A mother and her child at a Lahu hilltribe village in northern Thailand, where Smith School students ate dinner and spent the night during a short-term study abroad trip, by Anthony Richards (front cover). “Dreamland of a Photographer” in Shanghai, China—an entry in the 2012 International Photo Contest, by Yifeng Cai (inside cover). A village in the Dadès Valley, Morocco (back cover).
Welcome the World-Changers: UMD’s Social Entrepreneurs Go Global

UMD’s Smith School alumni are leading the way as today’s social innovators by combining ambition, creativity, persistence, business know-how and a strong stomach for risk with the unshakeable conviction that they can change the world.

Shaping Study Abroad Initiatives at UMD

In November, the Office of International Affairs welcomed Graham Hettlinger as the new Director of Education Abroad.

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Welcome the
Today’s social innovators combine all the traits of a successful entrepreneur—ambition, creativity, persistence, business know-how and a strong stomach for risk—with the unshakeable conviction that they can change the world.

Faced with big problems—like shrinking land and water resources, rising energy prices or global poverty—many of us feel overwhelmed. A social entrepreneur feels inspired—this same problem presents an opportunity. They aim to be profitable, but profit isn’t their sole motivator. A thriving ecosystem of public, private and government support services is growing up around them. And many believe that the men and women working in this space—call it a “fourth sector,” as Harvard does—will reshape the way we think of capitalism. And in this new space, UMD’s Smith School alumni are leading the way.

Revolutionizing Transportation
It isn’t easy to make a profit—hopefully, a significant profit—while addressing a pressing societal problem.

Nick Singer ’08 hopes to tackle one of the most serious problems hindering development in Africa: mobility. In rural areas, most roads are nearly impassable by car. Not that many rural Africans can afford even the most stripped-down vehicle. The most common method of transport is a three-wheeled, motorized rickshaw.

Mobius Motors has designed a tough, bare-bones car for East Africa’s rough roads and rural consumers—one with heavy-duty suspension and a tough tubular steel frame, and without costly extras like glass windows or air conditioning. Mobius vehicles will cost $6,000 each and “can go anywhere,” Singer says proudly. “Our parts come from all over the world,” says Singer, who manages the company’s complex global-supply chain. “Long-term, we’d like to use as many local products as we can. But braking or steering systems, anything with complex moving parts or that is safety-critical—right now, we have to source globally.”

The company has completed two prototypes and expects to produce its first 50 vehicles this year. “This year is about market validation and learning,” Singer explains. “We have to put these cars together by hand, and we want to get them in the hands of customers and entrepreneurs on the road to see what they love and where the design needs to be tweaked.”

Increasing the average person’s ability to get around will boost economic development in some big ways. Reliable, affordable cars will help local entrepreneurs get their products to market, improve the delivery of health and education services, and move supplies from place to place more efficiently.
Mobius’ investors are motivated by the social good the company promises, but also by the prospect of a significant return. Mobius is shooting for $2 billion in revenues in 10 years’ time. Singer thinks Mobius is on the right path—and their investors agree.

Singer, a supply chain and marketing major at Smith, never expected to end up in Nairobi, Kenya, where Mobius is headquartered. After graduation he went to work for Deloitte as a consultant on supply chain projects. He enjoyed it, but jumped at a chance to work with an NGO that sent management consultants into the developing world. The work took him to Swaziland for a time, and when he returned to the United States, he searched for another global, socially responsible company to use his talents.

As a Mobius’ supply chain senior associate, Singer traveled about 50,000 miles across four continents over a recent three-month period, visiting potential global suppliers as well as small enterprises in Kenya. He spends a lot of time dealing with the intricacies of government regulations and import/export laws in a country the World Bank ranks among the worst for ease of trading goods across borders.

Still, the career rewards can be substantial. “How many other 26-year-olds are running a global automotive supply chain?” he asks. “In this field, you get to do a lot more a lot earlier in your career. Nairobi in particular is full of social entrepreneurs. Everywhere you go there are people who think unreasonable thoughts.”

“I want to leave my legacy,” says Singer. “If Mobius achieves our goals to revolutionize transportation in developing countries while generating world-class manufacturing capabilities in East Africa, then this region would become globally competitive across numerous industries. No one has done that before. That’s a great thing to be part of.”

Smarter Cities
That sense of mission, of making a big difference to a big problem, is why people become social entrepreneurs, says Lynn Reyes, MBA ’99. “It’s not because things are easy, but because you like to crack tough nuts.”

