

# Cleveland UltraFest 2020 Reinforces Ultrasound's Impact on Medicine

After a successful first year, Cleveland UltraFest came back bigger and better with a full day of ultrasound scanning experience for medical students from four Ohio medical colleges.

continued >>

















About 40 medical students, 24 staff and post-graduate faculty, and 12 high school and undergraduate college students from central and Northeast Ohio medical schools descended on the Sheila and Eric Samson Pavilion at the Health Education Campus (HEC) on Jan. 25 to participate in Cleveland UltraFest 2020, a comprehensive point-of-care ultrasound workshop hosted by the Ultrasound Student Interest Groups (USIG) from the University and College programs of the Case Western Reserve University School of Medicine.

Jacob Enders ('23), a CCLCM student lead, says the goal of UltraFest was to provide medical students with point-of-care ultrasound experiences, an emerging care paradigm involving the use of ultrasound at the bedside for rapid clinical decision-making, triaging and treatment.

"This goal was achieved when an attendant at the MSK station expressed to me – almost in a moment of relief – that he now understands what the carpal tunnel is and why it's so easy to have a pressure buildup there," says CCLCM student co-lead Derrick Obiri-Yeboah ('24). Having recognized the relatively restricted space of the tendons and nerve in carpel tunnel of the wrist during the scan of a model helped him understand how carpal tunnel syndrome develops.

Students engaged in hands-on learning at each ultrasound exam station – including musculoskeletal, cardiovascular, hepatobiliary and abdominal, neck/thyroid, renal/genitourinary and central/peripheral line access – and learned the basic technique of ultrasound scanning, machine operation and relevant anatomy, as well as discussed potential pathological findings on exam.

Shetal N. Shah, MD, Assistant Professor of Radiology and Director of Imaging Education at CCLCM, explains how quickly ultrasound has become an integral part of routine clinical care over the last 30 or so years – it's fast, portable, economical, easy to use and free of ionizing radiation.

"It's really revolutionized the way we diagnose conditions, whether in the emergency room, in the ICU, the ER or in an outpatient setting," Dr. Shah says. "The interesting thing is how quickly the modality is being used – from helping diagnosis to guiding procedures on a real-time basis."

He adds that medical students want to embrace this and other imaging technologies as early as possible in their undergraduate medical education. With support from the Imaging Institute, over the next several years, he is developing a comprehensive longitudinal imaging curriculum at CCLCM that integrates multiple imaging modalities and their appropriate use starting in anatomy in year one and ending with an Imaging Capstone in year five.

Dr. Shah calls UltraFest a natural expression of how imaging has revolutionized modern healthcare delivery in an efficient, patient-centric environment. "UltraFest is like Coachella for ultrasound," he says, referring to California's annual music and arts festival, adding that UltraFest a low pressure, engaging and festive day where clinical experts from eight medical subspecialty fields from MetroHealth Medical Center, Cleveland Clinic, University Hospitals Cleveland Medical Center and the Louis Stokes Cleveland VA Medical Center provide workshops on the various uses of ultrasound for medical diagnosis and to guide interventions, like central line placement, to our medical student community. Experts show how ultrasound can be used at the bedside for

patients in critical care and in the emergency room, to the outpatient setting such as evaluating a thyroid mass or evaluating right upper quadrant gallbladder pain.

CWRU SOM student and co-lead Sarah Rahman ('22), says student attendees benefited substantially with respect to their exposure of normal anatomy and pathology during the ultrasound event.

"They definitely felt that UltraFest was a worthwhile experience – they had fun, learned a lot and were able to take away concrete skills and knowledge, not to mention participate in some friendly 'gaming' competition with their peers in the afternoon," she says.

This year the event took place at the Health Education Campus, a brand new, state-of-the-art health educational facility that is a collaboration between CWRU and Cleveland Clinic. The event included medical students from CWRU School of Medicine, CCLCM, Northeast Ohio Medical University College of Medicine and The Ohio State University College of Medicine.

Charles LoPresti, MD, a national leader in point-of-care ultrasound for the VA system, as well as other internal medicine medical societies, and a hospitalist at the Cleveland VA Medical Center and CWRU SOM faculty member, was the keynote speaker. He gave an energizing overview of the vast uses of this technology from the ICU to the ER, as well as offered clinical vignettes demonstrating its impact in routine clinical decision-making prior to interventions.

