

The MEMorandum

FALL 2007

Points of Interest

- The program has grown 30% for Fall 2007
- MEMPDC has successfully coordinated professional and social activities such as Mock Career Fairs and Campout

DIVERSITY AS A TOOL FOR SUCCESS

By Bridget Fletcher

Industry today is a complex web of global relationships; the diversity among the student population in the MEM program will help this class to smoothly transition from diverse classroom to diverse working environment.

The men and women of this year's MEM class are the most diverse yet. With students from all over the world and undergraduate degrees from all over the engineering spectrum, they will be ready to face the challenges of the global economy head-on. They have learned from each other and grown in ways that would be impossible if they all had the same background. Each student brought a unique perspective to the program and a willingness to share and to listen.

Among the changes in the MEM student body profile, has been an increase in the number of female students. At 32%, up from 25% last year, the women of the MEM program are among our brightest. The changing face of business includes a stronger female presence and we are delighted that the same has held true for this class.

As a result of greater gender, ethnic, and educational diversity, the class of 2007-2008 will take with them, not only the classroom knowledge that they have received from our faculty and staff, but a deeper understanding of the diversity in the global workplace that they have gained from their classmates.



MEM Class of 2008 students, from left to right, Harika Vedula (India), Thariq Kara (Zimbabwe), Dan Fishman (USA), Jesus Álvarez (Puerto Rico), Rahul Shetty (India) and Emma Cabol (Turkey)

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CLASS of 2007 MEM EXPERIENCE

By Genoveva Wong (MEM'07)

After a wonderful year, last April 13th, we celebrated MEM Class of 2007's graduation ceremony. Among us the feelings were mixed; joy and excitement for our accomplishments and future goals, but at the same time, nostalgia and sadness for the wealth of good memories we have left behind. Fifty five MEM alumni left Duke and spread across America, Paris, and Dubai, among other places, to spin off their careers. Our alumni have secured positions in many areas, including project management and consulting, for companies such as Boeing, Deloitte, Merck and Accenture, among others.

The accomplishments and new traditions established by the MEM Class of 2007 were not only out-

standing in academics, but also in extracurricular activities. Just to mention a few:

1. ImaGyn, formed by five MEMers and led by Theoderick Tam, won \$100,000 in the CUREs NonProfit Business Plan Competition

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Class of 2007 Graduation Speakers: Miguel Bubis (Venezuela), George Robinson (USA) and Payman Tayebi (Iran)

CLASS of 2007 MEM EXPERIENCE

(Continued from page 1)

- MEM intramural basketball team, coordinated by Michael Curcio, won the first ever MEM Championship at Cameron
- Sylvain Hassen's team Oncoscope won the Duke Startup challenge and received a \$30,000 award
- iHeart, formed by eight MEMers and led by Glen Rabito, won \$5,000 in the Duke Startup Challenge Tradeshow
- A team led by Jordan Sangerman put together the first MEM yearbook
- Kareem Lee launched his own record business

- MEMers recruited new students across America, Europe and China

"Even though we have only had one year at this school, our accomplishments have been far from limited. Like George said, what we have learned this year surpasses textbooks and classrooms. To be able to combine engineering and business talents is remarkable, but to do so with cultural intelligence and camaraderie is the special teaching that makes us unique. 100% MEM isn't about being the same, or being different, but about how we use our similarities and differences to form common friendships." - Payman Tayebi, Student Speaker Class of 2007

Congratulation Class of 2007! Best of Luck!

LIFE (AT MICROSOFT) AFTER MEM

By Nishanth Lingamneni (MEM'07)

After graduating in December 2006 and taking a quick vacation, I started working as an Associate Product Manager at Microsoft Corporation in Redmond, WA. Although I had interned at Microsoft before and had other business experience through practicum courses offered at Duke, the fact still remained that this was going to be my first full-time job.

I currently own product management for Windows Defender, an anti-spyware solution offered free to genuine users of Windows. I also have responsibility for creating vision, messaging and positioning frameworks for other Microsoft anti-malware initiatives. In the coming months, I plan on taking ownership for consumer security in the next version of Windows.

A typical week as a product manager in Windows Client Marketing requires me to meet with my product's stakeholders (who could be lawyers, business development managers, and other product managers, among others) to reach consensus on features, direction and future deployment of my products. I also need to sync with my program management team to learn about on-going project progress, plans and to provide and collect feedback. Sometimes I need to search for or request market research pertinent to my products.