Reyes is practicing social innovation from inside one of the largest, most corporate environments out there: IBM. After a stint at the World Bank, she went to work as a consultant in IBM’s strategy group focusing on economic development, helping governments of developing countries with fiscal management. She then shifted to the IBM Institute for Business Value, one of the nation’s largest think tanks, where she was the global government lead. She then moved to Dubai with her family to work on IBM’s Smarter Cities business development initiative in the Middle East and Africa.

“We’re looking at how information across systems can be shared and put to work in new, generative ways,” says Reyes. “For example, there’s terrible traffic in Nairobi that affects businesses and people’s lives. How can you use the information that sits in all
kinds of places to make decisions that have value for the long haul?"

Social innovation is easy to pursue at IBM because it is ingrained in the company’s corporate values, says Reyes. "IBM realizes that if we’re going to see the benefits of change, then part of that is making the planet smarter through information technology. We want to help cities deal with the rapid pace of urbanization.”

Social Innovators
That may be the biggest difference between today’s social innovators and the do-gooders of yore, says Melissa Carrier, executive director of the Smith School’s Center for Social Value Creation. This crop of social entrepreneurs cares about measurable impact. It is a rigorous, business-school approach to social change that weds the best of the corporate world with the best of the not-for-profit, social benefits world.

"But when you impart business principles, get industry competitively engaged and think big, social entrepreneurs can discover ways to unleash markets that have failed or have been locked up—and that creates significant positive value for the world around us.”

By Rebecca Winner,
Smith School of Business

Assessing Food Security in Lebanon

Food security is a complex phenomenon that involves availability and access to sufficient, safe and nutritious food. In 2009, Nadine Sahyoun, associate professor in the Department of Nutrition and Food Science, was awarded a Fulbright Scholarship in which she spent a year’s sabbatical at the American University of Beirut (AUB) in Lebanon doing research, teaching and writing. When Sahyoun was working on a strategic plan on nutrition for Lebanon in conjunction with AUB, the Lebanese Ministry of Health and the World Health organization, it became clear that there was no information on the level of food security in Lebanon.

Sahyoun, with colleagues from AUB, developed a food security tool based on U.S. and Yemeni Food Security Scales and adapted it to the Lebanese cultural context. This food security tool was then used to collect data from several vulnerable populations in Lebanon, including Palestinian and Iraqi refugees, settled Bedouin tribes and Southern Lebanese. The results showed the presence of food insecurity, low dietary diversity and body measures that indicate the presence of malnutrition in these populations. The tool, now named the Arab Family Food Security Scale (AFFSS) was validated with the assistance of colleagues at the USDA Economic Research Service. It is the first Arab validated scale that Sahyoun hopes will serve other countries in the region to assess the extent of food insecurity and monitor the situation, including studying the impact of intervention programs on people’s health status. Sahyoun and her colleagues at AUB are now applying for funding to conduct intervention programs as a follow-up to the information they obtained during the initial surveys in the vulnerable regions of Lebanon.

By Rebecca Winner,
Smith School of Business
SUBAKS AND MEDINAS:
Past Meets Present on Morocco and Indonesia Study Abroad Trips

Primates swung in the trees and hornbills flew overhead during a jungle trek through Indonesia’s Gunung Leuser National Park, where a group of 16 University of Maryland School of Public Policy students witnessed the impact of land-use policy in the rapidly developing country over the winter break. At the same time, another group of 15 UMD students explored Kasbahs and Roman ruins during breaks from lectures on topics ranging from Darija (Moroccan Arabic), Islam, the Arab spring in Morocco, the political process in Morocco, Amazigh (the marginalized indigenous people of Morocco) rights and women and family law.

Professor Tom Hilde led the Indonesia trip to Bali, Sumatra and Java, where students witnessed how the opposing pressures of environmental conservation and natural resource development are shaping the country. The class documented its trip in a blog, including a visit to the Catur Angga Batukaru site, which is one of Bali’s oldest and most famous subaks, a system of rice farming. The terraced rice paddies and water temples are beautiful, but as the group learned, they also represent so much more to the Balinese: membership in a community, religious expression and a means for organizing democratic decision-making about scarce resources.

