Nuclear Medicine Recognized at SNM 2012

This year, Miami, Fl hosted the 2012 Society of Nuclear Medicine (SNM) Annual Conference on June 9-13th. The SNM is recognized as the premier educational and networking event in molecular imaging and nuclear medicine. Emory’s Department of Radiology and Imaging Sciences was well recognized at the annual meeting, reflective of our ability to stay at the leading-edge of technology and help to define the future of Molecular Imaging.

SNM accepted abstracts and posters from all of the Emory Radiology divisions that involve Nuclear Medicine and Molecular Imaging: Nuclear Medicine and Molecular Imaging, MR Research, Medical Physics & Quantitative Imaging, Nuclear Cardiology R&D, Physics & Computing, Radiopharmaceutical Discovery, and Radioligand and Expert Systems. During the week of SNM, many of the selected abstracts and posters were displayed with a designated time for the investigator to answer questions from the attendees. A select number of abstract authors were invited to give an oral presentation during the assembly. This year, Drs. Amzat, Galt, Taleghani and Taylor were selected to lead or participate in scientific paper oral sessions.

Over the course of the annual meeting, awards were presented by SNM for various achievements. A monumental moment occurred when our very own Dr. Goodman received the prestigious 2012 Paul C. Aebersold Award. Every year, The SNM Awards Committee selects an individual as the recipient of the Paul C. Aebersold Award for Outstanding Achievement in Basic Science applied to Nuclear Medicine. The award is named for Paul C. Aebersold, a pioneer in the biologic and medical application of radioactive materials and the first director of the Atomic Energy Commission’s Division of Isotopes Development at Oak Ridge.

Several faculty and staff members of the Department of Radiology and Imaging Sciences also received awards for their posters and presentations. Rianot Amzat, Research Associate, won second place in the Young Professionals category for her scientific presentation. Nick Plaxton, Nuclear Medicine Chief Resident, received an award for his educational poster. Ramisa Ehsan, PET fellow, was a finalist in the educational poster section. Adam Brown, Nuclear Medicine PET technologist, won first place for his poster in the technologist section. Russel Folks won first place for a paper by a technologist.

Dr. Daniel Lee was appointed Chair of the Nuclear Medicine Program Directors’ Association, placing him on the Board of Directors and Executive Committee for the Academic Council. He was also elected to the Board of Directors for the Nuclear Oncology Council and became President-Elect for the Southeastern Chapter of the Society of Nuclear Medicine. Dr. John Aarsvold was named Vice-President of the Computer and Instrumentation Council (next President). Dr. David Brandon was named chair of both the Young Professionals and the Membership Committee. Finally Dr. Kevin Kim from Interventional Radiology and Dr. Amanda Corey from Neuroradiology participated as speakers for interdisciplinary educational sessions. All together Emory was involved with over 25 abstracts or educational sessions.

Congratulations to all who contributed to the Emory successes at SNM 2012. The discoveries recognized in this international forum are in keeping with the reputation of Emory Radiology as a world-class leader.

PET Technologist, Adam Brown stands with his poster which won first place in the Technologist section.
Dear Colleagues,

Recently the National Academy of Sciences published a thoughtful glimpse into the future of the practice of medicine. As we usher in the era of Precision Medicine, patients’ conditions will no longer be characterized by traditional phenotypes derived from a description of signs and symptoms. Rather a new, more useful, taxonomy will develop in which disorders are classified by their molecular and functional features that are most closely aligned with treatment paths that optimize patient outcomes. For example, lung cancer is currently classified in terms of cell types (i.e., small cell versus non-small cell), yet a more functional way to consider this disease in the future may be by the specific combination of genetic and molecular drivers in each individual patient.

The challenge for biomedical research is to understand how such drivers of disease behavior can be targeted by specific therapies. What is the role of Radiology in the era of Precision Medicine? This new taxonomy requires a tight coupling of clinical practice and research, and a knowledge network to integrate molecular, laboratory, and imaging information in meaningful ways. Radiologists can play a key role in understanding molecular markers of disease and developing and implementing these knowledge networks in the clinical setting.

