

PSM Newsletter

Fall 2014/Winter 2015 mbs.rutgers.edu



Message from the Executive Director Dr. Deborah Silver

Welcome to another exciting academic year!

Over 150 new students started this year, some of whom are pictured below at the Fall 2014 orientation. There are many new workshops and events planned and many more to come. All of the events are listed on our web site - so check often! We have also instituted some new features this year including the "Course Insider Report" which is emailed every semester to highlight and explain course offerings.

If you have suggestions for new features or classes, please let us know – we always want to hear from you!



Fall 2014 New Student Orientation

Inside This Issue

- 1 Message from the Executive Director
- 2 Alumni Events
- 3 Alumnus Spotlight Shawn Chen
- 4 PSM International Scholars
- 5 Global PSM
- 6 Rutgers PSM Visits Capitol Hill
- 7 PSM RA & DDD Event and RiSE Symposium
- 8 RU PSM at NJBIA Meeting
- 8 PSM sponsors AWIS Event

Fall 2014 Orientation









PSM Graduation Dinner







PSM Alumni-Student Mixer



We love our Alumni!



New MBS Graduates!

Congratulations to our newest Graduates! 66 Students received their Master of Business and Science MBS degree this past spring. Graduates joined the PSM Faculty and Staff at the Rutgers Club for the 3rd celebratory graduation dinner. We wish all of our graduates the best of luck in the future and look forward to staying in touch!

PSM Alumni – Student Mixer

Current MBS Students received first hand information from MBS alumni at the program's second annual PSM Alumni-Student Mixer over spring break. A panel of six MBS alumni spoke about their experience while in the program, how the degree has impacted their professional life and answered questions. Students and alumni enjoyed networking, exchanging stories, information, and advice.



2014 MBS Alumni Panelists



(L-R) Chad Watson, Sustainability; Brittany Internoscia, Biotechnology & Genomics; Bond Wann, Kinesiology & Applied Physiology; Rohit Yerneni, Electrical & Computer Engineering; Ellen Speace, Sustainability; Adolfo Pertuz, Biotechnology & Genomics.

-SAVE THE DATE-

The PSM Program invites all of our Alumni to our future events!

- PSM Alumni-Student Mixer, March 16, 2015, 6pm
- PSM Alumni Only Event Private Tour of Edison Labs, Early Summer 2015

The Beginnings of a Start-Up: An article from one of our Alumni, Shawn Chen on his start-up venture

I'm Shawn Chen, Rutgers MBS Alumni and co-founder of the startup company, Derivative/d. We're an early stage company making warehouse robots. I'll describe some of my experiences below, which may be useful information if you're interested in the startup community.

Compared to my 9-5 job, working at a startup is a significantly different experience. Small startups aren't big enough to have business divisions, so it may be necessary to participate in tasks like finance and sales. You can have dedicated members that handle these tasks. However, the small size means it's still a good idea to be aware of these aspects of the company. Though I focused on technology development, I also helped out with finances and marketing. In this environment, I was able to apply a lot of what I learned in the MBS business courses.

An important aspect in start-ups is reducing risk. By nature, what we do is uncertain, so mitigating points of failure is a key to success. For example, instead of assuming our product will be desired, we constantly met potential customers to discover their needs and problems. In this regard our first business focus is not sales or marketing, but customer exploration. When making the product, my goal was to match my customer's needs, rather than simply completing requirements. My metric for success is not whether I complete my project, but how much product can be sold.

The working environment is more free form as well. We worked directly out of a rented apartment, located near a lot of potential customers. Nowadays, there's a lot of places that cater to the startup community. We were able to shore up some of our weaknesses by frequenting these locations and working with other experts. Of particular note is the "makerspace", which is a public space where fellow hackers can meet and bounce knowledge off each other. In addition, I often communicated with potential technical partners to discuss technology licensing.

Equity can be an awkward subject to discuss, but is essential to a healthy startup environment. There are a lot of articles on the different terms that can go into defining ownership stake. It's a good idea to have everyone read such papers and set aside a dedicated time to discuss and clarify your company's equity policy.

We didn't pursue this track, but many startups participate in accelerators. In return for a small percentage of the company, these programs provide starting funds, a conductive place to work, and connections to potential investment. It's a good idea to try them out regardless, since the application process can help you think about your company in more detail.

All in all, working at a startup has been a unique adventure, and I was able to grow as a person from the experience. I was able to apply a good amount of lessons I've learned at the MBS program, and will continue to do so.



MASTER OF BUSINESS AND SCIENCE (MBS) MBS Alumnus, Class of 2012

Shawn Chen is co-founder of the startup company **Derivative/D**, focused on warehouse automation. The goal of the company is to improve operation efficiency through self driving processes. Currently being developed is a software application to compile warehouse data and generate storage suggestions. He is responsible for product development, managing the architecture, and ensuring that all customer requirements are completed on time. http://www.derivatived.com/



Proof of concept robot built at a makerspace Shawn is a member of.