One of the students blogged: “In essence, the Subak is a communal system of rice farming in which scarce water resources are consensually managed through an intricate system of canals and water temples. It is considered a complex adaptive system because it has evolved organically through the trial-and-error experimentation of farmers over thousands of years and continues to adapt based on changing social and environmental circumstances. Considering this profound beauty and importance, it is not surprising that five Subak systems covering 19,500 ha were designated a UNESCO World Heritage Site in June of 2012.”

Professor Madiha Afzal led the group to Morocco, the fifth such trip from the School. The course began in College Park at the end of the fall semester, when students had to complete extensive read-

Shaping Study Abroad Initiatives at UMD:

In November, the Office of International Affairs welcomed Graham Hettlinger as the new Director of Education Abroad. Hettlinger has worked in international education for more than 14 years. He began his career in overseas studies as resident director of the Ohio State - Tufts University Russian language program in Moscow while a graduate student of Russian literature, and went on to manage study abroad programs in Russia, Central Asia, Ukraine and Eastern Europe for the American Councils for International Education for more than eight years. Before coming to Maryland, he directed faculty-led programs at Georgetown University for six years, during which time he designed new initiatives to expand student support overseas and collaborated with faculty to develop new programs in Morocco, Egypt and China. A lifelong student of Russian, Hettlinger has published four volumes of literary translations, including three collections of short stories by Ivan Bunin (the first Russian writer to win the Nobel Prize in Literature), and most recently, Maksim Gorky’s well-known autobiographical work, Childhood.

“It’s very exciting to be here,” he says. “The University’s commitment to international education is truly remarkable. There’s an enormous amount of activity and interest in overseas studies, and we currently run an impressive range of high-quality semester and short-term programs all over the world... I think we’re in a great position now to combine the...
Graham Hettlinger, New Director of Education Abroad

innovative, entrepreneurial thinking that is so much a part of this campus with our overseas programming to develop some very exciting, new initiatives for overseas studies.” Among those initiatives, Hettlinger explains, is the Maryland Social Entrepreneur Corps, a new summer 2013 program that will enable UMD students to work side-by-side with development professionals and community leaders as they create and support MicroConsignment businesses in rural Nicaragua. “I’m hoping we’ll soon be able to launch more programs like this one—programs that combine innovation and entrepreneurship with intensive community interactions, language learning, the practical application of theoretical material and meaningful, substantive service to the communities hosting our students.”

Hettlinger also hopes to increase the number of students studying abroad for longer periods. “I’m glad that UMD has been so successful in developing such a wide range of high-quality short-term programs,” he says. “And I think these programs play an extremely important role in the internationalization of our campus. But I hope too that we will find ways to encourage more and more UMD students to study abroad for longer periods—for a semester or even an academic year.” Prolonged immersion in a new language and culture, he believes, often leads not just to better speaking skills and expanded vocabularies, but also to profound personal and intellectual growth. “It’s been said many times, but it’s still true: when one really adapts to a new culture and language, one begins to recognize the subjectivity of these things, and that can profoundly alter one’s view of the world.”

By Deborah Lake, Education Abroad
Engaging students to be active, responsible citizens and leaders in a complex, multicultural and global society is one of the many challenges the university faces. Beyond the Classroom (BTC), a three semester multidisciplinary living-learning program at UMD, addresses this challenge by helping to prepare its students professionally for a life beyond college through global civic engagement and social change. The program is geared toward upper level undergraduate students, and over its 10-year history has provided students with a variety of international opportunities.

To complete the program, every BTC student participates in an internship in the nonprofit, civil society or government sector. While not required, some students pursue international internships, either independently or in conjunction with a study abroad program. In the past, students have interned in South Africa, Israel, India, Italy and Thailand. Alumna Catherine Irwin worked as a sustainability intern with Green Ghana Project during her semester abroad: “[My internship was] an incredible way to have a structured outlet to get involved in the community and gain insight to how Ghanaians live, how they think about issues, the problems they’re facing, and the solutions we can be a part of. Throughout my work there I was able to meet so many people who had been working on issues such as poverty, substandard education and land degradation.”

Many students also seek internships at globally focused nonprofits. Often they find that they learn a global perspective from these experiences. Senior Andrea Glauber is an advocacy intern with Save the Children: “My experience…is unique because I am able to apply what I learned in Beyond the Classroom about citizen engagement on both a domestic and global scale,” she says.

