APPLY HERE

Health & Wellness

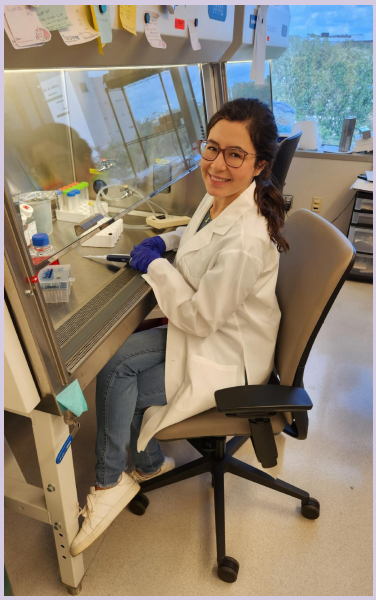
Pickleball Sport - Join Now!

Are you interested in America's fastest growing sport? Pickleball is a combination of tennis, ping pong, and badminton, however, it is also a social sport involving players bantering during and after points (from what I've read). The bottom line is...it's fun!

Two of our team members, Rughved Brahman and Rodrigo Lendof, lead a Pickleball group at USF called "The Pickleball Enthusiasts" and also offered to provide some training.

If interested in playing or learning more, email **EmployeeWellness@Moffitt.org** and we will add you to a distribution list to provide updates once we explore our options.

From the Bench



Today we're at the bench of Dr. Maria Gonzalez, a postdoctoral fellow in the Kissil Lab. Maria's current focus is on finding targeted therapies for Neurofibromitosis type 2 (NF2)-related schwannomas. These sets of diseases are most commonly vestibular schwannomas – tumors which originate from myelinating Schwann cells and develop on nerves controlling inner ear functions – characterized by mutations in the NF2 gene. Maria is working with small molecule inhibitors to find an effective combination therapy to use in clinical trials. There are currently no specific treatments for NF2, and Maria hopes that her research will change this so that patients have real therapeutic options in the future. NF2 is a rare disease, which means less than 200,000 people are affected by it in the US. With so few patients, many rare diseases get overlooked in research, leading to a lack of understanding, effective treatments, and patient care. Maria stresses that the study of rare diseases is important, because many patients can feel hopeless after their diagnosis. Her research allows these patients to know that they are seen and that they too deserve to live a better life under their illness.

Dr. Gonzalez had a unique journey to postdoc, starting not with a PhD, but as a medical doctor. A short experience with a genetics lab during med school introduced her to the research world, and she was instantly enamored. She states, "Researchers can have a widespread impact on many lives worldwide, while practicing doctors often have a more limited scope."

She elaborates, stating that her favorite parts of research include the intense critical thinking involved while developing a project, and the thrill of discovering and creating new knowledge in the field. Her experience as a researcher has helped to advance those critical thinking skills and ability to deal with failures, which she believes will aid her as she transitions back into medical practice. She encourages anyone else who is considering combing research and medical practice, enthusiastically shouting, "Do it!! It's the most wonderful feeling to both see patients and to know you're helping them while in the lab." Maria is currently undergoing the strenuous task of applying to medical residency programs in the US, and we wish her the best and hope that she gets placed at her first choice!

From the Bench Series

Written by Alyssa Shepard, PhD

Poll of the Week

Last Editions Poll Results:

Where would we find you at an indoor adventure park?

In the arcade: 9.1%

Bowling: 18.2%

Playing laser tag: 27.3%

Racing Go-Karts: 18.2%

Playing mini-golf: 27.3%

In your opinion, when does Fall start?

The autumnal equinox

Select

When pumpkin spice lattes are available again

Select

The day after Labor Day

Select

When school starts

Select

When the Florida weather drops below 80 degrees Fahrenheit

Select

If you have any ideas for the newsletter, please send them to RET@Moffitt.org.

MOFFITT CANCER CENTER

Research Education and Training

implement dissemination activities, prepare scientific manuscripts as lead author and co-author, present research at conferences, and submit at least one funding application.

Demonstrated evidence of a research agenda focused on cancer prevention and control (e.g., HPV vaccination, cancer screening, social needs, and patient navigation during cancer treatment) and demonstrated interest in community-engaged research and implementation science. Experience working with populations that experience health disparities, such as racial/ethnic minorities, rural, Appalachian, and/or low-income populations.

