The Fruits of Industrial Innovation: A Georgia Story

Thought leaders in economic development have long emphasized the importance of helping U.S. manufacturers compete on innovation for them to survive and thrive in the rapidly changing global economy. But does this strategy really work? Based on recent results from the latest Georgia Manufacturing Survey—a perennial source of competitive intelligence for economic developers and other community change agents—the answer is YES.

The 2008 survey, completed by 738 companies statewide, revealed that Georgia’s manufacturers who compete via innovation instead of low price experience higher returns on sales and pay higher wages. However, those companies that do so appear to be in the minority.

Overall, 8.5 percent of Georgia’s relatively small manufacturers (10-49 employees) indicated innovation and new technology is a strategy of highest importance for them in terms of competing for sales in the marketplace. There appears to be a relationship with firm size, as 10.7 percent of the state’s medium-sized firms (50-249 employees) and 12.4 percent of the state’s larger firms (250-plus employees) reported similarly.

Those Georgia manufacturers employing innovation as their primary strategy—together comprising less than 10 percent of all manufacturers surveyed—were asked about their adoption of 13 specific innovation-related activities from 2005 to 2007. Working with customers to create or design a product, process, or innovation was the most common activity, with 68 percent of the firms indicating they did so. Half (50 percent) of the firms indicated purchasing...
machinery, equipment, computers, or software to implement innovations. Purchasing external research and development (R&D), purchasing papers or technical articles, or purchasing or licensing patents, inventions, and other types of knowledge were the firms’ least-employed activities.

While profits among Georgia’s manufacturers grew generally between 2005 and 2008, they grew much more for manufacturers competing by employing innovation as their primary strategy as opposed to relying on offering low prices to move their goods and services.

The 2008 survey also yielded insights into the adoption of sustainability practices by Georgia’s manufacturers. Seventy-five percent of the state’s firms reported improving the sustainability of their processes. Sustainability improvements were reported to be most prevalent in front-end production areas such as process design, supplier selection, and raw material selection. Sustainability practices were least common in marketing, such as “green” branding or “eco” labeling. Also, more than one-fifth (23 percent) of the manufacturers identified energy efficiency as a top concern, exceeding the level of those doing so in 2005.

Other key highlights from the 2008 survey include:

● Nearly 30 percent conducted R&D in-house, but only 5 percent reported using tax credits, loans/grants, or other financial support for innovation even though they may have been eligible for state R&D tax credits.

● 24 percent noted technical skills as another top concern, but some 20 percent reported not spending any funds on employee training, whether it involved routine tasks or new capabilities.

● 70 percent introduced some type of new or technologically improved product or process in 2008.

● The top three most significant needs identified by Georgia’s manufacturers were marketing and sales, lean manufacturing and workflow improvement, and finding workers with technical skills (e.g., machining, electrical work).

The Georgia Manufacturing Survey, conducted periodically by a team led by Georgia Tech’s Dr. Jan Youtie and Professor Philip Shapira since 1994, benchmarks the use of modern manufacturing practices by Georgia industry. Information gleaned from it is used to enhance manufacturing assistance programs that help Georgia firms compete, improve profitability, and create jobs. The 2008 survey was made possible through a collaboration among partners affiliated with Georgia Tech (Enterprise Innovation Institute and Georgia Manufacturing Extension Partnership, School of Public Policy, and Center for Paper Business and Industry Services); the Georgia Quick-Start Program of the Technical College System of Georgia; and Habif, Arogeti and Wynne, LLP. More information on the 2008 survey, as well as surveys from previous years, is available at www.cherry.gatech.edu/survey.

Manufacturing Processes Currently Improved Through Sustainability Practices

Firms Find Diverse Ways to Innovate
Adoption of Specialized Innovation Activities
(Percentage of establishments that engaged in the activity)
A Q&A with the Georgia Department of Economic Development’s Heidi Green

Heidi Green is deputy commissioner for global commerce at the Georgia Department of Economic Development, the state’s sales and marketing arm, the lead agency for attracting new business investment, encouraging the expansion of existing industry and small businesses, locating new markets for Georgia products, attracting tourists to Georgia, and promoting the state as a location for film, music, and digital entertainment projects, as well as planning and mobilizing state resources for economic development.