Last week Dr. Votaw and I attended the tenth “birthday” celebration of the National Institute for Biomedical Imaging and Bioengineering (NIBIB), which was established to amplify progress in health through innovation in imaging and engineering. (The director of NIBIB is Roderic Pettigrew, MD, PhD, whose pioneering work in cardiovascular MRI was performed at Emory). At this event, speakers such as NIH director Francis Collins, MD, PhD, and Nobel prize winner Roger Tsien, PhD, highlighted exciting and transformative developments in disease detection, prevention, and management for which imaging and engineering have played key roles. These included areas such as cancer care, spinal cord injury repair, and informatics solutions that turn data into new, powerful, usable knowledge. In the most moving part of the day, patients whose lives were touched by these discoveries gave powerful witness to their significance.

Best to all,

Carolyn C. Meltzer, MD, FACR
Chair of Radiology and Imaging Sciences

MESSAGE FROM THE VICE CHAIR FOR RESEARCH

Images and Information

Radiology’s business is the information content of images. Our researchers continually look for ways to either collect images that contain more information or to extract more of the available information from existing images. A current trend is to combine several studies to more sensitively or confidently obtain a diagnosis. An early example of this is PET scans overlaid on CT scans, which permits combining functional and anatomic information to obtain a better interpretation.

Let’s step back and think about information at a much more fundamental level. Information processing is: take input from the external world, consider it and your current state and take an action. For example, when you are standing at a curb (current state) you look both ways (input) and if there are no cars you walk across the road (action). Implicit in this is that you have a model of the world stored in memory. I suggest that all living things have a memory that stores a model representation of the world.

Consider a plant. It knows that the sun will shine and that when it does it can use energy from the light (input) to combine water and carbon dioxide (current state) into glucose (action). Rocks don’t do this. Some readers may recognize that I am describing a Turing machine – a simplified computing machine named after the brilliant British scientist who laid the ground work in the 1940’s for the modern computer. Turing proved that a machine with these characteristics could compute anything (that is computable). Plants and humans and all living things are information processing units.

Perhaps I am biased by the age in which I live, but think about life as a system of connected information processing units. Implication: the fields of information processing and computation can contribute fundamentals ideas to understanding life. At a deep level, understanding a computer program is analogous to understanding living systems. Perhaps we could look to debugging techniques used by computer scientists for ideas to understand a living system that is not operating as it should. As a matter of fact, we are already doing this! Putting a print statement in a computer program to determine the instantaneous state of the program is analogous to performing a test to determine if a protein is being expressed (can be done with PET imaging).

Combining information from disparate sources in more sophisticated ways is our future. I encourage you to think about what additional information would be helpful as you are performing your tasks. After figuring out ways to combine that information we will be able to deliver greater benefit to the patient and as we move forward with our next strategic plan, this proactive approach will be crucial.

Sincerely,

John Votaw, PhD
Vice Chair for Research
Awards & Recognition

John Oshinski, PhD
Associate Professor
Radiology and Imaging Sciences

Outstanding Postdoc Mentor Award
Dr. Oshinski was inducted into the “One in a Hundred” Outstanding Postdoc Mentor Award Club. Each year at the Annual Postdoc Research Symposium, the Emory Post doctoral fellows nominate and choose outstanding mentors for the Club. A postdoc or an entire lab of postdocs nominates his/her mentor for this award, and then a committee of postdocs chooses six mentors from the nominations to receive the “One in a Hundred” award. Dr. Oshinski was one of six mentors awarded at the School of Medicine and Yerkes.

Mary Newell, MD
Associate Professor
Radiology and Imaging Sciences

Ioannis Sechopoulos, PhD
Assistant Professor
Radiology and Imaging Sciences

2011 Editors Recognition Award with Distinction, Radiology Journal
Drs. Newell and Sechopoulos were recognized for their high quality of prompt scholarly reviews and received the 2011 Editor’s recognition Award. They received a certificate and letter of congratulations. The publication of a major peer-reviewed journal such as Radiology requires substantial time and effort by numerous reviewers. Drs. Newell and Sechopoulos are skilled and dedicated Editorial Board members and are recognized each month on the Radiology masthead.