APPLY HERE

Assistant Professor Translational Research in Pharmaceutical Sciences

Application Deadline: Open until filled

Institution: University of Kentucky College of Pharmacy

More Info: 12-month tenure-track faculty positions with an anticipated Fall 2024 start date.

APPLY HERE

Two Postdoc Positions Available - Cancer Metabolism and Tumor Host Interactions T32

Application Deadline: Open until filled

Institution: Rutgers Cancer Institute of New Jersey

More Info: This award supports fully funded opportunity for two post-doctoral trainees. High achieving post-doctoral fellows may be supported for an additional third year of training through other funding sources. Selection of trainees will be done by the Program Steering Committee, based on applicants' academic records and productivity, letters of recommendation, and personal interviews. Eligibility and application requirements are listed below:

- High achieving post-doctoral fellows (evidenced by research productivity in the form of number and quality of publications, fellowship awards, presentations etc.)
- Evidence of interest in translational research in Cancer Metabolism and Tumor-host interactions
- Commitment to a two year rigorous training program
- High levels of communication and organizational skills
- United States citizens or legal permanent residents (green card holders)

Mentors from Rutgers University and Princeton University train postdoctoral fellows.

APPLY HERE

From the Bench

Today we come from the bench of Elliot Medina. Elliot is a fourth-year PhD student in Dr. Vince Luca's lab who is interested in cell polarity and adhesion and how cells utilize these mechanisms to organize and move through the environment. Cell polarity is a phenomenon that

originates from the innate asymmetry in cells, either in shape or composition. This polarity can be found in many different cell types, but is particularly important in the function of epithelial, migrating, and developing cells. Cell adhesion, the act of a cell sticking to another or to a component in the extracellular matrix, is closely related. Understanding these mechanisms can help us answer critical questions in cancer development and metastasis, and how polarity and adhesion can influence, or be influenced by, cancer progression. Elliot considers himself a protein engineer, explaining that engineering-forward thinking helps him take a reductionist approach to determine the fundamentals of certain mechanisms, which can then be expanded upon in specific contexts like cancer.

Elliot's journey to PhD student was not a direct one, but one many likely relate to. As a first-generation college student, Elliot lacked familial examples of what exactly obtaining a college degree looked like. At the point he decided to pursue research, it had been too late for the conventional graduate school path. Instead, he became a lab manager to gain skills in research techniques and teaching, eventually landing a technician job in the Luca lab when the lab was just setting up at Moffitt. And as Elliot says, the rest is history. For those that may share a similar background, Elliot advises getting some sort of research experience during or after an undergraduate degree. Advisors will favor people who took the time and effort to gain this experience, as it shows a commitment to being a research scientist.

Additionally, Elliot explains that the most important piece of knowledge he wished he had learned before starting research is just how critical it is to develop and maintain interpersonal relationships. The scientific community is close-knit, and you never know where or from whom opportunities can come from. Sound advice for any researcher. We wish Elliot the best as he works to earn his PhD!