"Last year we primarily focused on scanning throughout the day in more educational-type stations," Jacob says. "This year, in addition to having educational stations in the morning, we featured various ultrasound scanning games in groups, which helped highlight and reinforce some of the key concepts from the morning."

Derrick says classmates affirmed that the cardiac station reinforced their cardiac anatomy and physiology knowledge, and demonstrated in live models how various cardiac chambers work in unison, and how easily various abdominal aortic branch vessels can be located and assessed based on various surface and internal anatomical landmarks.

Dr. Shah calls the afternoon sessions a "game changer" for engaging the medical students. The gaming sessions were so well received that he hopes to expand its role at next year's UltraFest, which is planned to include more medical schools from Ohio and neighboring states.

"Everyone seems to have gained that basic knowledge from the structured didactic station in the morning and then had lots of fun with the team games in the afternoon that reinforced that knowledge," says CWRU SOM student co-lead Tessa Nelson ('22). "The best moment of the day for me was seeing it all come together and how much fun the attendees had with the afternoon games."

"The future will bring three-D ultrasound, more hand-held devices, distance learning and artificial intelligence into the mix – that's where the future of ultrasound lies – and at a fraction of the cost of MRI scans," says Dr. Shah. He envisions a day where ultrasound becomes an integral part of every medical school curriculum and hand-held ultrasound units will be provided to incoming students as a vital adjunct tool to stethoscope.

"The single-most important thing is cost – and the new hand-held units the size of an iPhone will bring down the cost and improve access," Dr. Shah says, fondly calling it the 'stethoscope of future doctors.' "It will revolutionize how we learn anatomy and physiology, diagnose disease and guide interventions."

The Cleveland UltraFest event was organized under the guidance of faculty leads for the CWRU and CCLCM USIG – Dr. Shah, MD, Staff Imaging Institute, and Courtney Smalley, MD, Assistant Professor of Emergency Medicine, are faculty leads for the College Program, and Robert A. Jones, DO, MetroHealth, is the faculty lead for the University Program.

The event was supported by CCLCM and CWRU SOM, and the CBRE team for the HEC, as well as several ultrasound scan vendors.

















# **CCLCM** is achieving its mission

Based on a 10-year follow up of the first CCLCM graduating class, the class of 2009, we are achieving our mission of developing physician investigators. The infographic below shows, among other things, that more than 70% of the class of 2009 report a dedicated research effort, and half reported protected research time.

Jessica Greenfield, PhD, a post-doctoral fellow in medical education and a clinical instructor of medicine with CCLCM, conducted the alumni study. "The goals were to discover what the first class has accomplished since graduation and if they are involved in research activities, as we would hope they are," says Dr. Greenfield.

#### **Expected findings**

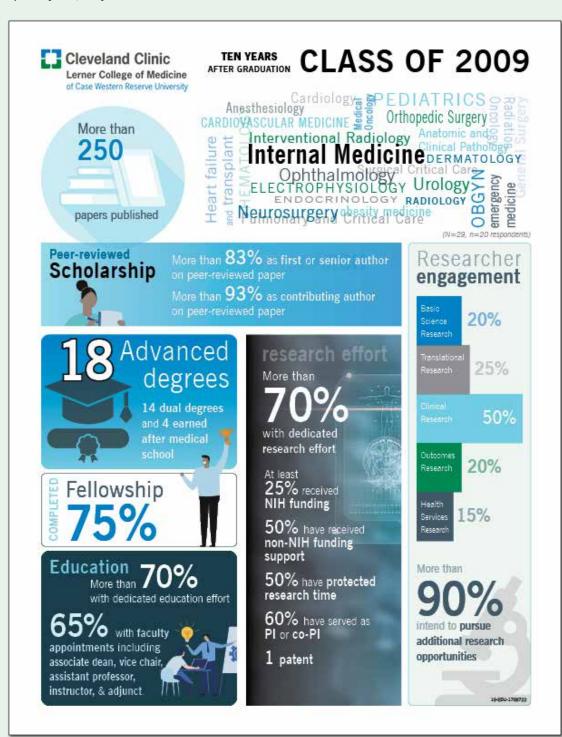
Our graduates continue to work hard and achieve. The number of research projects and publications are high, and the graduates' dedication to education, in terms of teaching, is impressive.

