

Welcome Class of 2017!



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UAB GBS CANCER BIOLOGY THEME

Theme directors:

Lalita Shevde-Samant Ph.D.

Soory Varambally, Ph.D.

**Cancer Biology Theme News
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Kaitlyn Dorsett

Samuel Fehling

Josh Fried

Ann Hanna

Shelly Nason

Rachael Orlandella

Sweta Patel

From the Directors

Thank you for taking the time to browse our Fall 2017 CANB Newsletter. This has been a whirlwind of a semester. It seems like it was just yesterday that we welcomed our newly matriculated students into the program and now they are finished with the first semester!! This is an incredibly enthusiastic group of students who have seamlessly integrated with the existing students. We threw a welcome party for them that was brilliantly emceed by Alyncia Robinson. This happened simultaneous with several students graduating and moving on to their next horizon and some students qualifying to candidacy. As you will read on, our students have also been busy collecting accolades at local and national-international meetings and publishing their work while contributing to the BHM community through several fundraising events.

We've had several changes at UAB, the notable ones being our new Comprehensive Cancer Center Director, Dr. Michael Birrer and the staff at the GBS office. In this issue the CANB Newsletter Committee has woven all these happenings into the newsletter. As we come to the close of 2017, we wish you and yours Happy Holidays and a happy, healthy, and productive 2018.

Lalita Shevde-Samant, Ph.D. & Soory Varambally, Ph.D.



Welcome Dr. Michael Birrer!

by Lalita Shevde-Samant, PhD



What brought you to UAB?

As an M.D., Ph.D. trained in medical oncology, I worked for about 20 years at the National Cancer Institute as a clinical faculty, where I spent about 80% time in the lab and 20% of time on clinical duties. When I went to Mass General (actually I was going back there, because I was there in the '80s) I went on faculty at Harvard. I significantly increased my clinical duties including clinical trials research.

It was a great job in a great University; so the question was would I just stay there and do what I am doing or would I take the next step up? And so, what I decided would be interesting, would be to run a cancer center. The only question was which cancer center. There is one thing in the M.D. Andersons or Memorials of the world and I decided that I wanted a cancer center in a University that had an outstanding reputation but was at a size that I can get my hands around. Having been at Harvard, I can say that that is difficult at Harvard; there are just too many moving parts.

UAB is the perfect size and the perfect quality.....it is really an outstanding place. It is an exciting position because it allows me now to impact the lives of many, many more cancer patients than I could have at Harvard.

Could you please tell us a bit about your research?

I started out in the transcription factor field. We did a lot of work on the AP-1 transcription factor. In the mid-90s I began to have a lot of gynecological cancer fellows rotate through the lab. So, over a period of time...by the year 2000, most of the lab was working on the genomics of gynecological cancers. Mostly ovarian cancer. And that only accelerated because it is a really exciting time in the field. We have better understanding of the molecular biology of these cancers and the capability of translating that knowledge into clinically beneficial treatments for the patients. We can do the characterization of genomic amplicons within high-grade serous ovarian cancer, do the preclinical assays, the in vitro assays, the in vivo assays (go into animal models) and get it into the clinic with small molecule inhibitors from the clinic. We can do that in about a year or two. It is really exciting.

Is this the research that you would bring to UAB?

I would. One of my postdocs is already here. I was at Harvard over the weekend orchestrating the packaging of the lab. It is supposed to be here in two days. The whole lab will be here up and running to go in a few days.

What excites you about research?

I think there are two elements - there is a beauty, an elegance to discovery and new knowledge-it is satisfying and very pleasing; it is a human condition in that we want to know more about the

world around us. That is terrific. In addition, as a physician-scientist, as an M.D., Ph.D., I want to be able to make people's lives better. I want to be able to take that knowledge from research and translate it into effective therapeutic interventions. It is very satisfying. You can leave your mark of a discovery in the laboratory for future generations but you could also leave your mark in generations of patients in the future who will benefit from what you've done.

Our graduate students are the engine of research at UAB.

How will the CCC be involved in graduate training?