From the Bench Series

Written by Alyssa Shepard, PhD

Health & Wellness

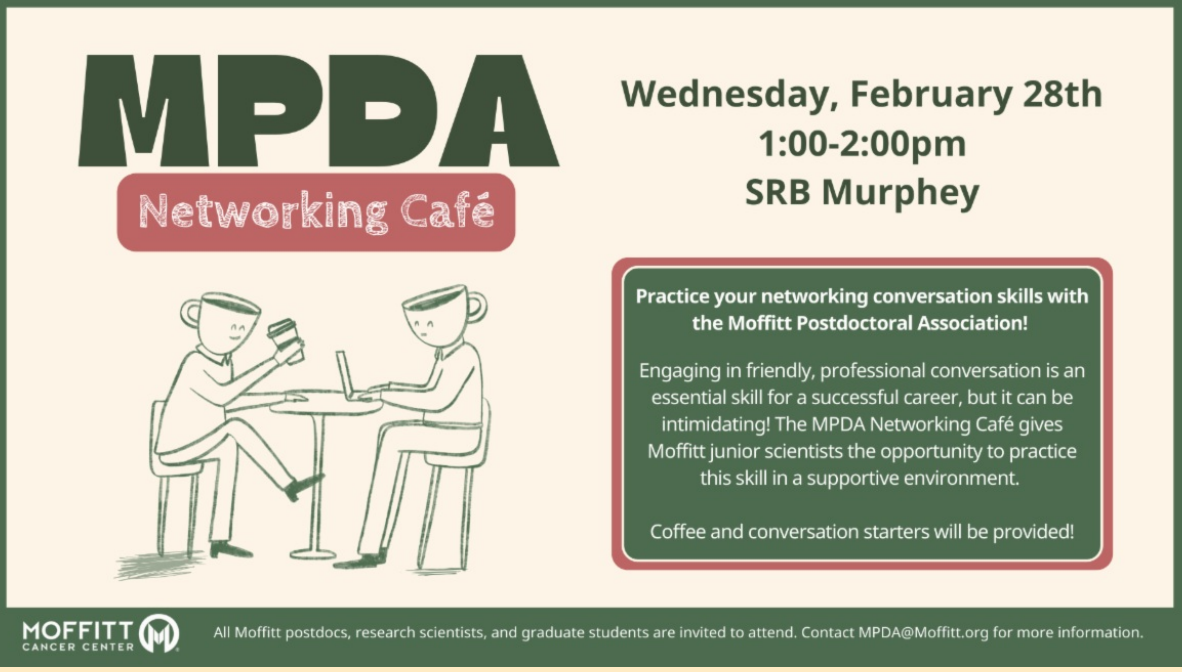
Mental Well-Being Resources

Did you know Moffitt has a centralized online hub with all sorts of mental health resources? They have created the webpage for easy access to the benefits and wellness programs that support mental well-being. There is a lot of information so be sure to check it out!

Click here to visit the site!

Mindfulness Practice

Starts: Tue, Oct 31, 2023 at 8:00am



From the Bench

From the Bench is a monthly article written by Dr. Alyssa Shepard who is Moffitt Postdoctoral Fellow

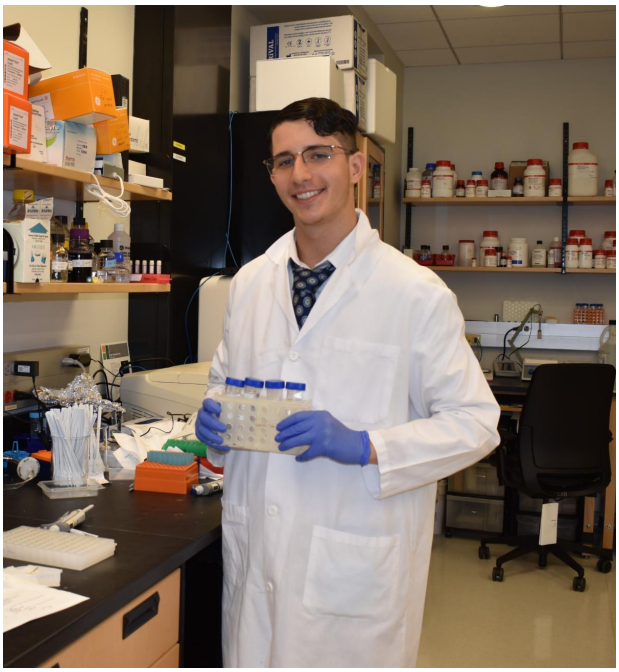
Today's feature is from the bench of Benito Traversa. Benito is a Research Intern in Dr. Ana Gomes' lab and is interested in the biology of aging and how it relates to cancer. The Gomes lab broadly specializes in the biology of aging and how specific factors associated with aging can affect cancer progression. Benito is focused on lung cancer, specifically the subtype non-small cell lung cancer (NSCLC), which comprises over 80% of lung cancer diagnoses. Lung cancer is the second most common form of cancer in men and women yet remains the deadliest. To help contribute to the general understanding of NSCLC, Benito is studying how cortisol, a common steroid hormone that is shown to increase with

age, modulates cell fate decisions in NSCLC.

In cancer, the “decisions” that cells make can greatly impact prognosis and treatment regimens. These are critical points where a cancer cell, which is already dysregulated, can undergo transitions such as senescence – a cessation of growth and cell division – or the common epithelial-mesenchymal transition (EMT) – where a cell becomes more mobile and migratory and is often associated with metastases. Work in the Gomes lab has linked increased levels of cortisol and other glucocorticoids with these cell-fate decisions in NSCLC.