"It's heartening to see how graduates are promoting and paying forward the kind of educational experiences they had here," says Dr. Greenfield.

#### **Surprise finding**

Four of the graduates went on to earn another degree following medical school. Advancing their education wasn't necessarily a surprise. Rather, what surprised Dr. Greenfield and her team was that the graduates earned another degree while they were busy with their residencies, fellowships and medical practice.

Because the literature suggests that a physician's first faculty appointment doesn't happen until 10 years after medical school graduation, Dr. Greenfield and her team waited until the first class was 10 years out before conducting this follow up.



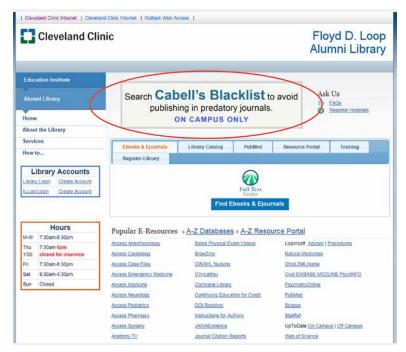
# The Floyd D. Loop Alumni Library

# Resource helps you find – and avoid – predatory journals

The Floyd D. Loop Alumni Library now provides access to Cabell's Blacklist, which can help you determine whether a particular journal is worthy of your contributions.

Cabell's Blacklist is a searchable database that identifies deceptive and fraudulent journals. Specialists identify and analyze more than 65 behavioral indicators to flag potentially exploitative or dishonest operations. Each entry in the Journal Blacklist provides information on how to identify the journal in the real world as well as a comprehensive report of each behavioral indicator that was uncovered in the journal's evaluation.

To find out more, <u>visit the Cabell's Blacklist website</u> or contact the library at 216.444.5697.



## Evidence-based practice database now available from the library

The Floyd D. Loop Alumni Library has a one-year subscription to a database that offers evidence-based tools and resources for nurses who are doing research or updating clinical guidelines or policies, or for anyone looking for high quality evidence on a topic.

The Joanna Briggs Institute (JBI) database collects the best available evidence and then appraises and synthesizes the results for you in the form of brief "Evidence Summaries" or "Recommended Practices." The database also retrieves systematic reviews, which saves you time sifting for high quality evidence.

To access JBI:

- <u>Visit the library home page</u>
- Under "Popular E-Resources" choose "Ovid EMBASE MEDLINE PsycINFO"
- Check the box in front of "Joanna Briggs Institute EBP Database" and click "OK"



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Note: The database is accessible to main campus employees only at this time, and a library account is required if accessing any resource off campus. Register for a library account.

Use the "Basic search" to type in your whole PICO question; use "Advanced search" when building a PICO question. Coming soon is a "widget" to help you break down the keywords essential to composing a solid PICO question.

New information is always being added, so if you don't see your topic in the database, just click on "JBI Topic Request" and let them know what you want to find.

JBI comes from Ovid, the same company that produces Lippincott Advisor and Lippincott Procedures.

Questions? Contact Mary Schleicher, Medical Librarian, at 216.445.9699 or schleim@ccf.org.



### Q: Describe your role and work in education/academic medicine.

I am a Physician Advisor with CCLCM, Headache Medicine Fellowship Director and Neurology Clerkship Director. My work in education began early in my career. After fellowship, my chairman asked if I would be the neurology residency director, and I stayed in that role for 14 years. It was an exciting time for me, and I loved watching all of the residents become caring, competent neurologists. Many of them went on to become successful academicians and department chairs. I had a hiatus in my formal educational endeavors while still teaching on the wards and in clinic, but missed the formal interactions with learners. When I came to Cleveland Clinic in 2005, I became the Headache Medicine Fellowship Director.

Shortly after that, I was asked to be the associate neurology clerkship director and finally a physician advisor. These roles have allowed me to continuously grow and evolve as a physician, mentor and educator. Education is my passion. I can treat one person and have an impact on their life, but if I teach one student, resident or fellow, I have impacted the lives of thousands more patients.