BTC also sponsors a short-term summer study abroad trip to Indonesia. BTC Director James Riker, a former Fulbright Scholar in Indonesia, examines civil society, democracy and sustainable development on the four-week trip. Serving as an advisory board member for the International NGO Forum on Indonesia Development (INFID), he partners with the organization to expose participants to grassroots human rights and democratic reform work. Through the BTC program, Riker enables students to develop their knowledge building, problem solving and critical thinking about vital civic issues at not only local and national levels but also a global one. “Beyond the Classroom offers ambitious students across disciplines the opportunity to engage on a wide range of diverse and dynamic global issues.”

By Caitlin Haugen, BTC
Continuing the pursuit of innovation and entrepreneurship in collaboration with their international counterparts, students from the Smith School recently traveled to Beijing to compete in the 2013 China Business Plan Competition with teams from five Chinese universities and the Technion Israeli Institute of Technology. The competition, now in its eighth year, was the culmination of a business plan course and a week-long global studies trip to China for Smith School MBA students, led by the Dingman Center.

“Innovation and entrepreneurship is an important topic drawing significant attention from governments and business schools around the world. The capabilities of innovation and entrepreneurship are particularly important for China, which is undergoing a key period of overall economic transition,” says Hongbin Cai, dean of Peking University’s Guanghua School of Management. “Leading the edge of innovation and entrepreneurship education in business schools, the China Business Plan Competition, hosted by Guanghua School of Management in collaboration with the University of Maryland’s Robert H. Smith School of Business, manages to enhance the communication of innovative ideas and cultivate entrepreneurial practices.”

“We are committed to providing MBA students with hands-on global learning opportunities and this competition has been a hallmark of that pledge, as students take advantage of the wealth of entrepreneurial opportunities in China’s flourishing economy,” says G. “Anand” Anandalingam, dean of the Smith School. “We are pleased to continue our partnership with the Guanghua School of Management to offer this rich learning experience to our students and students in China and Israel. Regardless of their home country, MBA students benefit from exploring entrepreneurial ventures in new markets.”

The Smith School awarded a total of $10,000 in cash prizes. Each finalist team was tasked with pitching a plan for a venture that would do business in China or leverage Chinese resources in some way. UMD student Yuan He won the top prize of $3,000 with his pitch for Honeymoon Honey, a plan to rent honeybees to farmers and harvest the honey to make cosmetics. Second place and $2,000 went to Love-Link, a company that addresses vegetable food safety, from a Tianjin University team. A team from Zhejiang University won third place and $1,000 with its pitch for SmartWheel, a high-tech wheel chair. Additional finalist teams were recognized and earned smaller cash prizes.

The competition was the highlight of the Smith School students’ week of exploring venture creation and global operations in China’s rapidly evolving economy. The trip was the conclusion of a three-credit course on global learning experiences led by J. Robert Baum, associate professor of entrepreneurship. The trip also included meetings with successful local entrepreneurs and visits to multinational corporations’ manufacturing facilities to better understand the Chinese market.

By Greg Muraski, Smith School of Business
For an example of global networking that UMD President Wallace Loh sees as an essential ingredient of a great university look no further than the multifaceted collaboration that has grown in the past five years between UMD’s Robert H. Smith School of Business and the Royal Thai Embassy in Washington, D.C. Beginning with a $200,000 “gift” in 2008 to run programs that would promote U.S.-Thai business relations, this collaboration has in the years since brought UMD students and staff together with peers in Thai higher education, business, governmental and non-profit institutions in an ongoing series of joint projects between Maryland and Thailand.

The resulting “Thai-American Business Program” has developed around four foundational goals: creating a better understanding of Thailand, strengthening and developing friendship networks among the younger generations of the two countries, encouraging an exchange of viewpoints and dialogues between Thai and American students, and serving as a forum for visiting business and professional people from both countries to help educate current students and faculty. Major support for this program has been provided by the Smith School’s Center for International Business Education and Research (CIBER), which is funded by Congress to enhance mutual understanding between the people of the United States and other countries, particularly in the area of international business.

Some elements of the Smith-Thai collaboration include an executive education program on logistics, transportation and supply chain management in Thailand; a conference in College Park on Thai-U.S. business relations; short-term study abroad programs to Thailand; and a week-long field trip to Washington, D.C., for students and faculty from Burapha and Thammasat Universities. For the institutions, these activities have laid the foundation for developing ever more exciting collaborative projects. For student participants, these activities have been life-altering and career-shaping.