Cancer Center based labs many of whom are in the WTI, but are affiliated with various departments, are very interested in hosting Ph.D. students in their labs and training for advanced fellowships. (They are) dedicated to creating a good learning environment so that the trainees have a good experience with lots of publications and go on to a career in either academic or some will go into industry (nowadays companies do some really great work). But in addition to providing a home for graduate students we also are very dedicated to lending faculty members in the CC, particularly those who are clinically oriented, to give lectures to students, to Ph.D students, educating the younger generation about oncology/cancer treatment and cancer management. We are more than willing to provide that information and contribute to their learning experience towards understanding translational cancer research and cancer therapeutics.

If graduate students would also like to see first-hand what it is like to see cancer patients being treated, how we handle therapeutic intervention trials, Phase I and Phase II trials, we can afford them the opportunity to shadow a clinician any time.

What are your plans for clinical cancer-related education at UAB?

Hematology Oncology has a big oncology fellowship program centered within the Cancer Center. We want to expand that program and also contribute to education in the nursing school. Finally, with my arrival, we are vested in continuing medical education (CME) for junior faculty and faculty from other schools who want to learn about cancer management.

A few fun questions:

Country or Western? Country

Favorite style of BBQ? Memphis

Favorite ice cream flavor? Chocolate

Clam chowder or gumbo? Clam chowder

Fish and chips or shrimp and grits? Fish and chips

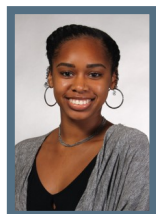
Any unusual hobbies? Hunting....this was unusual in Massachusetts, but quite common/normal in the South. So, I guess I'm a Southerner at heart.

What has been the biggest surprise about Birmingham and/or the South? I've been surprised about the cool weather we've had the past couple of evenings.

Tell us a fun fact about yourself. I have a wonderful wife (who is still in Boston) and I have 3 kids.

First year focus

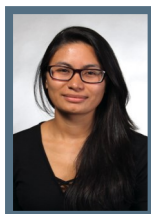
Interview by Rachael Orlandella (adapted from Joshua Fried)



**Zoya
Anderson**



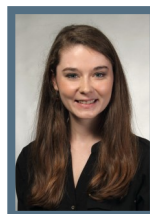
**Rachel
Carnes**



**Sajina
GC**



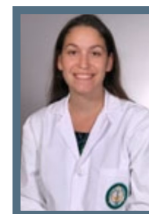
**Rachael
Guenter**



**Dominique
Hinshaw**



**Alba
Martinez**



**Laura
Stafman, M.D.**

Where are you from?

Covington,
Georgia

Seattle,
Washington

Kathmandu,
Nepal

Corning,
New York

Metairie,
Louisiana

Madrid,
Spain

Tallahassee,
Florida

Where did you receive your undergrad?

Stillman
College

Washington
State
University

Purbanchal
University in
Nepal

North
Carolina State
University

Auburn
University

Complutense
University of
Madrid

Wellesley
College

Can you give a short explanation of your undergraduate research experience?

Looked at how Adipokinetic hormone affected reproduction when the circadian rhythms were disrupted in *Drosophila*.

Created mouse models for cue-induced binge-drinking and aggressive behaviors interconnections to drinking.

Detection of JAK2V617F mutations in Nepalese patients with myeloproliferative neoplasms.

Worked in plant pathology, US department of energy doing water purification.

Toxicological stressors in behavior/neurological development of birds.

Involved in the coordination of clinical trials for psoriasis.

Currently studying kinases involved in pediatric solid tumors such as hepatoblastoma.

What interested you in UAB?

"I liked that UAB has a hospital so that there are opportunities for translational work."

"I was originally born in Alabama, and I thought it would be interesting to go to school here."

"The myriad of world-class translational research in cancer biology at UAB drew me here."

The diversity of research and flexibility of the GBS program.

The cancer biology program.

"I heard about the GBS program through a friend."

UAB has an awesome children's hospital, lots of flexibility, and pediatric surgery research.

What is your favorite part of being a grad student?

"All of the people with diverse backgrounds."

"Not taking multiple classes at once."

"Learning new things and making friends with people from all over the world!"

"More responsibility, freedom, and opportunities in the lab."

"I love learning! I really like the classes and learning new things."

Learning about things I'm interested in. The classes are focused.

"I like that there is a lot going on—I enjoy going to talks and seminars."

