The Department of Radiation Oncology at UMDNJ - RWJMS and CINJ and RWJUH

Radiation Oncology Beam

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Hi-Art Treatment System completes mandatory state inspections

Installation of the state of the art TomoTherapy, Inc. Hi-Art Treatment System concluded in January 2008. State regulatory agencies completed their inspection of the system on January 8, 2008 and the department expects to receive approval to begin treatment using the system by January 18, 2008.

The Hi-Art Treatment System will introduce a new, integrated way to deliver radiation treatments for cancer.

Using 3D imaging, the radiation oncologist establishes the precise contours of the tumor to be treated. The doctor then decides how much radiation the tumor should receive, as well as acceptable levels for surrounding structures.

The Hi-Art Treatment System calculates the appropriate pattern, position and intensity of the radiation beam to be delivered, to match the doctor’s prescription as closely as possible.

The Hi-Art system allows doctors to take a CT scan just before each treatment. This allows the doctor to verify the position of the tumor and, if necessary, adjust the patient’s position to help make sure radiation is directed right where it should be.

This new system will offer treatment options for a wide array of cancers, including, but not limited to: prostate, lung, brain, head and neck, GYN, GI, bone and spine and soft tissue cancers.

For more information please contact Jeff Yue, PhD, Chief of Radiation Physics, at 732.253.3939.

Fond Farewell to Eduard Kagan, MD

Eduard Kagan, MD, Assistant Professor of Radiation Oncology

On Wednesday January 9, The Department of Radiation Oncology hosted a farewell breakfast for one of our own, Dr. Eduard Kagan, Assistant Professor of Radiation Oncology. Dr. Kagan has been a member of the department of Radiation Oncology since November 2004 and was one of the original members of the department. He leaves the institution to pursue a career in private practice in Long Island, New York.

Dr. Kagan specialized in the treatment of CNS cases, pediatric cases, radiosurgery including intra and extracranial cases and prostate brachytherapy.

Dr. Kagan’s commitment to providing cutting edge compassionate care to his patients has contributed to the outstanding care delivered to patients at CINJ and RWJUH.

Dr. Kagan will be missed by his colleagues and the staff of Radiation Oncology. We wish him all the best in the next chapter of his career!

Fond Voyage
Residents’ Corner

Dr. Bruce Haffty was elected Chairman of the ACGME Residency Review Committee, Radiation Oncology.

Residents have their yearly in-service training exam administered by the ACR on Thursday, March 6, 2008.

Dr. Stephen Hahn presented a talk entitled “Targeting Signaling Pathways in Radiation Therapy” at Cancer Center Grand Rounds on Wednesday, January 2, 2008 and Michael Zelefsky, MD presented a talk entitled “The curative potential of External Beam Radiotherapy for Localized Prostate Cancer” at Radiation Oncology Grand Rounds on Tuesday, January 8, 2008. The residents met with both visiting faculty prior to their talks.

Anthony D’Amico will be presenting Medicine Grand Rounds on Wednesday January 23, 2008 from 8:00am at CAB 1302. He will also be spending time with the residents on Wednesday January 29, 2008 from 10:00am-1:30am.

Residents switched services on January 7, 2008. The new team format is as follows:

Team A - Drs. Haffty & Gabel, Dorothy Pierce, Sharad Goyal
Team B - Drs. Khan & Cohler, Jayne Camporeale, Matt Poppe
Team C - Dr. Jabbour & Parima Daroiu

Dr. Kim & Sabin Motwani

Brett Lewis will be at Newark for a period of 3 months working with Drs. Cathcart and Razdan.

Matt Poppe will be attending the American Society of Clinical Oncology (ASCO) GI Symposium, to be held in Orlando, Fl in January 2008 where his abstract entitled, ‘Choosing the Modality of Radiation Therapy in Pancreatic Carcinoma: a Dosimetric Comparison of Intensity Modulated and 3D Conformal Radiotherapy’ was accepted for presentation. He will also be representing the Association for Residents in Radiation Oncology at the ACGME this January.

Sabin Motwani is really looking forward to his vacation (from which he will have returned from by the time this is published).

New Recruits

The Department of Radiation Oncology welcomes Devora Schiff, Research Teaching Specialist III to Dr. Bruce Haffty’s lab

Ms. Schiff comes to Radiation Oncology with 14 years of experience at Robert Wood Johnson Medical School. She most recently worked in the lab of Dr. Claire Philipp in Hematology where she was involved in research on menorrhagia focusing on platelet research.

Ms. Schiff will be responsible for assisting with the development of Dr. Haffty’s breast cancer research program.