Outside of his research, Benito has been working to train the next generation of scientists through a partnership with the Undergraduate Research Society (URS) at the University of South Florida. He has established a quarterly workshop series, in which research scientists and PhD students from Moffitt teach URS students fundamental research skills, such as Western blots, PCRs and protein purification, over the course of an afternoon. According to Benito, the main point of these workshops is not necessarily the laboratory technique, but rather to showcase a small part of what it takes to be a research scientist in a fun environment to foster curiosity. These workshops feature Q&A sessions, which provide opportunities for students to directly interface with researchers to gain a better understanding of the process of being a part of that career.

Speaking of careers, Benito is in the process of interviewing for MD/PhD positions and is excited to train to become a physician-scientist. We wish him all the luck and success in his future endeavors!



Benito Traversa picture above

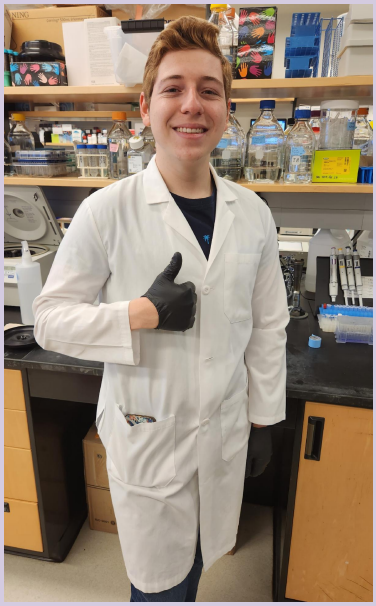
Resources

Resources & Services
@
Biomedical Library

Check out how the

how to conduct science that is more environmentally sustainable as well as how to sustain a fulfilling career in the sciences. This event is limited to the first 100 people who sign up, so don't wait (only 49 spots remain!).

From the Bench



Today we are visiting the bench of Angelo Nicolaci, a third-year PhD candidate in the Binning Lab. Angelo considers himself a structural biologist and is currently focusing on understanding the molecular basis of viral oncogenesis, mainly cancers driven by the human papillomavirus (HPV). HPV constitutes a large group of related viruses, with several being high-risk for specific cancers, such as cervical cancer – a main research focus of the Binning Lab. HPV-positive cancers are interesting, as they replicate the effects of common genetic mutations seen in other HPV-negative cancers without directly altering any genes. Rather, HPV goes straight to the molecular machinery of a cell and disrupts the proteins directly. This is why structural biology is such an integral part of the lab – if we can learn exactly which proteins the virus interacts with and how it does so, we can develop targeted interventions to prevent that.

Specifically, Angelo is working on understanding how HPV hijacks the ubiquitin-proteosome system (UPS). The main function of the UPS is the degradation of proteins in a cell. This is a vital process for maintaining balance, by ensuring regulatory molecules are eliminated at the right time, initiating key events in other cellular pathways, or eliminating detrimental or mis-folded proteins. Angelo finds E3 ligases – one of the enzymes that tags proteins for degradation with ubiquitin – particularly intriguing and is trying to decipher the interaction between them and HPV. When asked what got him interested in this type of research, Angelo explained, “Cancer is often seen as a series of random events and random mutations, but I see it as very organized. We

first thought all cancers were driven by viruses, and these viruses work very methodically. They don't want the host to die, yet the way they replicate involves hijacking the system with very specific targets, like tumor suppressors, that they hold on to and prevent from working."

In the future, Angelo hopes that his work will help lead to a better understanding of HPV oncogenesis and the generation of prophylactic treatments and therapeutics. We wish him the best as he continues his PhD studies!

From the Bench Series

Written by Alyssa Shepard, PhD

Poll of the Week

Last Editions Poll Results:

What type of puzzle is your favorite?

Jigsaw: 46.2%

Sudoku: 30.8%

Crossword: 15.4%

Maze: 0%

Word Search: 7.7%

Which Disney villain are you most afraid of?

Ursula - The Little Mermaid

Select

Jafar - Aladdin

Select

Maleficent - Sleeping Beauty

Select

Scar - The Lion King

Select

Cruella de Vil - 101 Dalmatians

Select

If you have any ideas for the newsletter, please send them to RET@Moffitt.org.