Now that I spent a few months working, I realized that I gained many skills I need as a product manager at Microsoft during my time at Duke. For instance, a typical work week at Duke required me to attend at least 4-6 meetings and lead 2-4 more. This helped build my cross group collaboration metric, which is a vital skill for a product manager. I also had the opportunity to conduct market research for a few courses, such as *Commercializing Technology Innovations* and the *Strategic Planning Practicum*, which is helping me frame my own market research.

Apart from work, I've also had the opportunity to attend a couple of large-scale Microsoft conferences such as Microsoft Global Experience (MGX), an annual Microsoft national & international sales force conference held in Orlando, FL. I also attended the TechReady5, a

semi-annual gathering of technical folk from around the world held in Seattle, WA. Additionally, I attended Microsoft's Marketing Boot camp, a 2 day workshop instructed by Debu Purohit, from Duke's Fuqua School of Business in Redmond, WA for all marketing college hires. It can be challenging to consistently produce quality work week-in and week-out. To help keep college hires like myself on track, Microsoft encourages each employee to have a peer mentor, who can provide feedback on your performance in the current role and a career mentor, who can help you navigate the enormous machine that is Microsoft.

Not all is work; Microsoft has fun activities such as team morale events like a power boat scavenger hunt and bar-tending for my team by Lake Bill (a small pond between the oldest Microsoft offices in Redmond) as well as several college-hire social events.

To top it all off, I was given the opportunity to return to Duke and participate in recruiting at the Fall 2007 Career Fair and Tech connect - I was even given the privilege to be the lead presenter at Microsoft's information session at Duke!

All in all, Life after MEM is.... Good.



On the right, Nishanth Lingamneni—Microsoft's Associate Product Manager

ImaGyn EXPERIENCE

By Theoderick Tam (MEM'07)

Imagine if you had a year to do whatever you wanted. What would you do? Well, I decided to spend my year in Durham, North Carolina, and I discovered adventure here.

My name is Theo Tam and I am an engineer from California. Before beginning the Master of Engineering Management program at Pratt, I designed parts for Lockheed Martin Space Systems Company as a mechanical engineer. I enjoyed life as a rocket scientist, but I quickly realized that an advanced degree would help me get the education and recognition that I would need to pursue my career goals. Looking back at the profile I submitted to the program last year, my goals were to "design medical devices for developing countries, and perhaps start a company in the process."

It happened. This year, my project team designed a cervical cancer prevention device and we won the \$100,000 CUREs Business Plan Competition to start our own non-profit company, ImaGyn. Through the process, I've met with corporate executives, traveled to Haiti with a leading women's health specialist, pitched to angel investors and venture capitalists, directed an MBA student practicum, and my team has been featured in major publications including NPR and Business Week.

This was only possible through the opportunities and resources from MEM. The project started with the New Social Ventures Fellowship. This organization connected us with leading business thinkers in the community; including the original inventor of our medical device, Dr. David Walmer. We met our business mentors, Brent Ward and Abhi Gupta, during the first networking seminar. With the support of these three mentors, the medical, academic and business community welcomed us in and provided resources and insight every step of the way.

I also found community through this experience. My closest friendships here were forged through countless sleepless nights debating business strategy, prototyping in the lab, and preparing for meetings and presentations. We absorbed our course material in real time. By day we studied marketing strategy and project manage-



ImaGyn receiving CUREs Competition Award— MEM students from left to right: Ramakrishnan Balasubramanian, Wu Xiao, Theoderick Tam, Adnan Haider, and Gauravjit Singh

ment and by night we applied it. Brent and Abhi redefined my understanding of mentorship. There were times when I would get three calls a day from them with ideas, advice and encouragement. After taking me through rounds, surgery and other exams in Haiti, Dr. Walmer would sit down and share his insight about the thing that matters most to him—relationships; this drives his passion to love God, his family and the Haitian people. These friends have challenged my thinking both professionally and personally, and they have fundamentally influenced my life perspective.

I hope that my story has been an encouragement to you. I am fortunate to have had these opportunities, but they are not unique to me. The program here opens the same doors to all of its students. If you come with a vision and you are willing to execute, there is a lot in store for you here!

MEM CONTINUES ATTRACTING FULBRIGHT SCHOLARS

By Genoveva Wong (MEM'07) & Mikael Andersson (MEM'08)

Just as his fellow Fulbrighters from Pakistan, Turkey, Germany and Panama before him, Mikael Andersson, a Fulbright Scholar from Sweden joined the MEM Class of 2008. During all his undergraduate studies in Sweden at Chalmers University of Technology, he had his mind set on completing a graduate program in the States. Mikael says that receiving the Fulbright scholarship was something he had not expected, but it opened the door to a whole new world of opportunities in the States.