Ms. Rhonda Lyles joins the department on January 22, 2008 as a Secretary II. Ms. Lyles comes to us from the Medical Records Office at CINJ where she was employed as a Secretary.

Ms. Lyles will be assigned to the division of Clinical Radiation Oncology based in Robert Wood Johnson University Hospital where she will provide general administrative support to the faculty, residents and APNs.

Recent Presentations, Publications, Awards, Applications

Presentations:


Z. Shen, PhD, Roles of a BRCA2-Interacting Protein (BCCIP) in the Maintenance of Genomic Stability. Department of Genetics, Rutgers University, November 19, 2007.


B. Haffty, MD, Post Mastectomy Radiation, Beth Israel Hospital, NY. November 2007.

B. Haffty, MD, Post-mastectomy Radiation, Mass General Hospital, Boston, Mass, November 2007


Z. Shen:


Applications:

B. Haffty, MD, (co-PI), D. Axelrod (PI-Rutgers University), Breast Cancer Prognosis by Quantitative Image Cytometry, NIH, Total UMDNJ:$223,993

B. Xia, PhD, (PI), Z. Shen (co-PI), S. Ganesan, MD,PhD (co-PI—Rutgers University), Roles of PALB2/BRC2 Breast Cancer Protein Network, a Systematic Approach, CINJ, Total: $49,976
Meet the players

Shushma N. Patel, RTT
Assistant Chief Radiation Therapist
Department of Radiation Oncology, Robert Wood Johnson University Hospital

The Beginning
Kampala, Uganda—As a young child in tropical Africa, Shushma Patel could never have imagined the vast distances or the number of continents, four, that her life journey would lead her to.

Now, sitting in the office that she shares with the Chief Radiation Therapist, Mr. William Witherup, Ms. Patel recounts how her journey led to a career as a Radiation Therapist—a career that she finds both challenging and fulfilling.

Shushma, or Shush as everyone in the department calls her, was drawn to this career path as a teenager. Her family had relocated from Africa to England by way of India. Growing up in the UK her best friend’s mother was diagnosed with breast cancer and Shushma would often accompany her friend and her friend’s mother to therapy sessions. The impact that these visits had on Shushma convinced her to enter the University of Hertfordshire in the UK to become a Radiation Therapist. She graduated in 1992 and has not looked back since.

The Middle
After graduating, Shushma worked as a Radiation Therapist in Hammersmith Hospital in England. There she worked with a large team of radiation therapists and learned how to administer treatment on various equipment. The early stages of her career taught her how to work, in fact excel, in a team environment and how to be aware, listen and put patients at ease under difficult circumstances.

The Future
After relocating to the United States in 1994, Shushma worked as a radiation therapist in a number of New Jersey Hospitals before accepting a position at Robert Wood Johnson University Hospital in 2003. Shushma has become an integral part of the Clinical division of the department. She oversees the delivery of radiation therapy to all patients by a staff of nine radiation therapists.

She is very much involved in the professional development of her staff and is also a clinical supervisor for Muhlenberg Regional Medical Center Radiation Therapy students who are required to complete a 3 –5 week clinical rotation at RWJUH. She sits on the Radiation Oncology Performance Improvement committee and on the Leadership committee. This past October, Shushma presented a teaching lecture at ASRT entitled “Image Guided Radiotherapy used with Stereotactic Radiotherapy: A Radiation Therapist’s Perspective”.

With the explosive growth of the department over the past two years Shushma finds herself pulled more toward management responsibilities. Her opportunities for direct patient contact are less than they used to be, but as a result they are equally, if not more, fulfilling.

In the midst of all this, Shushma still finds time to travel the world with her husband and two sons (her favorite hobby). She recently returned from Italy and has also traveled to Portugal, Tahiti and Bora-Bora, Cancun, Paris, Aruba and Hawaii, just to name a few places.

With the memory of her best friend’s mother as constant inspiration, Shushma looks forward to continuing her work to improve the quality of care delivered to our oncology patients, to be attentive to the needs of our patients and as part of the Radiation Oncology team to continue to inspire and teach new radiation therapists.

What is a Radiation Therapist?
Radiation Therapists use machines called, linear accelerators (LINAC), to administer radiation treatment to patients.

The first step in the radiation therapy process is simulation. During this process, the radiation therapist uses X-ray imaging and/or CT scans to pinpoint the location of the tumor. Once the area of interest is located the therapist marks the area to be treated with tiny tattoos.