FALL 2014/ WINTER 2015

Rutgers PSM Welcomes International Scholars

US AID STRIDE Scholars from the Phillippines



Pictured above (L-R), Dr. Mark Robson, Micaela Perlada, Dr. Deborah Silver, Peter

Fall 2014: Rutgers University welcomed the first three US STRIDE scholars from the Phillippines. USAID (United States Agency for International Development) awarded scholarships for its STRIDE (Science, Technology, Research, and Innovation for Development) program to support the Phillippines government growth in science, technology, and innovation. USAID is partnered with Rutgers in a 5-year \$32 million project. The Rutgers US AID STRIDE portion is headed by Dr. Mark Robson.

Tenido, Arlan Rodeo, Lester Sabo (Rutgers STRIDE Coordinator), and Dr. Sangya Varma.



The PSM Program is excited to welcome Fulbright Scholars from Brazil & Panama. As PSM Programs grow across the globe, universities are awarding Fulbright scholarships to qualified graduate students to study at the graduate level in the United States. Similar to the goals of the Phillippines, Brazil and Panama are seeking to reinforce and grow their science, technology and innovation fields. The Fulbright scholars in the picture above are (L-R): Angel Jurado (Panama), Cassio Machado (Brazil), Felipe Herter (Brazil), Milton Rucks (Brazil).







Dr. Mark Robson is the Chair and Professor of the Department of Plant Biology and Pathology as well as the Dean of Agricultural and Urban Programs at Rutgers University -SEBS. Dr. Robson traveled in August earlier in the year to meet the incoming Filipino students at their university currently there are four Filipino students at Rutgers, the grant is funded by USAID to bring PSM students to the US and also to establish 10 PSM programs in the Philippines. Dr. Robson is one of the curriculum coordinators for the Rutgers PSM MBS Global Agriculture Concentration.

FALL 2014/ WINTER 2015

PAGE 5

SCIENCEMEETSBUSINESS

Rutgers PSM Global Relations

International Summer Program Students from Korea



(L-R) Dr. Deborah Silver, Jihuen Yu, Inkyu Han, Myung Seop Soek, and Dr. Sangya Varma after the students completed their International Mini-MBA Summer Program.

The PSM Program and the PALS Office (Program in American Language Studies) welcomed three students from PSM Programs in Korea to the International Mini-MBS Summer Program. The students experienced the MBS on a smaller scale taking Principles of Communication & Leadership, english reading, writing, presentation courses, marketing courses, and resume building, along with trips to incubators. The students were also able to audit courses in Ethics and Intellectual Property.

Dr. Deborah Silver Visits Korea to Discuss PSM Programs



As PSM Programs gain popularity globally, Rutgers has been building relationships with universities worldwide. Rutgers PSM has relationships already in place at Karolinska Institutet in Sweden, Iceland's School of Energy in Reykjavik University in Iceland, Shandong University in China, Korea Institute of Technology and University of Korea, Sungkyunkwan University (SKKU) in Korea and many others. This past summer, Rutgers PSM signed a Memorandum of Understanding with Hong-Ik University, Korea. With many countries' governments in a race to strengthen their areas in science, technology and innovation, Korea has been working to create PSM Programs at their universities to provide desirable workers for today's global market. In May, Dr. Silver traveled to the city of Daegu in Korea and met with many government and academic officials to discuss the impact and growth of PSM Programs in Korea and globally. Dr. Silver and Dr. Varma plan to visit India during winter 2015 to discuss partnership opportunities with institutions of higher education.





Korea Tech Professor, Dr. Nohyu Kim, visits Dr. Deborah Silver and the International MBS Summer Program students from Korea. (L-R: Myung Seop Soek, Inkyu Han, Dr. Deborah Silver, Dr. Nohyu Kim, and Jihuen Yu)



Dr. Sangya Varma (L) and Dr. Deborah Silver (R) with Dr. Stephane Oh from Hong-IK University, Korea visited Rutgers University to learn more about our PSM Program.

Rutgers PSM Visits Capitol Hill

Dr. Deborah Silver invited by U.S. News as a Panel Speaker in Washington, D.C. for the STEM Solutions Conference



Dr. Deborah Silver spoke on a panel at the *U.S. News* "STEM Solutions" conference in Washington, D.C. from April 23-25, 2014. It was *U.S. News & World Report's* third national conference supporting STEM education and workforce development. Dr. Silver spoke about the importance of professional science master's programs and more professional courses for science graduate students. The conference included many thought leaders on STEM education including the former CEO of Lockheed Martin, President of UMBC, Co-Founder and CEO of code.org and the President of Rensselaer Polytechnic.

MBS Intellectual Property Course Trip to the U.S. Patent Office



The Rutgers PSM Fundamentals of Intellectual Property course visited the United States Patent and Trademark Office on June 16, 2014. Students had the opportunity to visit and tour the official USPTO building and museum, and observed a panel of speakers from The Patent and Trial Appeal Board. In addition to meeting and speaking with USPTO officials, students also had an opportunity to meet Professional Science Master's Alumni who work at the USPTO office.