Ms. Green, among other responsibilities, oversees the division that helps existing industries grow and expand, develops and recruits new businesses to Georgia, and increases Georgia’s trade around the world. She previously served as Governor Sonny Perdue’s director of intergovernmental affairs and as his senior advisor in economic development.

FOCUS: The global economy’s turbulence is impacting states across the country. What do you see as the most critical matters affecting Georgia’s ability to effectively compete in the international marketplace?

GREEN: We have begun hosting community forums to invite feedback from our partners around the state and share the ways that we are retooling to meet the needs of the current economic climate. We are also encouraging our communities to prepare for the economic rebound by continuing to develop product and infrastructure, to seek out regional partnerships, and to get to know our state project managers and the resources the state makes available to them.

FOCUS: Looking forward, what do you see as Georgia’s best strategic opportunities for innovation in economic development?

GREEN: One of our key assets is the Centers of Innovation program, which GDEcD began managing last year. With centers focusing on strategic industries such as aerospace, agribusiness, energy, life sciences, logistics, and manufacturing, we can make important connections between growing companies and academic research. The centers also assist with commercialization, technology connections, grant funds, and connecting companies with networks of investors. Through careful cultivation of public and private resources, we believe the Centers of Innovation will help grow companies in our most promising industry sectors.

FOCUS: What advice do you have for local economic development leaders working to help their communities survive and thrive in these challenging times?

GREEN: We believe that a slow market is the time to grab market share by putting more shoe leather on the street and knocking on more doors. When the economy rebounds, we want communities to have the product and infrastructure in place to respond to the needs of growing companies. We encourage the development of regional partnerships, which have the potential to benefit large populations. And we also encourage our local partners to contact us at GDEcD and take advantage of the many resources we have available to them.

FOCUS: What are some key milestones from your tenure at GDEcD of which you’re particularly proud?

GREEN: The fact that we have been able to recruit a significant portion of Kia suppliers—more than originally predicted—makes my job worthwhile. To date, eight major suppliers representing more than 3,350 jobs and upwards of $477 million in investment have announced their location in Georgia. I am also proud of the way we’ve been executing the Global Georgia initiative, proposed by the governor and funded...
Making Professional Development a Top Priority

In our ever-changing economy, the work of the professional economic developer is at its challenging best and will only grow in importance. Professional economic developers are not only counted on to keep pace with changes impacting the potential for new jobs, investments, and consequent payroll and tax base increases, but to also anticipate such changes to best prepare the communities they serve. Therefore, especially during these challenging economic times, the reasons for pursuing ongoing professional development are ever so important – whether it be through everyday learning from your peers, keeping up with trends through popular literature, attending professional development courses and advancing your education, or attending programs provided by the Georgia Economic Developers Association (GEDA), the International Economic Development Council (IEDC), and other professional associations.

Following are the “Top 10” reasons to make professional development a fundamental cornerstone of your plans for 2009.

10. You woke up one day and suddenly you’re an economic developer but know nothing of the field.
9. You wish to develop and expand your network of resources and contacts.
8. You seek to learn what other states and communities are doing (for competitive intelligence-gathering purposes).
7. You want to re-energize yourself for your job.
6. You seek to bring recognition to your community as being serious about economic development and open to trying new ideas.
5. You seek to develop a mastery of the essential skills for economic development.
4. You seek personal growth and development.
3. You’re looking to advance your career/transition into new areas.
2. You wish to stay updated on the latest trends and opportunities relating to economic development.
1. You seek to excel in serving your organization and constituency.

Source: Georgia Economic Developers Association (GEDA)

FOCUS: As conditions continue to evolve, what can we expect from GDEcD in the future?

GREEN: You can look forward to GDEcD continuing to take a leadership role in economic development throughout the state. We will continue to seek out innovative ways to support our existing industries and engage in global outreach to ensure that Georgia’s citizens have access to high-quality jobs.

FOCUS: Tell us one little-known or fun fact about yourself.