The next step is to develop the treatment plan. The radiation oncologists, physicists and dosimetrists, develop the treatment plan. This step involves calculating the appropriate dose of radiation to be delivered to the target while minimizing dose to critical structures.

After the treatment plan is developed, treatment begins. The radiation therapist positions the patient and adjusts the LINAC according to the guidelines established in simulation. Then from a separate room that is protected from the x-ray radiation, the therapist operates the linear accelerator and monitors the patient’s condition through a TV monitor and an intercom system. Treatment can take anywhere from 10 to 30 minutes and is usually administered once a day, 5 days a week for 2 to 9 weeks. During the treatment phase, the radiation therapist monitors the patient’s physical condition and checks the accuracy of the daily setup.

Radiation therapists keep detailed records of their patients treatments. These records include information such as the dose of radiation used for each treatment, and the total amount of radiation delivered to date. Radiation oncologists review these records to ensure that the treatment plan is working.
# THE DEPARTMENT OF RADIATION ONCOLOGY AT UMDNJ - RWJMS AND CINJ AND RWJUH

Bruce G. Haffty MD  
Professor and Chair

## Clinical Radiation Oncology
- **Molly Gabel, MD**  
  Associate Professor and Chief, Clinical Radiation Oncology  
- **Alan Cohler, MD**  
  Instructor  
- **Salma Jabbour, MD**  
  Assistant Professor  
- **Eduard Kagan, MD**  
  Assistant Professor  
- **Atif Khan, MD**  
  Assistant Professor  
- **Sung Kim, MD**  
  Assistant Professor and Associate Director, Residency Training Program  
- **Michael McKenna, MD**  
  Assistant Professor  

## Residents
- **Sharad Goyal, MD**  
  Chief Resident PGY-5  
- **Brett Lewis, MD, PhD**  
  PGY-3  
- **Matthew Poppe, MD**  
  PGY-3  
- **Parima Daroui, MD, PhD**  
  PGY-2  
- **Sabin Motwani, MD, PhD**  
  PGY-2  

## Radiation Physics
- **Ning Jeff Yue, PhD**  
  Professor, Vice Chair and Chief, Radiation Physics  
- **Satish Jaywant, PhD**  
  Associate Professor  
- **Venkat Narra PhD**  
  Associate Professor  

## Advance Practice Nurses
- **Jayne Camporeale, RN, MSN, APN**  
- **Dorothy Pierce, RN, MSN, APN**  

## Clinical Services at RWJUH
- **Rich Ragovin, BS**  
  Director  
- **Jisseelle Nater**  
  Operations Manager  
- **Scott Barnes**  
  Chief of Dosimetry  
- **William Witherup**  
  Chief Therapist  
- **Shushma Patel**  
  Assistant Chief Therapist  
- **Riham Davis**  
  Dosimetrist  
- **Theresa Singley, RN**  
  Nurse  
- **Jacqueline Tull, RN**  
  Nurse  
- **Carie Strauss**  
  Therapist  
- **Krystin Greene**  
  Therapist  
- **Ann Marie Maisel**  
  Therapist  
- **Mary Kazio**  
  Therapist  
- **Susan Resavy**  
  Therapist  
- **Lillian Hosein**  
  Therapist  
- **Melissa Mareth**  
  Therapist  
- **Mohammed Anjum**  
  Therapist  
- **Kevin Sinn**  
  Therapist  
- **Brenda Adell**  
  Medical Biller  
- **Gladys Torres**  
  Medical Biller  
- **Terry Bilebski**  
  Medical Biller  
- **Shelly Muhammed**  
  Clerical Coordinator  
- **Melissa Morales**  
  Clerical  
- **Azalia Laguna**  
  Clerk  
- **Jenise Bell**  
  Tech Assistant  
- **Tonya Sharpe**  
  Receptionist  

## Radiation Cancer Biology
- **Zhiyuan Shen, MD, PhD**  
  Associate Professor and Chief, Radiation Cancer Biology  
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  Research Teaching Specialist I  
- **Huimei Lu**  
  Research Teaching Specialist III  
- **Jingyin Yue**  
  Graduate Student  
- **Jinjiang Fan**  
  Graduate Student  
- **Yi-Tuan Huang**  
  Graduate Student  
- **Devora S. Schiff**  
  Research Teaching Specialist III  

## Academic Administration at RWJMS and CINJ
- **Sharda Kohli, MBA**  
  Clinical Department Administrator  
- **Jo-Ella McClinton**  
  Management Assistant  
- **Odalis Sanchez**  
  Secretary I  
- **Rosa Schweighardt**  
  Secretary II  
- **Rhonda Lyles**  
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