Have there been any pleasant surprises about living in Birmingham?

"I was already pretty familiar with Birmingham."

"There is a lot of different stuff to do here."

"Everyone is very welcoming and friendly!"

"Yes! It's been a lot of fun, I've made a lot of friends."

"There's so much to do here! Lots of places to eat and shop."

"Everything is very green—lots of forests and hiking."

"There's more to do than I thought there would be."

Zoya Anderson	Rachel Carnes	Sajina GC	Rachael Guenter	Dominique Hinshaw	Alba Martinez	Laura Stafman, M.D.
What are your future plans/goals after earning your PhD?						
"I'm not really sure yet. Maybe industry—I'd like to work at the CDC."	"I haven't decided yet."	"I want get a postdoc in a great research lab and stay in academia."	Probably industry, somewhere I can use my engineering background."	Not sure yet, slight preference for academia but maybe industry.	I want to work in pharmaceuticals and interact with physicians.	Go back to residency, then get a pediatric fellowship.
What did you want to be when you grew up when you were a child?						
An oncologist.	An astronaut.	Several things—a doctor, librarian, and a farmer.	An Olympic horse-rider.	A teacher!	An archaeologist.	"A cheerleader, as I once told a Supreme Court Justice."
What would be your ideal vacation?						
"I just want to go somewhere that I can drink all day in a bikini and not be required to talk to people."	"A trip to Hawaii with my close friends where we just relax on the beach all day."	"Anywhere with my family. It doesn't really matter where, I just would like the company of my loved ones."	"The beach! Anywhere other than a cruise."	"I really want to see the Northern Lights."	Somewhere on an island in the sun.	Laying on a beach doing nothing but reading books.
What do you like to do in your spare time?						
"I like to cuddle up in bed with food and watch Netflix."	"I like to read and watch TV."	"I read lots of novels and cook."	"I like sleeping and painting."	Reading and shopping.	Travel, go swimming at the pool.	"I enjoy cooking, baking, gardening, and volunteering."
What is your favorite book/author? Movie? Broadway musical? Disney Movie?						
Laurell K. Hamilton and Charlaine Harris; Beaches; haven't seen one; Lady and the Tramp.	Periodic Tales: A Cultural History of the Elements, from Arsenic to Zinc; McLintok!; Rent; Beauty and the Beast and Mulan.	"My favorite books are The Adventures of Sherlock Holmes and the Harry Potter series!"	"The Twilight series; Beetlejuice; Rent; Hocus Pocus.	Jane Eyre; Rear Window; White Christmas; Sword and the Stone.	La Sombra del viento; Breakfast at Tiffany's; The Lion King; Beauty and the Beast.	Cutting for Stone; Mean Girls; Book of Mormon; the live-action Beauty and the Beast."
Would you rather read the book or watch the movie?						
Read the book.	Always read the book.	Read the book.	Watch the movie.	Read the book.	Watch the movie.	Read the book.
Would you rather fight 100 duck-sized horses or one horse-sized duck?						
100 duck-sized horses.	100 duck-sized horses.	I would play with 100 duck-sized horses.	100 duck-sized horses.	100 duck-sized horses. A giant duck is scary.	One horse-sized duck.	One horse-sized duck.
Do you prefer crunchy or creamy peanut butter?						
Creamy.	Extra crunchy.	Crunchy.	Creamy.	Definitely creamy.	I don't like peanut butter.	Crunchy.

Flow cytometry core adds new imaging cytometer

by Sweta Patel

The Flow Cytometry Core at Shelby, mostly known for cytometric analysis and cell sorting, now has a new technology, ImageStream which is a combination of two commonly used techniques – Flow Cytometry and Imaging. According to Dr. Vidya Sagar Hanumanthu, the Manager of the Flow Core, it is going to be a great help to students for their research to answer questions related to internalization, co-localization, translocation, cell cycle analysis, DNA damage and repair analysis, apoptosis, shape changes of cells, and