#### Q: When you were a child, what did you want to be when you grew up?

I love animals so I thought I might be a veterinarian. What I realized was that in order to care for animals, you have to care for their owners. Caring for others and helping them through difficult times is what motivates me every day.

#### Q: How do you recharge?

My respite from work and the place where I de-stress and recharge is with my horses. They are sensitive animals and instantly sense if you are upset or distracted. Just being with them is instantly calming. When I am with them I can escape and free myself from all the pressures of life. They give me wings and, for a moment in time, complete freedom.

Adapted from the Cleveland Clinic Women's Professional Staff Association newsletter, celebrating staff educators during Women in Medicine Month, September 2019.



## Among the audience were CCLCM's NIH scholars

CCLCM's seven NIH scholars were among the hundreds of people from the clinical and scientific community who gathered at the National Institutes of Health to hear Cleveland Clinic CEO and President Tom Mihaljevic, MD, present

Grand Rounds last month. Dr. Mihaljevic spoke on "Taking the Job No One Else Wants: Lessons Learned in Healthcare Leadership" at the Grand Rounds series entitled Great Teachers in Medicine.

Seven CCLCM students are among the 2019-20 NIH Medical Research Scholars Program (MRSP), a year-long program designed to expose students to the entire continuum of biomedical research. As MSRP scholars, the students are conducting a basic, clinical or translational research project, either on the NIH campus in Bethesda, Md., or at NIH facilities. Six of the seven students share their project titles here:

Lynn Daboul ('21): "Evaluating the Central Vein Sign in the Diagnosis of Multiple Sclerosis using FLAIR\* Imaging"

Maxwell Lee ('22): "Combined T And NK (TANK) Immunotherapy in Head and Neck Cancer"

Francis May ('21): "Systemic Adeno-associated Virus (AAV) Vector Delivery of MMUT Targeted to the Central

Nervous System in a Murine Model of Methylmalonic Academia"

John McVey ('21): "Investigation of Tumor Antigen Specific T Cell Response against Primary Liver Cancer in a

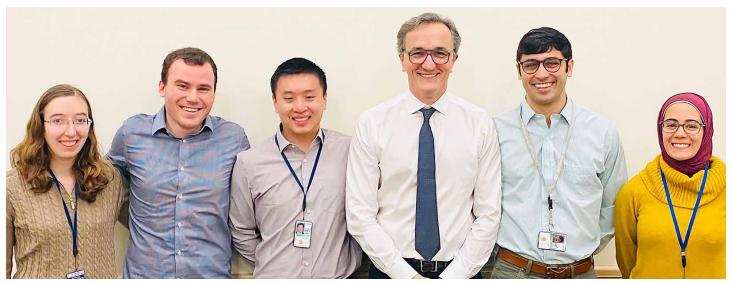
Non-Alcoholic Steatohepatitis Mouse Model"

Emily Rose ('21): "Outcome Measure Development for Relapsing Polychondritis"

LeAnne Young ('21): "Fully Automated Detection of Vascular Leakage in Uveitis"

continued >>

## Dr. Tom Mihaljevic presents Grand Rounds at NIH continued



From L to R: Emily Rose, Jack McVey, Maxwell Lee, Dr. Tom Mihaljevic, Frank May and Lynn Daboul.

The audience appreciated hearing Dr. Mihaljevic's perspectives on leadership in the current healthcare environment and about his own leadership journey. Earlier that day, at the Great Teacher's Breakfast, Dr. Mihaljevic and the group of CCLCM scholars paused for a photo to remember the day.

## **Chance reunion**

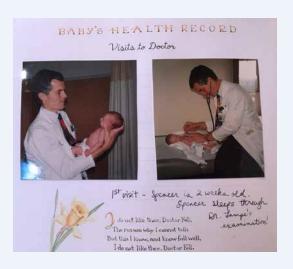
While on his pediatrics rotation at Hillcrest Hospital in August, Spencer Seballos ('22) was delighted to run into his childhood pediatrician, John Lampe, MD, who happened to be volunteering in the Spiritual Care Department as a Eucharistic Minister that day.