GREEN: On a recent business mission, we had just arrived in Japan after a 10-hour flight and reached our hotel. We wanted a fun dinner so we went to a tempura restaurant. It was going well as we made friends with the tempura chef, until our new friend decided to serve us a specialty item—fried shrimp heads. We ate them down to be polite, but our new friend thought we enjoyed them so much, he served us more!

www.stip.gatech.edu/forum
Exciting Students About Technology Jobs of the Future

Students in Douglas-Coffee County and Swainsboro-Emmanuel County not only do the math, but are learning its real-life applications in science, technology, and engineering, too, thanks to a pilot program launched in 2007 by Georgia Tech’s Center for Education Integrating Science, Mathematics, and Computing (CEISMC) and Enterprise Innovation Institute (EI).

Called STEM (for science, technology, engineering, and mathematics), the program was sponsored by the Georgia Rural Economic Development Center (GREDC) at East Georgia College and entailed a collaboration of educators, employers, and economic developers. It includes activities to pique the interest and imaginations of young people who will become tomorrow’s workforce, serving a diversified group of students regardless of whether they plan to pursue post-secondary education at a technical college or a four-year institution. In one school system, the efforts specifically targeted students at risk of dropping out of high school.

The activities were shaped according to local economic development goals and were centered on outreach and foundation building, teacher internships, and introductory robotics training.

Specific activities included the following:

- Field trips to Atlanta involving research and robotics labs at Georgia Tech, as well as visits to the Georgia Aquarium and Fernbank Museum of Natural History and Science.
- Visits to a Griffin manufacturing firm where engineers demonstrated robotic operations.
- Training of four teachers in robotics technology.
- Three teachers participated in CEISMC’s GIFT (Georgia Internships for Teachers) program that gives them firsthand exposure to today’s technological workplace.
- Facilitation of a one-day technology road show by NASA’s Aerospace Education Services Program to enhance public understanding of scientific advances springing from the space agency’s missions.
- 20 students and four teachers participated in FIRST Robotics Championships, a competition challenging teams of students to solve a common problem via robotics.

A total of 144 students participated in the pilot, which local educators and economic developers feel ignited interest in STEM-related endeavors. The students designed, built, and programmed robots; applied real-world math and science concepts; and learned teamwork by laboring toward common goals. Further, student participants in both communities experienced some notable improvements from 2007 to 2008. Although several factors may affect such improvements, there is reason to believe that the students’ involvement in the pilot program played a helpful role.

Regarding those participating in the pilot program:

- Average GPAs increased.
- School attendance significantly improved as denoted by the drop in average absentee days.
- Disciplinary actions dropped as indicated by the reduction in action plans generated.

Beyond these desirable improvements which may have been aided by the pilot program efforts, a number of students provided their direct feedback to the Georgia Tech team, regarding their field trip experiences, in particular.

“I enjoyed learning about all the different career opportunities available in my future. This [trip] has really motivated me to keep working hard in school.”

“[The trip] has helped broaden my mind on new ideas and has helped me better understand science and technology.”

“After today, I realized how important college really is in our lives. It opened my eyes and mind. This trip has inspired me to try my best and to do things that I would have never thought I could do.”

Given the success of the pilot, the program has been extended through 2009 with additional sponsorship provided by GREDC and will include further activities to enrich student interest in science, technology, engineering, and the math that fuels all three.

For more information, contact EI’s Hortense Jackson (229.430.4327, hortense.jackson@innovate.gatech.edu) or CEISMC’s Jeff Rosen (404.385.2431, jeff.rosen@ceismc.gatech.edu).
Igniting the Passion of Independent Inventors

If necessity is the mother of invention, then passion is surely a close relative. All across Georgia people are employing creativity and ingenuity to invent products that we, as consumers, use in our everyday lives. The passion put into these inventions is clear to anyone who spends even a few minutes with Georgia’s inventors, and Georgia Tech’s Enterprise Innovation Institute (EI²) has recently spent a great deal of time with many of them. Through a series of educational workshops, EI² has had a front row seat at the hard work and dedication that goes into inventing a new product.