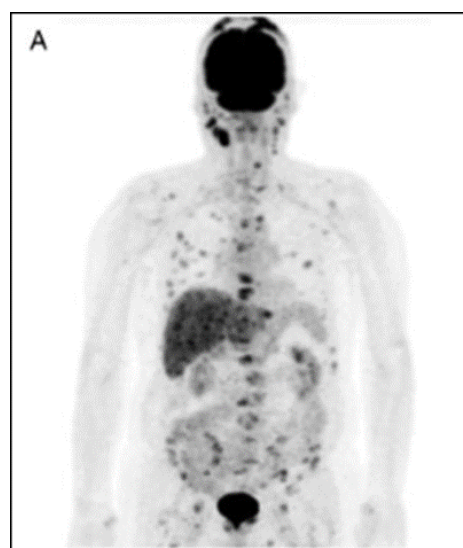


cell-cell interactions that may otherwise not be possible using other techniques. Apart from these, he also emphasized that the ImageStream technology is turning out to be a valuable tool in exosome and other small particle analysis, cell signaling pathway analysis and is making its way into the field of microbiology. He further explains, “The image cytometer is designed to collect digital images of the sample. The fluorescent intensities are collected as in a traditional flow cytometer along with the spatial details recorded as imagery. Unlike the traditional flow cytometers that detect the emitted spectrum of light using photo multiplier tubes, the image cytometer uses CCD cameras to gather the data.” When asked about how different the ImageStream is to the traditional flow cytometers and Confocal Imaging he said, “The image cytometer collects up to 12 images of each event and hence the rate at which data is collected is slower compared to the flow cytometers, but much faster compared to microscopic techniques. Although the resolution of images may not be as well defined as traditional microscopic techniques, the imaging cytometer can collect data from a large set of cells in a short period of time compared to other microscopic techniques and therefore is uniquely placed to generate data with higher statistical power.” While the image cytometer borrows part of its technology from traditional flow cytometers and microscopes, he believes that the instrument is in a league of its own and cannot be replaced by any of the afore mentioned technologies but rather complements the existing tools. Though it is easy to operate the instrument, investigators can obtain training from the flow core staff to set up the templates of experiments. The main challenge is to analyze the data obtained using the IDEAS software. Students and investigators may find the training modules available on the Amnis website useful to get trained on different assays. An important message that Dr. Hanumanthu would like to give all the investigators is that “apart from sorters and analyzers, the comprehensive flow cytometry core facility at UAB is also equipped with fluidigm micro-fluidics single cell analysis system. Investigators can now isolate single cell and perform qPCR or RNA sequencing. The core is also in the process of acquiring the 10x genomics system that can barcode each cell for downstream genetic analysis.” Students who would like to have more information can visit the flow core at Shelby 271 or contact vsagarh@uab.edu.

UAB PET facility: radiolabeled imaging in cancer

by Shelly Nason

UAB is home to a set of 3 core facilities that are involved in the positron emission tomography (PET) imaging studies on campus: the cyclotron facility, the advanced imaging facility, and the small animal imaging facility. Together, these resources work to produce radiolabeled isotopes that can be used in human or animal studies to utilize a sensitive, non-invasive technique (PET) to quantitatively study biochemical and physiological processes. While PET imaging has been used to detect cancer, this technology has many applications, including prediction of treatment response, receptor status, and oxygenation. This technique is especially advantageous as it only uses nano to micro grams of the radiolabel, reducing toxicity, and has the potential to label almost any target or pharmaceutical. The cyclotron has been at UAB since 2013; however, human imaging studies have recently developed in 2016. Dr. Suzanne Lapi, the director of the cyclotron facility, oversees the production of radionuclides and radiopharmaceuticals for preclinical and clinical trials. Radiopharmaceuticals are drugs labeled with a radionuclide to image a biological process or to deliver a therapy to a specific disease site. Dr. Lapi conducts her own research in this area, but collaborates with faculty that would like to use radioisotopes in their research. UAB's cyclotron facility is unique in that it produces novel radioisotopes with different half-lives, to improve the application of this imaging technique. There are currently 6 radiopharmaceuticals initiated by the cyclotron facility that are in clinical trials and one that has been FDA approved to identify somatostatin receptor status in neuroendocrine tumors. Dr. Lapi sees radiolabeling as improving early response and precision medicine. While she says that PET imaging does not have as high of a resolution as magnetic resonance imaging (MRI), she sees the future of PET imaging as multi-modality with PET scanning in combination with computed tomography (CT) or MRI to create more powerful studies. Different information can be obtained using different radio tracers. The most common tracer is [^{18}F] Fludeoxyglucose used as a marker of glucose uptake, which is commonly used as a tool for cancer diagnosis to identify tumors. As such, this tracer also identifies highly metabolic tissues. The advancement of novel radiotracers, such as [^{68}Ga] DOTATOC, can improve the sensitivity of tumor identification and reduce off-target imaging, as seen from the same patient with both radioisotopes. Dr. Lapi welcomes collaborations with all