Panelists at the U.S. News STEM Solutions Conference in Washington, D.C. (L-R: Anne McGrath, Managing Editor, U.S. News & World Report (moderator), Patrick S. Osmer, Ph.D., Vice Provost for Graduate Studies and Dean of the Graduate School, Ohio State University, Deborah Silver, Ph.D., & Sean R. Gallagher, Ph.D., Vice President and Chief Technology Officer, UVP) *Photo by Jenifer Morris, Team Fazio Photography and Brett Ziegler, U.S. News and World Report.



A peek inside the U.S. P.T.O. building in Washington, D.C.



USPTO panelists speaking to our students.

FALL 2014/ WINTER 2015

SCIENCEMEETSBUSINESS

MBS Regulatory Affairs and Drug Discovery & Development Annual Event





Phu Huynh from Hays Recruiting speaking to MBS students.

The MBS Regulatory Affairs and Drug Discovery & Development Annual Event is an interactive session with panelists from industry to learn, firsthand, skills that are desired in the workforce. Students mingled with recruiters from Hays, Aerotek, Makrocare, and Pharmalink. They also had the opportunity to network with professionals from Sanofi; Volpe and Koenig, PC; Pharmalink Consulting; Makrocare; Bayer; and Caraco Pharmaceuticals Labs . Pictured above are 2014's Panelists with Dr. Sangya Varma and Dr. Chand Shista, Professors of Regulory Affairs courses.



MBS students networking with panelists and recruiters during the 2nd Annual MBS Regulatory Affairs and Drug Discovery & Development Event.



RiSE at Rutgers Summer Research Symposium

In the picture L-R: James Z. Jackson, Rensselaer Polytechnic Institute, NY; Nerla Jean-Louis, Cornell University, NY; and Sangya S. Varma, Rutgers University, NJ

Dr. Varma attended the 'RiSE at Rutgers' Summer Research Symposium on Wednesday July 30, 2014. RiSE (Research in Science and Engineering) is a summer undergraduate program sponsored by the Office of Institutional Diversity and Inclusion (OIDI), in collaboration with the Graduate School - New Brunswick. Undergraduate students from other schools, preferably from underrepresented, disadvantaged and first generation college families, are selected from a competitive national pool to work with Rutgers graduate faculty. Dr. Varma also conducted a workshop on 'Communicating Science Effectively' and Dr. Silver talked about 'Project Management' as part of the professional development component of the RiSE program on June 25, 2014.



The Spring 2014 Fundamentals of Regulatory Affairs class.

FALL 2014/ WINTER 2015

PAGE 8

SCIENCEMEETSBUSINESS

Rutgers Attends the NJBIA Meeting

Dr. Sangya Varma attended the New Jersey Business & Industry Association Annual Legislative Reception on February 25, 2014 in Trenton, NJ. This meeting honored the members of the New Jersey Legislature. With over 200 attendees, Dr. Varma networked and spoke with government dignitaries and NJBIA staff. Dr. Varma had the pleasure to meet and speak with Mr. Upendra Chivukula, Democratic Deputy Assembly Speaker, who spearheaded New Jersey's first "Big Data Bill" which paves the way for NJ to be the leader in Big Data by officially recognizing the New Jersey Big Data Alliance. For more information, please visit: <u>https://ored.rutgers.edu/content/governor-signs-bill-designatingnj-big-data-alliance-state%E2%80%99s-advanced-cyberinfrastructure</u>





In pictures above (L-R) Melanie Willoughby, SVP, NJ Business & Industry Association; Upendra J. Chivukula, Deputy Speaker, NJ General Assembly; Dr. Sangya Varma, Director, PSM Program; Dr. Samuel D. Thompson, Senator, 12th District; Dr. Webster B. Trammell, Vice President of Development, Community and Government Relations.

PSM Sponsors AWIS Event, October 30, 2014



The PSM Program sponsored an Association for Women in Science AWIS event titled *Clinical Data Management, Trends in US & The Emerging Markets* that featured guest speakers from Quartesian and Harel Consulting.

L-R Benjamin Jackson, Co-Founder, President & CEO, & Tanya Chowdhury, VP Audit, Compliance & Contracts of Quartesian; Kamana Misra, President, AWIS; Jacob Harel, Founder & Flora Ma, Senior Consultant of Harel Consulting; Sangya Varma, Director, PSM; and Smita Varia, VP, AWIS.



Dr. Chris Molloy, Senior Vice President for Research & Economic Development was a distinguished lecture speaker for the PSM Lecture Series. He spoke to students about the merger of Rutgers University and UMDNJ. He is pictured above with PSM students and Dr. Sangya Varma.



Ines Czechowski, PSM Program Coordinator, attends the NJ Big Data Alliance Symposium in April 2014.



Lisa Bien, writer, public speaker, and professor at Temple University, presented a workshop for MBS students on Personal Branding on February 20, 2014.