In 2007, through a pilot program sponsored by the U.S. Economic Development Administration (EDA), EI² became deeply engaged in gauging the volume of independent invention activity in Georgia, assessing the needs of the inventors behind this activity, and developing ways to assist them. Results from research conducted during the pilot program are available in two published reports – the 2007 Survey of Georgia’s Independent Inventors and the 2007 Case Study Review of Inventor Assistance Organizations.

The information gleaned from the analysis of 331 surveyed inventors indicated a strong need for more education of and direct assistance to Georgia’s inventors. For example, slightly more than 70 percent of the independent inventors stated that they had inventions requiring further design or other assistance to make them viable products.

EI², the Technology Authority of Georgia (TAG), The Creative Coast Alliance (TCCA), and the Inventors Association of Georgia (IAG) launched a partnership to stage a series of workshops addressing key areas of need identified in the survey. Between October and November 2008, these workshops were held in Atlanta and Savannah, focusing on high-priority topics: financing, licensing, marketing, and prototyping/manufacturing. Georgia experts in these fields spoke to the inventors, entrepreneurs, academics, students, and economic development professionals attending the workshops.

Some 247 people attended the workshop series, where participants developed camaraderie with their fellow inventors, learned from each other’s experiences, and networked with one another. The enthusiasm for the workshops shown by the inventors demonstrated their thirst for additional education and professional development opportunities.

Workshop attendees completed a brief survey at the end of each session. This gave EI² and its partners the greatest indication of success as overall feedback was extremely positive. Nearly 87 percent of all respondents said that they would like to continue hearing about future Georgia Tech inventor-related events. Nearly 98 percent of attendees stated that the program exceeded or successfully met their expectations, and 92.5 percent of respondents said they would be able to use the information presented to them (see graph above).

Georgia’s independent inventors have an abundance of passion, and with some assistance, also have the potential to significantly contribute to Georgia’s economic development.

To receive a copy of the research reports, or for more information, contact Jason Chernock (404-385-0829; jason.chernock@innovate.gatech.edu).
Tracking Workforce Development for Fort Benning and the Chattahoochee Valley Region

In 2008, through an effort led by the Governor’s Office of Workforce Development and The Valley Partnership, the eight-county Chattahoochee Valley Region was awarded $3 million from a U.S. Department of Labor grant to implement job training and related programs tied to the anticipated BRAC (Base Realignment and Closure) expansions at Fort Benning. Specifically, the grant is funding workforce training to support anticipated job creation at Fort Benning and other area employers. The training programs will focus on the strategic industries of advanced manufacturing (combat automotive maintenance), advanced communications, and energy (sustainable industrial construction), and they will leverage the existing Georgia Work Ready Region activities already under way in the region in aerospace.

The initiative, managed through The Valley Partnership, will be implemented by several partners including Columbus Technical College, Columbus State University, Chattahoochee Valley Community College, Flint River Technical College, and the Workforce Investment Boards that serve the region comprising Georgia counties Chattahoochee, Harris, Marion, Muscogee, Stewart, Talbot, and Taylor, and Russell County in Alabama. Programs funded through the grant are anticipated to be implemented through June 2010.

To help support these efforts, Georgia Tech’s Enterprise Innovation Institute and Auburn University’s Technical Assistance Center are working with the region’s partners to track the activities and outcomes associated with the programs during their implementation. The tracking of these metrics is intended to help demonstrate the return on the federal and state investment represented by this grant to help inform efforts by the partners along the way. For further information on the tracking efforts, contact Georgia Tech’s Dana King (404.894.0094, dana.king@innovate.gatech.edu), or Auburn’s Walker Jackson (344.844.3890, wmj0002@auburn.edu).

TechSmart℠ Takes Hold in North Georgia

In August 2008, four northwest Georgia counties kicked off a collaborative effort to help leaders in business, education, health care, local government, and public safety effectively employ information and communications technologies (ICT) to improve their processes. Officials in Chattooga, Floyd, Polk, and Walker counties wanted a regional action plan that would enable them to best utilize ICT to compete and prosper in today’s interconnected global economy. With sponsorship by the OneGeorgia Authority via the Broadband Rural Initiative to Develop Georgia’s Economy (BRIDGE) Fund, Georgia Tech is assisting local leaders in doing just that via its TechSmart℠ program.