Barbara Peck, MBA, RT(R) (QM)
Assistant Program Director
Georgia Society of Radiologic Technologists
Barbara Peck was recently chosen to serve as Member at Large of the Board of Directors for the Georgia Society of Radiologic Technologists for 2012-2013.

Resident Awards
Each year the residents vote to select a Teacher of the Year and Fellow of the Year. This year’s recipients are honored for their knowledge and willingness to take the extra time to work with the residents around the clock.

Teacher of the Year
Travis Henry, MD
Assistant Professor

Fellow of the Year
Keith Tomich, MD
Graduating Fellow

RSNA Resident/Fellow Research Award
The purpose of the RSNA Research and Education Foundation Roentgen Resident/Fellow Research Award is to recognize and encourage outstanding residents and fellows in radiologic research. These individuals are chosen based on their dedication and involvement in various research activities.

Michael Lubarsky, MD
4th Year Resident

Patrick Mullen Memorial Award
The Patrick Mullen Award is selected by secret ballot from the third and fourth year residents. This is an award to honor the former resident, Patrick Mullen, who after a life-changing accident overcame several obstacles to return to medicine as a radiologist.

Brad Mitchell, MD
4th Year Resident

Ted Brzinski, MES, RT(R)
MIP Instructor
Atlanta Society of Radiologic Technologists
Ted was recently chosen to serve as President-elect of the Atlanta Society of Radiologic Technologists for 2012-2013. He will also be serving as Chairperson of the Georgia Educators Association of Radiation and Medical Imaging for 2012-2013 beginning in August.

Dawn Moore, MMSc, RT (R)
Director of Medical Imaging Program
Georgia Society of Radiologic Technologists
Dawn Moore will be serving as the Georgia Society’s By-Laws Committee Chairperson and Delegate to the American Society of Radiologic Technologists.

Check It Out
GROWING OUR TALENT

RLA Class of 2012

Last September, twelve Radiology Leadership Academy (RLA) Fellows met as a group for the first time. Many of them did not know each other at this point, but quickly discovered ways that their work connected to outcomes of our patients. Through these connections they developed projects that exemplified their work at their RLA Graduation on June 8. Over the course of the program the fellows were exposed to many leadership tools, read several thought provoking books, participated in elective courses, and spent many extra hours developing their projects.

Being our third group to become RLA Alumni we heard many of the lessons that this group is taking with them: Bobby Burrow, who has 35 years of Emory experience, commented, “This was a lot of work, but I learned so much.” Erica Campbell-Brown, our first fellow from Grady expressed, “I really enjoyed getting to know people I never would have met.” Dr. Ashley Aiken, who helped the group to drill down into the finer details of the department budgets, articulated, “I learned so much about the department and how everything works together. There are so many decisions that make more sense now.”

The first group to present at graduation walked the audience through the workings of a CT scanner and easily translated this to what radiation dose is for those in the audience less familiar with the science. They then proceeded to impress the audience with their data collection, which was painstakingly manual, to prove that we can reduce radiation dose without sacrificing the diagnosis of the patient. This stimulated great discussion and interest from many of the Emory leaders in attendance, along with the various participants of our own department.

The second group proposed a new workflow to protocol studies electronically that places the Radiologist input prior to the technologist verification, saving time for all involved. This process also more closely links the communication of the radiologist and the referring physician, providing opportunities to better coordinate the ordering of correct scans for our patients. This is an exciting prospect that builds upon an existing application.

The final group of the day examined using High IQ at Midtown to streamline the communication and documentation of our patients. They have devised a way to gather initial data to justify the changes needed, and will be able to move forward with their plans when the nursing shortage is resolved.

Following the presentations, the fellows’ dedication and hard work were celebrated with a luncheon included leadership from our department, other Emory leaders and various program presenters.

Thank you to the fellows who made the third year of RLA a success. Thank you to the various presenters who contributed to the growth of our fellows and enriched the quality of the program. Thank you to the Radiology administration for your vision and dedication to making this program possible. And finally, thank you to my co-facilitators Chuck Powell, Habib Tannir, Greg Pennington, Dr. Mimi Newell and Dale Walker, whose insight into leadership and devotion to the development of an engaging program fueled its success.