[^{18}F]

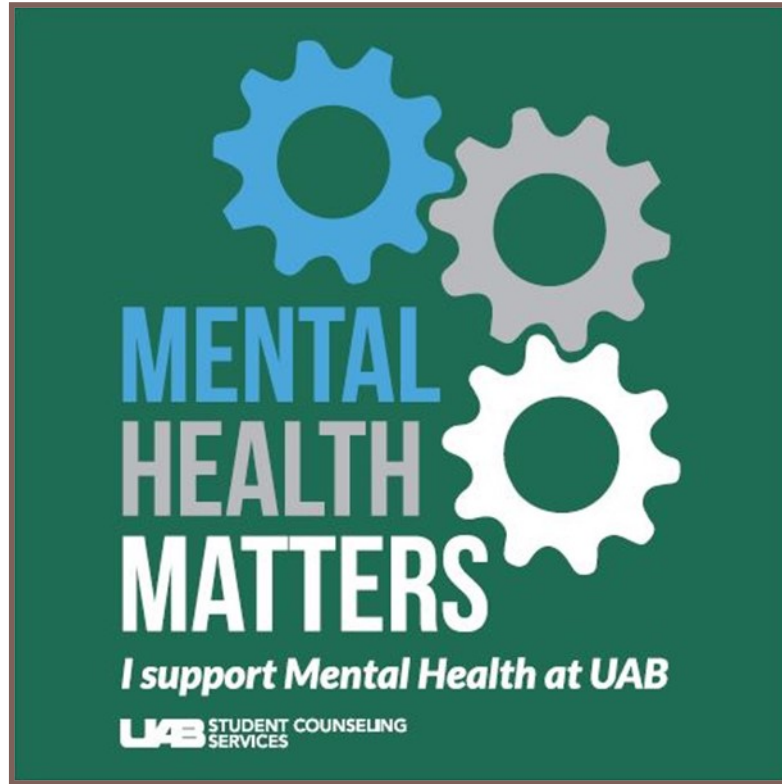


[^{68}Ga]

investigators and is willing to provide tours of the cyclotron facility. She believes that radioisotopes will continue to play an important role in medicine and will require multi-disciplinary expertise, promoting further collaboration between chemists, physicists, biologists, and physicians. Contact Dr. Lapi (lapi@uab.edu) for more information, to schedule a tour, or to discuss how radiolabeling can be used in your research!

Spotlight on Mental Health

by Shelly Nason



It is no surprise that school and life are stressful. Recent studies have highlighted the demanding mental toll of graduate school on students: a 2014 study conducted at the University of California at Berkeley found that 47% of its Ph.D. students showed signs of depression. In light of this, UAB offers a myriad of resources to help undergraduate and graduate students to improve their mental health. Particularly, the graduate school has a dedicated Graduate Faculty

Council on Student Mental Wellness, developed as a partnership between the Graduate of Biomedical Sciences, the UAB Graduate School, and UAB counseling services. The goals of this council are to provide resources, implement policies and programs, and stay attuned to the needs of graduate student wellness. UAB participated in National Mental Health Awareness Week in October by providing free depression and anxiety screenings across campus, as well as stress-relieving massages in the Recreation Center. Previous studies across the nation have established that students are unaware of the resources the school provides, and UAB is promoting awareness of our health and wellness resources through these activities and events on campus. Free counseling services are provided to students year round and special events, such as yoga on the lawn, mental health forums, and guided meditations, are held throughout the semester. UAB fosters an environment that recognizes and promotes mental health awareness for all of its students, increasing student graduation and satisfaction. Utilize these excellent resources to minimize anxiety and depression and to promote a healthful lifestyle! Schedule an appointment online at uab.edu/students/counseling or by calling (205) 934-5816.