Having looked at different rankings and trying to figure out what programs and schools would best fit his interests, it was finally the Fulbright Commission that recommended the MEM program at Duke. "Looking into it more deeply, I found the combination of business and management studies in an engineering setting to be intriguing. So after another round of applications to the different schools of interest, Duke being one of them, I finally got the great

news that I was accepted...and here I am!", said Mikael.

The Fulbright program aims to create global citizens through its scholars and Mikael is living proof of it. Mikael commented "since my first study abroad experience, an exchange year in High School spent in the small town of Marietta Ohio, I have been interested in foreign studies and eventually working internationally." He has studied abroad in France and has traveled to India, where he visited Bangalore, Chennai, Hyderabad and Mumbai. His future plans include visiting China, Japan, and Australia.



Mikael Andersson

MEM STUDENT RESEARCHERS EXPLORE GLOBALIZATION AND TECHNOLOGY INNOVATION

By Ben Rissing (MEM'06)

Over the last two years, the Global Engineering and Entrepreneurship @ Duke (GEE@Duke) research group has been exploring current issues in engineering workforce supply, US immigration, domestic startups and global intellectual property (see www.globalizationresearch.com). This semester 11 MEM graduate students joined this team as core researchers. Together this multi-national and interdisciplinary team of MEM students includes researchers from six different countries and eight industries. They are collaborating with engineering, business, sociology and economics professors at Duke and Harvard Universities on three unique research projects with the potential to gather far-reaching results.

The first of these projects seeks to identify future waves of outsourcing activity targeting innovation work. To accomplish this, MEM researchers Jaineel Aga, Gauravjit Singh, Mingang Fu, Tanya Srivastava, Aaron McQuaid, and Kazuhiro Mizuta are producing a series of case studies discussing Innovation and Research and Development (R&D) work that is being located in developing countries. The first reports in this series will target India; the second series will explore the environment in China. This work will build upon site visit research in India and China gathered by Pratt Executive in Residence Vivek Wadhwa, Harvard Research Director John Trumpour and Harvard Fellows Pete Engardio and Ben Rissing. Ultimately, these case studies will provide a valuable window into how innovation work in many established industries is becoming unbundled,

providing smaller niche players access to previously inaccessible 'high-value' R&D work.

The second project focuses on intellectual property (IP) clusters around the globe. MEM students Carl Zeh, Aniket Patil and Ravi Chandra are working with Fellow Ben Rissing and the Deputy Directors of the World Intellectual Property Organization (WIPO) to mine every WIPO patent application from around the globe filed in the last decade. This team will be analyzing millions of inventors and measuring how the location-based concentrations of inventors have shifted over time within key industries.

This semester's final research project focuses on startup activity in the United States. MEM researchers Molly House and Baris Guzel are leading a part-time student team to complete a series of interviews with domestic startup founders. Ultimately, they will obtain demographic information on these US founders' educational backgrounds and entrepreneurial vision.

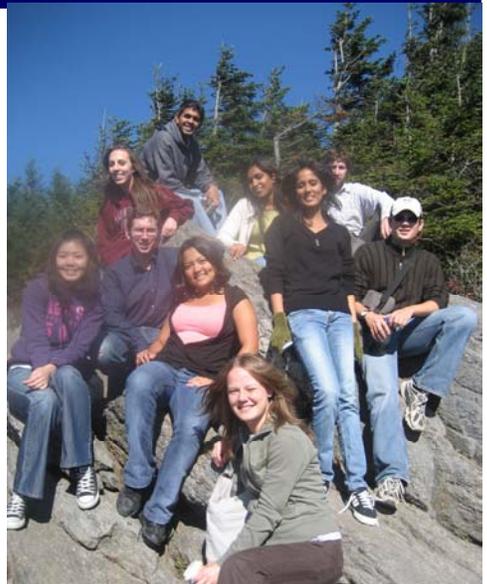
Today globalization is rapidly changing the face of commercial enterprise, the roles of developing countries, and the power of individuals. Students in the Masters of Engineering Management Program at Duke University are on the forefront of research that addresses some of today's most interesting engineering, business, and policy questions.

MEMPDC IN ACTION

By Genoveva Wong (MEM'07)

The MEM Program Development Committee continues working to strengthen our program by organizing different activities that aim to help our new students in their job searches and with networking. For instance, one of our first activities was a Mock Career Fair organized by our Career Development subcommittee. In this exercise, the MEM class of 2008 had the opportunity to interact with the Class of 2007 students, who had previous work experience in different sectors, to simulate the Career Fair setting. The mock was conducted the day before Duke's Fall Term Career Fair to provide our students with timely feedback on their approach and to provide insight in the following sectors: consulting, finance, business analysis, technology, and marketing.