- Moncia Salama
Communications Manager

RLA Class of 2012, stands with fellow alumni, administration and RLA facilitators at the RLA graduation.
Striving for excellence: The Commitment of We and Our 

“We” is the subject of our personal commitment to our customer. When each of us makes a connection with a patient, their family, or each other a “we” is established. We show our willingness to take our time with each and every experience that we have with our customer. An experience we have to impact a life looking to be saved, a family looking for comfort, a co-worker in need of a friend and a personal desire to show compassion and strength at the same time.

This commitment is witnessed every single day, by our customers, co-workers and me. Whether it’s by a patient looking for a CD copy of their films after hours and the radiology supervisor Christian Elliot taking the time to listen to the patient, identifying the issue and going outside her comfort zone to solve it. It happens when a patient and family sits down with Lashanna McDaniel in the PPCA suite and she comforts them through her laughter and jokes while introducing herself and explaining the process, giving them a sense of comfort and understanding. Dr. Kevin Kim also shows his compassion when he sits and talks to our oncology patients. He believes they deserve our best efforts and works hard at trying to make sure they receive our care in a timely and professional fashion.

Excellence is witnessed when a possible stroke patient arrives in the CT Suite and technologists like Karen Patterson and Chante Johnson work hard to scan the patient and then take the patient straight to the Neuro IR suite to be prepped for the procedure. They know that every minute counts, not because of a metric, but because of the patient and family who are in need; our Neuro physicians also deserve this commitment from the staff as they fight to save a life. Excellence happens when Linda Gunsby goes to CT and sees that help is needed and leaves her role as manager and assumes the role of a technologist, by instantly starting an IV on a patient.

Striving for Excellence occurs every single day in our facilities all around us in every single department at Emory Healthcare. I am honored to be associated with this incredible staff who works hard every day to change the culture and make excellence the norm. The senior leadership team is committed to removing obstacles and supplying the needs of the staff to make their efforts successful. We all work together to make the Department of Radiology and Imaging Sciences truly a Center of Excellence for our patients, staff and physicians.

- Richard Wright
Director of Radiology and Imaging Sciences

Merrill’s Committee

In late May, a nine-member team assembled to form the very first Merrill’s Committee of the Emory Department of Radiology and Imaging Sciences. The vision of the Merrill’s Committee is to empower and inspire diagnostic technologists to seek maximum levels of image quality through positive reinforcement. Composed of technologists from various locations and educators from the Medical Imaging Program, the group will launch a peer review process in August that considers various factors of image quality. This voluntary process will involve the recognition of diagnostic technologists who produce a particularly high quality image during an exam despite the circumstances. This commitment to image quality may be recognized by their peers, imaging students, supervisors, radiologists or radiology residents.

Diagnostic technologists may submit their own work or the work of peers. Any nominations will include a brief description of the quality criteria it meets, for consideration by the committee. The Merrill’s Committee has been hard at work developing the evaluation criteria as well as incentives for excellence. On a monthly basis, committee members assemble to review image submissions from across all Emory Radiology locations. Based on the quality parameters set forth by the committee, a monthly winner is selected. This winner may choose a prize: two movie tickets or a gasoline gift card. From the twelve monthly winners, a yearly grand prize winner will be drawn at random to receive a trip to an educational conference of their choice!

Members of the Merrill’s Committee have been asked to serve for one year, and new members may be notified to serve annually. Be on the lookout for announcements in our department, as submissions will be accepted beginning in August. We are looking forward to success through increased engagement in image critique and expanded commitment to patient care, all while fostering a little healthy competition between technologists!

- Katy Day, Imaging Workflow Administrator
Quality Corner

We Care

The Joint Commission (TJC), Center for Medicare/Medicaid Services (CMS), Department of Community Health (DCH); whatever you call them, they call on us regularly, frequently and unannounced. They survey us, review us, inspect us and cause trepidation in the hearts and minds of some. Many find it to be a challenge when these “people” show up on-site. Then the question is, “Who are these people?” They are the healthcare industry inspection agencies.