Changes in the GBS Office

by Kaithlyn Dorsett

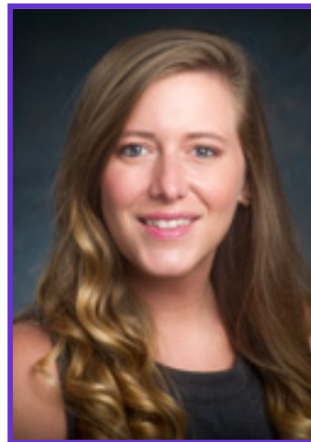
Starting May 1st 2017, changes in the Graduate in Biomedical Sciences (GBS) office were initiated by Associate Dean, David Schneider, Ph.D. We thanked Patricia Matthews, Jasmine Williams, and Nicole Cross for their years of service and dedication to each and every student that joined the Graduate in Biomedical Sciences program, as they moved on to another job and a new position in the School of Health Professions respectively. The GBS office is being restructured under Dr. Schneider's guidance to more clearly define, and create more, specialized positions within the office. This decision was made to provide more consistent support to all GBS students, and provide better support to the faculty. The positions previously filled by Patricia and Nicole were filled with two new faces to the GBS office: Jessica Stephenson and Alyssa Zasada. One important part about the changes being made to the GBS office is that there will no longer be GBS program managers with a specific GBS theme affiliation. The goal of this transition is "to improve overall support that the office delivers to all students while unifying the experience that each student will receive (irrespective of theme)," said Dr. Schneider in an email. The new specialized positions for the GBS office and their managers are as follows: Jessica Stephenson- Curriculum/Website; Alyssa Zasada- Communications/Events; Felita Milon- Finance/Human Resources; Nan Travis- Process Management; Meredith Beatty- Temporary Assistant. The position of office associate is currently vacant, and the role of theme management will fall to the individual theme directors. Overall the Cancer Biology Theme feels this is a great move and we are excited for the improvements to come!



Felita A. Milon, M.S.A.



Nan Travis



Jessica Stephenson, NCC



Alyssa Zasada, M.Ed.

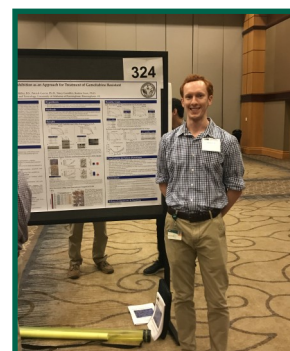
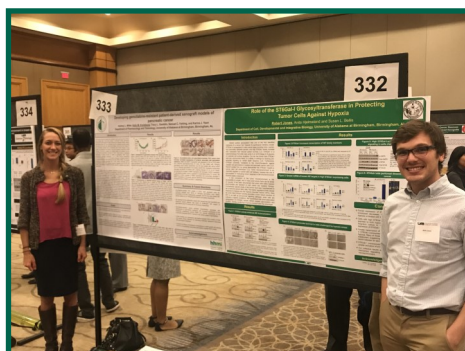
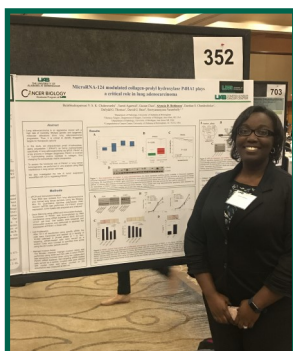
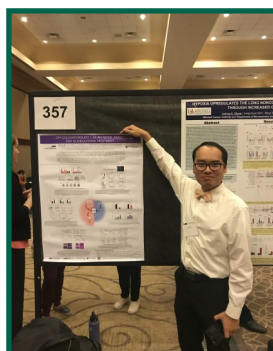
Photos courtesy of GBS website

2017 Comprehensive Cancer Center Annual Retreat

by Sam Febling

The UAB Comprehensive Cancer Center held its annual Research Retreat and Research Competition on Monday, October 30th. With this year's theme, metabolism and cancer, we welcomed renowned researchers from across the country as well as our own GBS Cancer Biology students to present their latest work. Lasker Award winner (2016), Dr. William Kaelin, Jr. of Harvard Medical School discussed the von Hippel–Lindau (VHL) tumor suppressor while giving insight into oxygen sensing, cancer metabolism, and drugging the undruggable. Dr. Utpal Banerjee of University of California, Los Angeles presented his research on metabolic control in cancer pathways. Dr. Jeffrey Rathmell of Vanderbilt Center for Immunology showed us the role of metabolism in fueling T cells in both immunity and tumors. Dr. Kathryn Wellen of Perelman School of Medicine discussed tumor metabolism and the epigenome.