The Internal Communication subcommittee has also successfully organized over 95 MEMers, including current students and alumni to participate in the Annual Graduate Student 36 hour Camp-out for basketball tickets. This activity not only gave the new students their exposure to the Duke's basketball experience, but also was a great opportunity to interact with their peers outside of the academic setting.



MEMers in Smoky Mountains

The Internal Communication Subcommittee also organized fun activities such as a poker night at the beginning of the term and a trip to the Smoky Mountains to enjoy the fall leaves and the beauty of North Carolina. We are planning an international night, and a trip to the NC State Fair, among others.



MEMers hosting the Mock Career Fair

INTERNSHIP IN NEW ZEALAND

By Varadarajan "VJ" Jagannathan (MEM'07)

It was quite surprising the way I started planning for my New Zealand trip. When the HR at the firm in New Zealand called me for a phone interview I was at a beach in Florida Keys for Spring break with other MEMers. I got the internship and flew half way across the world to start my internship at Auckland - the city of sails.

My job involved Brand Analysis, hence I got to travel the country at my company's expense. It was the first time I was going backpacking. Traveling alone, I felt would take me far out of my comfort zone. As it turns out, a couple of months and a few bungee jumps later I felt completely at home! Modern day commercial Bungee jumping was invented in New Zealand and my boss wanted me to experience the true New Zealand spirit. He was basically paying me to jump off the bridge claiming it was "orientation". So bungee jumping it was and I must admit it is one of the best things I experienced in New Zealand.



VJ bungee jumping

So after the first two weeks in Auckland, I packed my backpack and flew down to Queenstown the "party" capital of New Zealand and started my backpacking journey from there. The landscape of New Zealand is breathtaking, the scenery changed so rapidly over a very small geographical area. After a couple of days of working at Queenstown and weekends eating burgers at Furgburger (You cannot miss this place if you ever visit New Zealand, they have the best burgers in the world!), I got on a bus to take the 7 hour journey to Christchurch. Christchurch is a city with a strong love for Rugby and punting on the river. After spending a few days at Christchurch and doing some "serious" work, I flew over to Wellington, also known as the wind city. The capital of New Zealand is famous for its national museum, the Bee Hive shaped parliament building, and Peter Jackson. As luck would have it, the couple of days I was there, the weather was bright and sunny which gave me enough opportunity to go around Wellington. Peter Jackson's studios, home of the Lord of the Rings, are located at Wellington. Since the movie's release, New Zealand has seen a huge increase in tourism.

Next I headed to Taupo, the "sky diving" capital of the world. When I got there, I was quite apprehensive of being talked into jumping off a plane at 12,000 feet, but as expected I got talked into jumping off a plane and sky dived in the vicinity of Mt. Taranaki. At 12,000 feet the view of the mountain is absolutely breathtaking. I did check be-

fore jumping though with the jump master as to how many times in his career has the parachute failed to open in the first time. And his reply was 3 out of his 4672 jumps it failed- thank God for backup! I am really glad I did the sky dive and was ready to move on to Rotorua.

Rotorua has a fantastic geo-thermal history. The backpacker hostel where I stayed gets all of its energy from the Geo Thermal springs. Rotorua is also famous for its world class sulphur spas. The only problem is that one trip to the Spa and you would smell like a rotten egg for two days. But then since I was sinking in Kiwi spirit as much as possible I decided to go for a dip in the sulphur pool but I don't think I smelt too bad after a couple of hours, at least I claim that. My last destination before I headed back to Auckland was the Bay of Islands in the northern part of New Zealand. I was looking forward to finally catching some sun on the beach and eating world famous Kiwi Ice Cream. Here is an interesting fact, New Zealand has the highest per capita consumption of ice - cream and a definite must try is the Hokey-Pokey flavor (Kiwi ingenuity at its best!).

My boss wanted me to take a few extra days off at Bay of Islands to relax and take a break from traveling! I was more than willing to do that. It also gave me the chance to experience the rich history of the Bay of Islands. The treaty of Waitangi was signed at the Bay of Islands and is a very important event which sought to bring peace between the local Maori's and the British. Many travelers also dive off the Bay of Islands and pay homage to the Rainbow Warrior which was a ship used by green peace. After spending a week at the Bay of Islands and several ice creams later, I headed back to the big city atmosphere of Auckland.