Many believe we have our processes and procedures in place just to please this group. The answer to that is: No. We provide care to our patients, their families and ourselves. Faculty and staff provide high quality care not because we know that we will be inspected but because we do care. We are proud of the quality of the care we provide and we show it in many ways. We show it when we are surveyed and everyone shines a little brighter and stands a little taller when the surveyors are around. We show it in the Quality Improvement projects we present at the annual EHC Quality Conference. This past year we presented eleven projects ranging from collaborating with the Emergency Department on Community Acquired Pneumonia pathway to CT Radiation Dose Reduction.

Throughout our department we are involved in several programs that continue to perpetuate us as a leader in quality improvements. The Radiology Leadership Academy (RLA) emphasizes a commitment to Quality. The fellows commit their time for one year to the program. The projects that spring from this incubator of ideas have been indicative of the energy, time and thoughtfulness of bringing a project from concept to reality. Employees attend the Emory Healthcare Quality Academy. This program builds an internal core of staff who understands the tools of Quality Improvement (QI). The students then go back to their departments and independently conduct QI projects. We have modality-specific Quality and Safety Committees. Digital Radiography, CT, MRI and Ultrasound, just to name a few, have all been active in improving quality at the modality level by reviewing procedures and standardizing these across Emory Healthcare.

What’s my favorite quality project? I think it is the export of Emory quality to far flung places. For this you do not have to look any further than our Adopt-A-Resident program. Drs. Pat Hudgins and Ali Tahvildari have traveled to Ethiopia twice to help with the education of Ethiopian radiologists.

So, I will say it again. We provide quality health care not because we are surveyed, inspected and reviewed. We provide it because we care. All of us. This column gives me the opportunity to say thanks. Thank you for all you do every day.

-Dale Walker, Director of Strategic Initiatives

HR Tip

Safe Summer Fun Series!

Summer is just around the corner. Are you ready? Gear up for an amazing summer by stopping by one of our Safe Summer Fun events. You’ll get tips on:

- Water safety – from keeping the right pool pH to swimming safety tips
- Skin protection – learn how to keep your skin safe from harmful rays*
- Summer food safety – keeping your cookouts safe and healthy
- Summer exercise – staying fit while beating the summer heat and humidity

* Emory dermatologists will be providing free skin checks at select locations.

Safe Summer Fun Series Schedule:

**Peachtree Center**
Date: Thursday, July 12, 2012
Time: 9 a.m. - 2 p.m.
Location: 6th Floor, Suite 600

**WHSCAB**
Date: Thursday, July 26, 2012
Time: 9 a.m. - 2 p.m.
Location: 1st Floor Outside of Auditorium
Updates from Imaging Applications Support (IAS)

**CHOA Workstation Service Request Process:**
What is the standard process for initiating a service request for problems encountered on the CHOA workstation in the Neuro RR?

To report an issue/service request call 404-785-7456, 24/7.

**New Radiology templates added to system templates in PowerScribe:**

- **Pacemaker:**
  The patient was identified as having a cardiac implantable electronic device (CIED) and the MRI examination was performed following the institutional CIED policy.

**RadNet Procedure Critique (Feedback Tool)**

Procedure Critique is designed to be used by radiologist to give feedback on the images provided for interpretation. Radiologists were in need of a system to electronically communicate with the technologist about the quality of exams performed. Previously, radiologists used a paper form to write their feedback. The form was faxed to the technologist. This was very inefficient. In addition, the communication was only one way. Now the technologists are able to communicate back to the Radiologist through the weekly reports.

**RadNet Procedure Critique Go Live Dates:**
- Phase 1 Diagnostic  **December 1st, 2011**
- Phase 2 Nuclear Medicine/PET, CT, MRI and US  **May 21st, 2012**

Feedback to the Radiologists

Below are the steps to ensure feedback is provided to the radiologists regarding their comments on the technologists.

1. A weekly report will be generated by the supervisors each Monday containing Radiologist feedback.
2. The supervisors will meet with pertinent staff that week and discuss Radiologist feedback. They will document the discussion/follow up.
3. That same week, the supervisors will log the results of their staff meeting in a report and email it to the reading room coordinator.
4. The reading room coordinator will ensure appropriate physicians get specific feedback.

**Extravasation:**
The patient was noted to have an extravasation following injection of [agent name and dose] intravenous contrast material. The institutional policy for managing the extravasation was followed, and the patient was given the appropriate instructions on discharge from the Radiology and Imaging Sciences Department to [location].