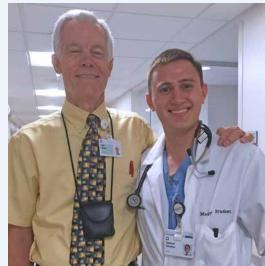
This chance meeting prompted Spencer to uncover these photos of himself at two weeks old, circa 1993, during a wellness check with Dr. Lampe.

Dr. Lampe has been a physician with Cleveland Clinic since 1991. Throughout his career, he has received many honors, including the Bruce Hubbard Stewart Award for humanitarian medical care, Nightingale award for nurse-physician collaboration and two teaching awards from the pediatrics division. In 2007, he earned the Master Clinician Award for demonstrating a lifetime commitment to outstanding patient care.

Says Dr. Lampe, "It was great to run into Spencer, as I have known him and his family for a long while, as you can see!"

Spencer agrees, saying, "It was an unexpected surprise to see Dr. Lampe, but a fun reminder of the kind and caring physician he was for me. I hope to be just like him in my medical career."





## Submit your creative work to Stethos

Submissions are open for the 10th issue of *Stethos*, the medical humanities journal of the Cleveland Clinic Lerner College of Medicine. In previous issues, *Stethos* has provided a wonderful forum to showcase the incredible diversity and creativity of our students, faculty and colleagues, and we hope to continue this tradition in our 10th issue.

We are seeking submissions of short fiction, reflective writing, poetry, personal narrative, essays, artwork and photography. Submissions may be about any medicine-related topic or reflection; if you have a question about a specific topic, please reach out and ask.

In celebration of our 10th anniversary, we will be organizing a feature piece highlighting reflections from past and present students (from any school/discipline). To contribute to this feature, we encourage you to consider writing a letter to your past or future self about lessons you have learned, dreams you hope to achieve, predictions about the world — the list goes on and on! View previous issues of *Stethos* to see examples of published works.

The deadline for submissions is Monday, March 9, 2020.

#### Submission guidelines

Send submissions using the online form.

- Up to four submissions per author; please send each submission on a separate form
- Prose should be less than 2,000 words, submitted in Microsoft Word
- Poems should be less than 75 lines, submitted in Microsoft Word
- Submit all photographs and artwork as a jpeg file (we will contact you later for high-quality file format)
- · All photographs and artwork must include a caption
- Save the submission/illustration as the title (or abbreviated title) followed by the author's last name. For example, the article, "Generic" by Dr. Jones, would be saved as Generic\_Jones.doc

### **Review process**

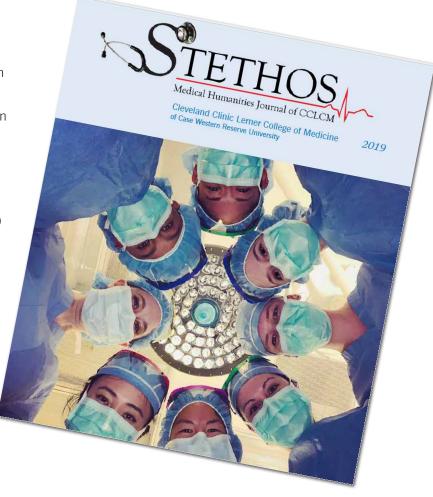
All submissions will be peer-reviewed by a student-run editorial board consisting of co-editors and two editors-in-chief.

The editorial board will review contributions for originality, style and content.

#### Patient consent/confidentiality

Our confidentiality policy is based on the Health Insurance Portability and Accountability Act of 1996 (HIPAA). <u>Please refer to this document for questions about patient confidentiality</u>. As a rule, authors/artists should protect the confidentiality of all individuals whose personal details may be revealed without their consent.

For questions or issues regarding submissions, please contact the editors at cclcmhumanities@gmail.com.



## STUDENT SPOTLIGHT:

## Janet Adegboye

Impacted by medicine for much of her life, Janet Adegboye ('20) is confident that the medical field is the perfect fit for her. "Growing up, the values within my household stemmed from my parents' careers within the medical field," she says. "I was raised on hard work, faith and education."