I was quite nostalgic since I realized that I was going to leave New Zealand and the wonderful people whom I had met. As I started getting ready for my 1,100 mile road trip in Australia from Brisbane to Cairns (Watch out for that article in the next MEMo-



VJ jumping from a plane

randum), I realized how much life had changed after joining MEM and Duke University. I have learned to dream and to dream big, and I now have the confidence to fulfill those dreams.

DR. GLASS' ASSIGNED READINGS ARE GOOD FOR YOUR HEALTH

By Anne Ryan (MEM'08)

Whenever a professor assigns homework that consists of reading a book (and I mean an *entire* book), especially to a class of engineers who expect problem sets and lab reports, it's almost impossible to drown out the loud chorus of fellow classmates groans in one's imagination. This scenario might very well occur in your own mind in a few months when Professor Glass assigns an *entire* book to the students in his management course. To make matters worse, he won't wait to tell you about your homework until the first day of class; he'll assign the book (and associated writing assignment, mind you) over the semester break.

Even I will admit to being more than a bit disgruntled last winter about my holiday assignment. (On the plus side, though, MEMP does give you the book for free!) I definitely procrastinated for a few weeks before even looking at the book's cover; quite frankly, I was not incredibly stimulated by the title "The Eye for Innovation." I greatly feared that I would be bored reading this book, based on my previous experience with (ahem) rather dry academic publications. However, I reasoned that if Professor Glass greatly values the book, then it's more than likely an important read (and also, if there is one teacher you want to impress by showing up prepared for class, it's the Director of your graduate program). Luckily, the student in me won over the lazy vacationer and I finally cracked open the book's binding.

Remember how I mentioned a few sentences ago that I expected to be completely bored while reading "The Eye for Innovation?" Well, I was definitely wrong. The author, Robert Price, weaves a tale of Control Data - a company formed in the late 1950s by a group of constantly innovating achievers. This initially small, Minneapolis-based company actually had the audacity to take on the massive corporate power of IBM (and they won, throughout the 1960s, by building the fastest supercomputers in the world). Mr. Price takes great care to explain that it is not just one person, but every individual employee, who can be credited with the company's success. How can this be, you ask? Well, to get the whole story, you'll have to read the book, but I will attempt to sum it up in one sentence: Control Data employees innovated constantly, in all areas of their jobs (and life), never thought something couldn't be done, and even in the face of failure, they did not give up and instead worked harder until they succeeded. All in all, I enjoyed the book, and it made me look ever more forward to taking Professor Glass's management course.

Not only did Professor Glass continually reference "The Eye for Innovation" throughout the semester (sometimes with specific quotes), but also he invited Mr. Price to teach two of our class sessions. Mr. Price's story and presentations in class were impressive, but they were not as impressive (or generous) as his offer to meet with any MEM student who would like career counseling from him.

I'm not sure how many people took him up on it, but I jumped at the chance to speak with a man who not only accomplished great things in his career but then took it a step further and wrote a book that will inevitably help others on their own paths to success. The hour I spent talking to Mr. Price was the most pleasant work-related talk I've had so far, and although he gave me a lot of great advice, three main points still stand out in my head:

- Concentrate on doing your best job, all the time
- Become aware of opportunities and go for them
- Exploit interests, your own and those of others

Since meeting with Mr. Price, I've tried diligently to incorporate these three ideas into my daily life - and to be honest, I've never felt better. The quality of my work has drastically improved, I wake up excited to go to work and class each day, and my overall attitude is 100% more proactive and vibrant than ever. I used to fear trying tasks for which I had never been coached, but I now work in customer support where new problems and challenges pop up daily, if not hourly. I used to fear submitting my ideas through my company's invention disclosure process, but now I've submitted seven write-ups and am currently working on about ten more. Instead of trying to figure everything out myself, I'm collaborating; instead of just doing my work, I'm constantly trying to think of better ways to function. Mr. Price, even though he may not know it at the moment, has been a great inspiration to me, and I can see it the way I tackle all aspects of my daily life.

At the end of my meeting with Mr. Price, he asked me to write to him and tell him my greatest innovation. I would, I mean, I plan to, but if I can keep innovating in the way that made Mr. Price and his colleagues so successful, each innovation I have will quite possibly be greater than the last. So, at this point in time, maybe my greatest innovation is writing this article. In all honesty, it's a creative, perhaps even innovative way of trying to prevent this year's MEMP class from groaning when Professor Glass assigns Mr. Price's book over the semester break.

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