Following an initial needs assessment, participants and TechSmart℠ staff undertook a survey to benchmark how organizations in the region use ICTs. More than 18 percent of major private and public organizations—the technology vanguard for the region representing more than 50,000 ICT users—participated in the survey. Results from analysis of the data show, among other things, that 74 percent of respondents have a Web site and 93 percent have some type of broadband Internet connection. On average, respondents spent nearly $870,000 annually on ICTs over the last three years, and expect such expenditures will increase from 5 to 10 percent per year over the next three years.

After confirming the benchmarking results with sector focus groups, regional technology leaders discussed and prioritized actions they will take to make the region more competitive by using ICTs to become more efficient, effective, and innovative.

For further information, contact Greg Laudeman (706.271.5521, greg.laudeman@innovate.gatech.edu).
**To Your Health**

Since its beginning in 1998 when Egleston Children’s Health Care System and Scottish Rite Medical Center formed Children’s Healthcare of Atlanta, Children’s has become the nation’s largest pediatric hospital. In 2006, it grew even bigger as it took on the responsibility of managing services at Hughes Spalding Children’s Hospital. Children’s is now composed of three hospitals and 17 satellite locations in metro Atlanta. In reality, its reach extends throughout Georgia because it is the only provider in the state to offer specific services including pediatric heart and liver transplants, complex pediatric heart surgery, and others in neurosciences, orthopedics, critical care/trauma, and radiology.

Late last fall, Children’s asked Georgia Tech’s Enterprise Innovation Institute (EI) to estimate its current economic impact on the state and what impact it would have if its Vision 2018 were fulfilled. To this end, EI’s economists are conducting economic and fiscal impact analyses of Children’s Healthcare on Georgia. The fiscal impact analysis is anticipated to give the facility an estimate of the net revenues it contributes to state government’s bottom line.

Vision 2018 reflects an aggressive goal to expand Children’s efforts in clinical excellence, research, teaching, and child wellness. Details of this effort are still being developed, and when completed EI will translate this expansion plan into potential economic and fiscal impacts.

For further information, contact Robert Lann (404.894.3475, robert.lann@innovate.gatech.edu).

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**Benchmarking Excellence**

In 2006, the International Economic Development Council (IEDC) and the Georgia Tech Enterprise Innovation Institute (EI) launched a joint initiative to benchmark excellence in quality management among economic development organizations, focusing on the practices by accredited economic development organizations (AEDOs)—that is, those recognized as being among the profession’s “best of the best.” This effort yielded several measures of enterprise excellence among the AEDOs, as well as opportunities for continual improvement on their pathway to ongoing excellence. It also helped to inform other economic development organizations about what it takes to be a high-performance organization in economic development. These indicators used for the benchmarking endeavor were developed through a pilot program—The Calibration Program—made possible through startup funding provided by the Georgia Rural Economic Development Center (GREDC) at East Georgia College.

This year, IEDC and Georgia Tech are again partnering to create up-to-date benchmarks during the first quarter of 2009. This current effort not only surveys AEDOs according to the quality management indicators used during the 2006 effort, it also includes a few new measures relating to sustainability.

Results of the 2009 benchmarking efforts will be unveiled at the 42nd Annual Basic Economic Development Course in Atlanta on March 24-27.

For further information, contact Joy Wilkins (404.895.6115, joy.wilkins@innovate.gatech.edu) or Dana King (404.894.0094, dana.king@innovate.gatech.edu).

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**Team Jasper Makes a Winning Play**

What makes a good community great? From examining the most competitive communities, the answer almost always boils down to one word—leadership. Through an effort led by Team Jasper and made possible through a grant provided by the U.S. Department of Agriculture, Georgia Tech’s Enterprise Innovation Institute (EI) is helping local leaders in Jasper County identify their priorities for developing stronger community and economic health for residents and businesses. Specifically, EI, as a precursor to future planning work, will help Team Jasper gain a better understanding of the strengths and weaknesses facing the county and prioritize the common goals on which to focus going forward.