With over 100 abstracts accepted, this was the first Comprehensive Cancer Center Retreat in which participants from institutions across the country (University of South Alabama, Hudson Alpha, Tuskegee, Morehouse School of Medicine and Alabama State University) attended and presented their work. Asmi Chakraborty, a 4th year Cancer Biology student in Dr. Susan Bellis' lab, was awarded the 2nd place Graduate Student – John R. Durant Award for Excellence in Cancer Research for her poster presentation. Her poster, entitled “*Glycosyltransferase ST6Gal-I protects against chemotherapy-induced DNA damage and promotes PDAC progression in vivo*”, sheds light on the role of glycotransferase ST6Gal-I in pancreatic ductal adenocarcinoma (PDAC) progression and chemoresistance. The original work presented by UAB faculty and students display the countless approaches to better understand, manage and treat cancer.



12th Annual Pathology Trainee Research Day

by Ann Hanna

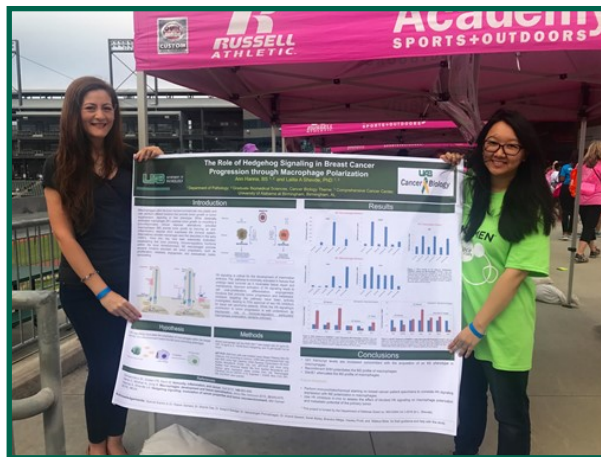
The UAB Department of Pathology hosted its 12th Annual Trainee Research Day on June 27th. Graduate students and postdoctoral fellows training in laboratories affiliated with the department were invited to share their research findings with the department faculty and their fellow trainees. The day encompassed an array of topics ranging from cancer to cardiovascular research. Several of our Cancer Biology students presented the recent advances made in their research projects and made us proud by winning several awards. Hawley Pruitt and Mateus Mota won First and Third Place respectively for the Most Outstanding Research Presentations, and Ann Hanna was awarded the Betty Pritchett Spencer Travel Award for the Most Outstanding Cancer Related Research Presentation.



2017 Annual Susan Komen Run

by Ann Hanna

The annual Susan Komen of North Central Alabama Race for the Cure event was held on October 7th at the Regions Field. Breast cancer survivors and family members alike participated in the race to raise funds for the organization. The funds support cancer research and educational programs to encourage community awareness of breast cancer, available screenings, and treatment options. This year, the organization raised \$350,000.



Several of our students and faculty members participated in the event. Two of our Cancer Biology students showcased their research projects to share their findings with the community. Overall, the day was a celebration of scientific progress, patient survivorship, and community awareness.



2017 Blazer Bolt for Brain Cancer

by Kaithlyn Dorsett

The annual event "Blazer Bolt for Brain Cancer" held a 5K and 1 mile fun run in Homewood on the 21st of October this year. This event was a great success with over 30 teams and hundreds of participants. All proceeds went directly to the University of Alabama at Birmingham Division of Neuro Oncology and Children's of Alabama Neuro Oncology. The goal of this event was to raise money for research of adult and pediatric brain cancer, as well as patient support services. UAB and the Cancer Biology Theme are proud to be involved in so many fundraisers and awareness campaigns with the direct goal of improving the lives of cancer survivors.