At the heart of many of these programs have been problem-based learning experiences. The Thai Embassy and Smith’s CIBER created a Global Business Project (GBP) in Thailand for the nationwide CIBER consortium. Teams of students from various CIBERs in the United States, as well as from Burapha University in Thailand, initially came together around consulting projects at four Thai entities—Central World, TC Radio Communications, Burapha University School of Commerce, and Sichang Island municipality. UMD and Burapha University faculty members serve as advisors for the consulting projects, providing guidance...
via weekly videoconferencing meetings. U.S. students travel to Thailand to carry out their consulting projects on site. One recent project focused on a Nissan automobile parts logistics and supply chain company, another on a Thai furniture company, and a third on a travel agency, all of which were looking to expand their services to other ASEAN countries.

The success of the CIBER GBP prompted the Royal Thai Embassy to provide Smith’s CIBER a $50,000 grant to conduct a study, “Strategic Thai Investments in the U.S.,” whose results were presented to the Thai Ministry of Foreign Affairs this past January during the latest winter term study abroad trip. That trip, organized by the Smith School’s Center for Social Value Creation, focused on the cultivation of global citizenship by engaging students in initiatives established by international and Thai organizations to alleviate poverty and disease in Thailand.

The Thai-American Business Program at UMD offers a cogent model for higher education programs in the 21st century. Funding from a number of sources on and off campus, inside and outside the United States, is brought together to build a program that teaches multinational student teams through real world problem solving. In the hyper-competitive world that UMD graduates are increasingly facing, this sort of experiential learning is not only an eye-grabbing resume entry; it can be a gateway to success on whatever life route a Terp chooses to follow.

By Joseph Scholten, OIA
International collaboration between agricultural researchers is key to developing the highest yield and quality of grain necessary to feed the burgeoning world population. Through an international research fellowship with the University of Maryland and the Facultad de Agronomía Universidad de Buenos Aires, Plant Science graduate students Ben Conway and Danielle Miller accompanied their advisor Professor José Costa to Argentina to evaluate a wheat population to map genes for disease resistance and other important agronomic traits in the wheat genome.

Planted in May, the UMD wheat population was already near maturity when the team arrived in Argentina last November. The population had been planted at both the Universidad Nacional de La Plata’s research farm in Lomas de Zamora and the private seed company DONMARIO Semillas’ research farm in the province of Buenos Aires. When healthy wheat would normally appear green and vibrant, these plots were covered in a brownish color of leaf rust, a major fungal pathogen found around the world. In addition to rating the level of disease on each plot, the UMD research team measured plant height, leaf length and leaf width to explore the genetic basis for these characteristics of plant structure.

Traveling north from the experimental plots, the UMD group toured DONMARIO’s plant breeding station in the town of Chacabuco. The station consisted of large research facilities, equipment, and extensive wheat fields for developing new varieties, and utilized the latest plant breeding technologies. Even further north in the Santa Fe province, vast fields of mature wheat and barley and seedlings of corn, soy, and sorghum beautifully demonstrated the productivity of Argentina. Stopping in the town of San Justo, the group observed production agriculture in action, specifically a satellite-guided soybean planting and wheat harvest on a half-million-dollar combine harvester.

Traveling back to Buenos Aires, Professor Costa led a seminar at the Facultad de Agronomía Universidad...
During a day-long competition, 17 teams comprised of more than 60 University of Maryland students competed alongside students from top universities around the world to analyze a programming problem, create a solution and pit their skills against each other.

Participating teams in this competition, the 2013 Windward Code Wars, were challenged to write a code—or create “orders”—for an A.I. in the following scenario:

“Welcome to the booming city of Windwardopolis. The largest high-tech companies all have corporate headquarters here. You own a limousine service with one limo (yes it’s a small operation, but a proud one). These CEOs need to travel to the other corporate headquarters. Your job is to provide them the transportation from one location to the next. And to do so with a smile—no one likes an unhappy driver.”

The teams accumulated points based on how optimally their code transported the passengers to each of the locations. UMD students put their codes to the test against hundreds of students from schools around the world, and two of the university’s teams, “String Theory” and “Terps,” made it to the quarter-final and semi-final rounds before team “String Theory” took second place in the final competition.

“String Theory,” a team of UMD Computer Science and Computer Engineering freshmen, included Eric Jeney, Brendan Rowan, Daniel Sun, Matt Bender and Kevin Harrison. Each member won an HP laptop and a Microsoft Kinect.

By Alana Carchedi, University Communications
To submit story ideas and photos, please contact the editor, Vivian Hayward, at vhayward@umd.edu or 301-405-4312.