Kicking off the project in early December, the EI team interviewed some 50 community leaders in the county seat of Monticello. Interviews with more than 30 statewide partners, all of whom know and regularly work with Jasper County, are currently underway as is a Web-based survey with the county’s citizens. The project is anticipated to help Team Jasper start developing the county’s strategic planning process.

For further information, contact Leigh Hopkins (404.894.0093, leigh.hopkins@innovate.gatech.edu).
Winning Awards in Health Care with Lean

Piedmont Newnan Hospital has been selected as a winner of the 2008 VHA, Inc. Georgia Regional Leadership Awards in Operational Excellence for its improvements in the operating room that increased patient care and improved patient and physician satisfaction. The improvements resulted from “lean” assistance provided by Georgia Tech’s Healthcare Performance Group.

A cross-functional team of hospital employees, working with Georgia Tech specialists, identified three rapid process improvement areas, and with implementation of lean techniques they decreased operating room turnaround times and increased its utilization. Lean principles, first used in manufacturing, are now being effectively employed in health care and office environments.

To learn more about the Healthcare Performance Group, contact Frank Mewborn (706.338.0072, frank.mewborn@innovate.gatech.edu).

High-Tech Help

The SBIR Assistance Program for the State of Georgia, at no cost, helps the state’s small, high-tech firms obtain R&D funding from one of the federal agencies participating in the Small Business Innovation Research (SBIR) and Small Business Technology Transfer (SBTT) programs. These highly competitive awards, ranging from $75,000 to $850,000, can provide researchers with seed money to launch a new firm or an existing company with funds to develop a new product line.

Administered by Georgia Tech’s Enterprise Innovation Institute, the program in FY08 provided detailed guidance to Georgia companies submitting 64 proposals, which resulted in $9.4 million in awards. A major factor in this success was the improved quality of SBIR proposals, with the “win rate” improving almost 50 percent in the first two years of operation. In the first six months of FY09, the program is on pace to match or exceed the previous year’s number of proposals and assistance to firms.

To learn more, contact Connie Ruffner (404.385.2600, connie.ruffner@innovate.gatech.edu).

STIP Stop

Georgia Tech’s program in Science, Technology and Innovation Policy (STIP) welcomes four faculty members. Dr. Juan Rogers, an associate professor in Tech’s School of Public Policy, has been appointed as a STIP director. His research interests include policies and practices in research and development.

Dr. Marilyn Brown, a professor in the School of Public Policy, is a senior research fellow and director of STIP’s new initiatives in sustainability. Her expertise encompasses development and deployment of sustainable energy technologies and evaluation of energy programs and policies.

Dr. Usha Nair-Reichert, director of undergraduate programs in Tech’s School of Economics, focuses on trade policy, multinational investment, monetary policy, and economic development.

Dr. Mary Frank Fox is NSF Advance Professor in the School of Public Policy and co-director of Georgia Tech’s Center for the Study of Women, Science and Technology. Her research is directed toward gender, science, and academia. The latter two will serve as STIP faculty associates.

For more information about STIP, contact Robert Lann (404.894.3475, robert.lann@innovate.gatech.edu).
Power Play

The world is drawing closer, at least in terms of establishing and adopting a common energy standard. Development of the new ISO 50001 involves representatives from national standards organizations in 40 countries. Georgia Tech’s Enterprise Innovation Institute is administering the U.S. Technical Advisory Group.

Volatile energy prices and concerns about global warming have made managing energy a higher priority for industry, commerce, and governments worldwide. ISO 50001 will help control costs, and, adds Georgia Tech’s Bill Meffert, “Many countries will use the standard as the basis for national programs that encourage large energy users to demonstrate their environmental stewardship. It is expected that national incentives—taxes, credits, and similar vehicles—will be employed to promote its adoption and use.”

The next international meeting on the standard will be hosted by Brazil in early March.

Presenting Credentials

Three entrepreneur outreach specialists with Georgia Tech’s e2e Works program—Steve Fortunato, Andy Helm, and Matt Oxley—have received certification as Economic Development Finance Professionals from the National Development Council. They are part of an eight-member team working throughout Georgia to bolster entrepreneurship by assisting fledgling firms, increasing funding opportunities by angel investors, and improving the effectiveness of Georgia’s numerous rural business incubators.