**Contrast Reaction:**
The patient was noted to have a contrast reaction to [agent name and dose] manifested by _____. This was treated with _______ by Dr. _______ in accordance with the institutional policy for managing contrast reactions, and the patient was given the appropriate instructions on discharge from the Radiology and Imaging Sciences Department to [location].

**Get Involved**

**Service Excellence Culture Important Dates....**

Once each quarter, you can look forward to a Radiology and Imaging Sciences Town Hall: Open Mic (formerly known as Humus with Habib). The purpose of this forum is to have an open and transparent dialogue within our department between faculty, staff and leadership. Habib Tannir will facilitate the session and he and Dr. Meltzer will host a panel of our departmental leaders to be on-hand to interact with you. We will hold the following sessions for the remaining quarters of 2013:

- Aug. 20 – 2:30 – 4:00 am – LIVE at Midtown
- Nov. 13 – 12:30 – 2:00 pm – LIVE on Clifton Campus

A workshop on Cultural Diversity will be held in early fall. The dates will be announced in July for you to have ample time to make arrangements to attend.

Please request time to attend these sessions, or if there is not enough coverage in your area, select a representative to bring the questions, concerns, and comments to report back to your area. All areas should make time to discuss highlights during there huddle or divisional meeting.
GET INVOLVED

Service Excellence Culture

You asked, We answered

On Friday, May 25, Habib Tannir, our Administrator, hosted our first department-wide town hall style virtual meeting. Dr. Carolyn Meltzer, our Chair, Dr. John Votaw, Vice Chair for Research, Dale Walker, Director of Strategic Initiatives, and Michael Armstrong, Assistant Director of Emory Midtown, composed the panel members who dialogue with the attendees of this “Open Mic” session. The panel was in the Winship Cancer Institute on the Clifton Campus and the session was webcast live with video and audio to six other sites (EUHM, EJCH, EUOSH, EP, Decatur Plaza, and CSI) totaling 100 participant members of our department. Below are some of the questions that were asked during the Town Hall. Please keep in mind that this is a paraphrased overview, and does not cover all aspects of the rich conversation that was held during our first town hall:

Question: Can we have ambassadors to help at the front desk?
Response: We realize that there are certain times of the day when the front desk is overwhelmed and will look to improve workflow and staffing during peak times. We are in the midst of FY 13 budget preparations and hope to have this position available to improve the patient experience.

Question: When are we going to have more nurses?
Response: Again, we are currently working on FY13 budget and have proposed a vehicle that allows us to grow our nursing staff in order to improve our nurse to patient ratio and flex staffing with visit volume. If we are granted our request, we will have additional positions for 5 nurses at EUH and 3 nurses at EUHM. Update since the town hall: We have indeed secured these positions for FY 13 and are now working with nursing administration on posting them.

Question: How are managers being evaluated? Are they accountable to Service Excellence and The Pledge?
Response: The School of Medicine and Emory Healthcare have different evaluation processes and mechanisms. Within the School, faculty & staff have different mechanisms. But within each operating unit managers and employees are evaluated along two axes: the What and the How. That is the results and behavior. So yes, leadership is accountable to the same standards as staff. Faculty work with an electronic system and each divisional leader has a meeting with Dr. Meltzer to discuss the reviews of each faculty member who reports to him/her. Each member also has the opportunity to contribute input.

Question: How do we keep SEI “new” six months from now?
Response: We have created a sustainability plan that extends and perpetuates our Service Excellence culture. To start, we will be holding quarterly SEI courses for new employees or those that may need a refresher. We have already put our standing agenda items in place during huddles, so that we can continually be reminded of our commitments and work towards raising the level of service. There are already plans being put in place to offer at least three courses each year that will help to support our new culture, the first of which will be Cultural Diversity.

We look forward to holding these meetings on a quarterly basis and rotating the live location and time of day. Another change you can look for is the title of this forum to Radiology Town Hall: Open Mic. We hope that this change will better reflect the spirit of open communication and transparency and will help all stakeholders to identify with this session and inspire involvement as we continue to strive for excellence.

We hope you have a Safe and Happy 4th of July!

Look for a new issue of the Rad Report the first full week of August.