about Drs. Walter King ('80), Aaron Chevinsky ('88), Cliff Connery ('89), Richard Golub ('90), Andrew Zeniou ('94), John Doski ('93), et al.

We encourage alumni to update the Department on their professional and personal activities of interest.

Recent Publications

(Continued from Page 7)

- McLarty AJ**, Deschamps C, Trastek VF, Allen MS, Pairello PC, Harmsen WS. Esophageal resection for cancer of the esophagus: long-term function and quality of life. *Ann Thorac Surg* 1997;63:1568-72.
- O'Hea BJ**, Borgen PI. Breast carcinoma: counterpoint. In: Johnson FE, Virgo KS, editors. *Cancer patient follow-up*. St. Louis: Mosby, 1997: 310-5.
- Pillai L, Luchette FA, Romano KS, **Ricotta JJ**. Upper-extremity arterial injury. *Am Surg* 1997;63:224-7.
- Rapaport FT**, Terashima T, Tsukuda K, Kono K, Takayama T, **Malinowski K**. Suppression of lectin, alloantigen, and xenoantigen-induced T-cell proliferation by genistein. *Transplant Proc* 1997;29:1261-4.
- Ricotta JJ**. Abdominal aneurysms. In: Zinner MJ, Schwartz SI, Ellis H, editors. *Maingot's abdominal operations*. Stamford, CT: Appleton & Lange, 1997: 691-708.
- Selesnick S, **al-Rawi M**. Adhesives in otology and neurotology. *Am J Otolaryngol* 1997;18:81-9.
- Shindo ML**, editor. *Rehabilitation of facial paralysis (Facial Plast Surg Clin North Am 5)*. Philadelphia: Saunders, 1997.
- Sivaraman VS**, Wang HY, Nuovo GJ, Malbon CC. Hyperexpression of mitogen-activated protein kinase in human breast cancer. *J Clin Invest* 1997;99:1478-83.
- Smouha EE**. Time course of recovery after Epley maneuvers for benign paroxysmal positional vertigo. *Laryngoscope* 1997;107:187-91.
- Smouha EE**, Coyle PK, Shukri S. Facial nerve palsy in Lyme disease: evaluation of clinical diagnostic criteria. *Am J Otol* 1997;18:257-61.
- Soliman AM, **Katz AE**. Repair of traumatic earlobe clefts: a simplified modification. *Oper Tech Otolaryngol Head Neck Surg* 1997;8:173-5.

DIVISION BRIEFS

General/Gastrointestinal Surgery

In June, the Department's graduating chief residents presented the "Surgeon of the Year" award to **Dr. Gary Gecelter**, assistant professor of surgery—in appreciation of his "outstanding dedication and tireless devotion educating house staff in the art of surgery."

Surgical Research

In January, **Barbara Tyndall**, surgical support specialist, received the "Assistant Laboratory Animal Technician of the Year" award given by Metropolitan New York Branch of the American Association for Laboratory Animal Science.

Transplantation

University Hospital and Medical Center has recently reorganized its Transplantation Services with a view toward current and future expansion. In preparation for potential expansion in the areas of gastrointestinal and cardiothoracic transplantation, a program in **solid organ transplantation** has been established in the Surgical Hospital under the direction of **Dr. John Ricotta**, professor and chairman of surgery, and **Dr. Wayne Waltzer**, professor of surgery/professor and chairman of urology. The only program of its kind on Long Island, it

includes kidney transplantation now under the direction of Dr. Waltzer, and plans for programs in pancreas, heart and lung transplantation which are currently under development.

Dr. Kazimierz Malinowski, research associate professor of surgery, has been appointed director of the Histocompatibility and Immunogenetics Laboratory. Recently, the Transplantation Service opened the DNA laboratory for molecular typing of HLA-A, -B and -DR antigens expanding existing techniques of histocompatibility testing for kidney transplantation, bone marrow transplantation and HLA disease association. We are implementing high resolution HLA-DR typing by DNA sequencing. The number of tests performed by our laboratory increased three-fold during the last six months.

Trauma/Critical Care

Dr. Joseph Sorrento, assistant professor of surgery and chief of trauma, was recently accepted to the Harvard Macy Institute: Program for Physician Educators, at the Harvard Medical School. This is a two-week fellowship in curriculum development aimed at innovative educational programs for both surgical residents and medical students. Over 80 academic surgeons applied for a small number of positions.

LYMPHEDEMA GRANT TO HELP PATIENTS

In September, a grant of \$50,000 was awarded to University Hospital and Medical Center to support the prevention and treatment of lymphedema. The ability to access funding through this grant will allow more patients, most of whom are surgical patients, to receive care for this potentially disabling condition.

Dr. John J. Ricotta, professor and chairman of surgery, authored the grant proposal and is the project director. The clinical program will be coordinated by Cathy Tuppo, director of Physical and Occupational Therapy. It is expected that the program, which at present is limited in its services, will be fully implemented by February of next year.

Awarded by the Jacob and Valeria Langeloth Foundation (NY), the philanthropic grant enables patients with lymphedema, who are undergoing physical therapy treatment, to obtain funding for payment of rehabilitation services not covered by their medical insurance (third-party payers). Frequently third-party payers reimburse for only part of the necessary treatment, resulting in a large out-of-pocket expense by patients.

Lymphedema is very common, affecting at least 3 million Americans. Some patients develop it after surgery or radiation therapy for various cancers (breast, prostate, bladder, uterus, melanoma, lymphoma) in which case it is referred to as secondary lymphedema. Other patients develop it without obvious cause at different stages in life (primary lymphedema), and still others develop it after trauma or deep vein thrombosis.

Lymphedema is serious because of the disability it causes, because of the cosmetic deformities that are difficult to hide, because of the frequent complications that occur and because of the continuous worsening of the condition in untreated patients.

Thanks to the generosity of the Langeloth Foundation, patient access to lymphedema care at Stony Brook has been much enhanced.

For more information, please call Cathy Tuppo at (516) 444-2620.

The Department has established a new home page on the World Wide Web—please visit us at the address below. Our site will be updated on a regular basis, and thus will serve as a valuable source of current information about the Department.

<http://www.uhmc.sunysb.edu/surgery>

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(516) 444-4122 for our specialists in otolaryngology-head and neck surgery

(516) 444-4538 for our specialists in pediatric surgery

(516) 444-4545 for our specialists in plastic and reconstructive surgery

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(516) 444-2209 for our specialists in transplantation

(516) 444-2565 for our specialists in vascular surgery

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- *More New Faculty/Services*
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- *Head and Neck Reconstructive Surgery*
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