Janet, who was born in Nigeria, spent most of her life in Columbus, Ohio. She attended The Ohio State University (OSU) for undergrad, where she majored in microbiology and minored in linguistics. "At that point I already knew I wanted to go to medical school," she says. "I was extremely interested in healthcare and found myself fascinated with biology."



Janet Adegboye

At CCLCM, Janet's passion for medicine has continued to blossom. After spending time learning about each specialty, she found her niche: Anesthesiology. In particular, she loves being in the operating room. "I like the fast-paced environment," she says. "When I'm there, colors are a little brighter, and I can almost feel a buzz. I absolutely love the energy and the feeling of fulfillment."

To further expand her knowledge about anesthesia, Janet worked with Daniel Sessler, MD, Professor of Anesthesiology and Chairman of Outcomes Research Anesthesia, to research acute kidney injury within the perioperative period. She collaborated with internal researchers and statisticians, along with external collaborators in Australia, Canada and Israel.

In October 2019, she presented her findings at the American Society of Anesthesiologists Conference in Orlando, Fla.

Outside of education, Janet has taken advantage of CCLCM's extracurricular activities, specifically Doc Opera. "I've participated in Doc Opera all five years of medical school, which is an accomplishment in and of itself," she says. She not only found the event to be a great opportunity to get to know other students, but also a good source of exercise.

In her free time, Janet enjoys listening to podcasts, binge-watching Netflix, lifting weights and being a "cat mom" to Mitchell, who is named after Mitchell's Ice Cream. She is also a huge college football fanatic and loves rooting for her alma mater, OSU.

In addition to her hobbies, Janet is also part of the Christian Medical and Dental Association (CMDA). As an active member, she attends church every Sunday, along with various bible studies. "Faith is a big part of my life," she says. "CMDA is a good source of motivation and helps rejuvenate me."

As graduation rapidly approaches, Janet offers this advice to incoming medical students: Take full advantage of all the opportunities medical school has to offer. "Getting involved in events and different organizations has really helped shape my experience at CCLCM," she says.





Prabalini Rajendram, MD

# Community IPE program receives grant funding

Congratulations to Prabalini Rajendram, MD, Assistant Professor of Medicine and Director of Interprofessional Education for CCLCM, whose proposal for an interprofessional education (IPE) program was accepted for funding through a Cleveland Clinic Caregiver Catalyst Grant.

Dr. Rajendram's proposal involves implementing a nine-month IPE program for Case Western Reserve University and Cleveland Clinic Health Education Campus students to collaborate with Fairfax neighborhood residents and organizations, with the goal of developing a partnership focused on health and wellness in the community.

Caregiver Catalyst Grants are made possible by the combined gifts from more than 10,000 generous donors and are administered by the Cleveland Clinic Philanthropy Institute. The grants allow caregivers throughout Cleveland Clinic to develop and implement innovate ideas to benefit patients, community members and fellow caregivers. Learn more about Caregiver Catalyst Grants.

STUDENTS AND FACULTY: Be sure to email Laura Greenwald with news about your achievements so that we can share your terrific news with our entire education community!

# MARK YOUR CALENDAR

March 9-20 CCLCM Capstone

Cleveland Clinic

March 13 Tenth Annual CCLCM-wide Student Research Day

Cleveland Clinic

March 20 Match Day

Dean's Comments: 11:30 a.m.

**Opening of the Envelopes: Noon** 

**Reception following** 

CWRU, Tinkham Veale University Center

March 23-26 Spring OSCEs for Year Two

Cleveland Clinic

March 24 CWRU Annual Education Retreat

7:30 a.m. - 5 p.m.

CWRU, Tinkham Veale University Center

### Advancing Our Mission

The Education Institute welcomes donations to advance its mission of educating those who serve. Individuals, families, foundations and corporations that believe in the value of education are making a difference in the future of patient care with their generosity. To learn how you can help, please contact Theresa Holthaus at 216.444.1839 or at holthat@ccf.org.

Alumni: Share Your News

We'd like to hear about what you've been doing since graduation. If you have news to share (maybe you're involved in an interesting research project or you recently returned from a global health mission), please email Laura Greenwald at greenwl@ccf.org.



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