Awards and Accolades

by Sam Fehling

Our New Publications

- Garcia PL, **Miller AL**, Gamblin TL, Council LN, Christein JD, Arnoletti JP, Heslin MJ, Reddy S, Richardson JH, Cui X, van Waardenburg RCAM, Bradner JE, Yang ES, Yoon KJ. JQ1 induces DNA damage and apoptosis, and inhibits tumor growth in a patient-derived xenograft model of cholangiocarcinoma. *Mol Cancer Ther*. 2017 November 15; PMID: 29142067
- **Chakraborty A**, **Dorsett KA**, Trummell HQ, Yang ES, Oliver PG, Bonner JA, Buchsbaum DJ, Bellis SL. ST6Gal-I sialyltransferase promotes chemoresistance in pancreatic ductal adenocarcinoma by abrogating gemcitabine-mediated DNA damage. *J Biol Chem*. 2017 Nov 30; PMID: 29191829
- Jin L*, **Vu T***, Yuan G, Datta PK STRAP promotes stemness of human colorectal cancer via epigenetic regulation of the NOTCH pathway. *Cancer Research* 2017; 77 (20), 5464-5478. (*Co-first author).
- Zhang W*, Zhang B*, **Vu T**, Yuan G, Zhang B, Chen X, Manne U, Datta PK. Molecular characterization of pro-metastatic functions of $\beta 4$ -integrin in colorectal cancer. *Oncotarget*. 2017; 8:92333-92345. (*Co-first author).
- **Kayla F. Goliwas**, Jillian R. Richter, **Hawley C. Pruitt**, Lita M. Araysi, **Nicholas R. Anderson**, Rajeev S. Samant, Susan M. Lobo-Ruppert, Joel L. Berry & Andra R. Frost. Methods to Evaluate Cell Growth, Viability, and Response to Treatment in a Tissue Engineered Breast Cancer Model. *Scientific Reports* 7, Article number 14167: (2017).

Presentations

- **Jia Cui** and William J. Placzek. Post-Modulation of MCL1 by PTBP1 Regulates Cellular Apoptosis Induced by Antitubulin Chemotherapeutics. *Drug Discovery & Development Colloquium 2017, Little Rock, AR*.
- **Rachael Guenter** and Stephen Aller. Purification of the ECD1 in ABCA1 transporter for high-resolution x-ray crystallography. *Update on the Segrest Project: Multidisciplinary Approaches to HDL Structure, Assembly and Function*.

New Graduates

- Congratulations to **Kayla Goliwas and Hawley Pruitt** for successfully graduating this semester.

New PhD Candidates

- Kaitlyn Dorsett, Samuel Fehling, Tesh Lama-Sherpa, Mateus Mota, Rachael Orlandella, and Laura Stafman successfully passed their qualifying exams to advance towards candidacy this semester.

Awards and Honors

- **Jia Cui**: awarded the UAB Carmichael Scholarship (08/2017 – 07/2018)
- **Asmi Chakraborty**: awarded 2nd place for her poster presentation at the 2017 Comprehensive Cancer Center Annual Retreat, entitled “Glycosyltransferase ST6Gal-I enhanced PDAC progression in vivo and protects against chemotherapy-induced DNA damage mediated apoptosis in pancreatic adenocarcinoma cells.”
- **Kaitlyn Dorsett**: Awarded 1st place at CDIB Retreat for her oral presentation, entitled “Sox2 drives ST6Gal-I expression and activity to promote a CSC phenotype in ovarian cancer”.
- **Ann Hanna**: awarded third place for her poster presentation in the GBSO symposium; awarded Betty Pritchett Spencer Travel Award for the Most Outstanding Cancer Related Research Presentation at the Pathology Department Trainee Research Day.
- **Aubrey Miller**: Awarded Pre-Doctoral Training in Cell and Molecular Biology (CMB) T-32 training grant. July 1st 2017 – June 30th 2018.

#justphdthings

by Ann Hanna

Fun Fact:

The area of microbiome research has been heavily investigated in recent years. Earlier this year, scientists found that gut bacteria Gammaproteobacteria metabolize the gemcitabine administered to pancreatic cancer patients, essentially rendering it ineffective. You can read more about the study here:

<http://science.sciencemag.org/content/357/6356/1156>