For more information, contact Deann Desai (770.605.4474, deann.desai@innovate.gatech.edu).

Welcome Words from Washington

In mid-February, President Barack Obama signed into law the 2009 American Recovery and Reinvestment Act, which, among other things, expands and improves a three-decade-old program—Trade Adjustment Assistance (TAA)—designed to help U.S. industry and labor address the effects of foreign competition such as declines in sales and employment.

Among the enhancements is TAA for Communities, which authorizes $517.5 million for assistance to communities affected by trade. Reportedly, the bill makes qualifying communities eligible for strategic planning grants, as well as for economic development grants to pursue trade adjustment projects identified in their strategic plans. It also provides grants to improve training programs and create relevant partnerships between the public and private sectors. The authorized funding covers FY09, FY10, and the last three months of 2010.
Focus on Communities  •  Winter 2009

Something Ventured, Something Gained

In December 2008, a plant making efficient, low-cost solar cells opened in Norcross, Ga., creating some 100 jobs and claiming $1 billion in sales agreements with international solar-module manufacturers. A big deal for the community and for the state, to say nothing of Suniva’s place of origin—Georgia Tech’s VentureLab.

Formed in 2001 to commercialize technology conceived and developed by Tech faculty, researchers, and graduate students, VentureLab has fostered more than two dozen startup companies that together have raised more than $250 million in private investment. Another 60 startups are in the development stages. Approximately 10 percent of the more than 300 inventions annually disclosed by Tech researchers are judged suitable for VentureLab nurturing.

Firms graduating from VentureLab include CardioMEMS, GTronix, QCept Technologies, and Verco Materials. Products range from implantable medical devices and improved chip technologies to Internet security software and tougher body armor. Many of these fledgling firms have stepped from VentureLab to the Advanced Technology Development Center (ATDC), Georgia’s nationally acclaimed high-tech business incubator.

According to Stephen Fleming, director of Georgia Tech’s Commercialization Services, “VentureLab is helping maximize Georgia Tech’s economic return to the state by efficiently moving research innovations from the laboratory to the marketplace.”

At this one-stop center for technology commercialization, experienced VentureLab catalysts help transform innovations into early-stage companies by assisting with business plan development, connecting the innovators with experienced entrepreneurs, locating sources of initial financing, and preparing the new firms for the business world. The goal is to develop enterprises that will prove attractive to venture capital firms and have a strong foundation for success. The process includes: (1) technical concept analysis, (2) intellectual property assessment, (3) evaluation of market dimensions and dynamics, (4) regulatory path and strategy (for biosciences), and (5) venture assessment and economic feasibility.

VentureLab staff evaluate all Georgia Tech innovations and help determine the appropriate commercialization route. They also put on workshops and seminars to address intellectual property protection, licensing procedures, and what venture capital firms look for when investing in business startups.

Financing is crucial for generating a prototype or proof-of-concept to demonstrate commercial potential. Supported by the Georgia Research Alliance, VentureLab makes available commercialization awards in the form of grants, loans, and equity investments to help campus innovators move from the lab to the street.

For more information about VentureLab, visit innovate.gatech.edu/venturelab.

Professor Robert Speyer, founder of Verco Materials, holds a piece of boron carbide armor manufactured by the company. The armor has been molded to protect the neck and face against projectile and armor fragments.

Deborah McGee of CardioMEMS examines an sensor device implanted to measure pressure in an aneurism being treated by a stent graft.

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For more information about the newsletter, contact Joy Wilkins, CECd, (404.895.6115, joy.wilkins@innovate.gatech.edu).

To subscribe, contact Hazel Taylor (hazel.taylor@innovate.gatech.edu).

**Professional Development Planner**

**Courses:**

- **42nd Annual Basic Economic Development Course**  
  **March 24–27, 2009, Atlanta**  
  Learn the fundamentals and emerging concepts of economic development, form a network of fellow practitioners, and meet a requirement for professional certification.

- **IEDC Credit Analysis**  
  **August 3–4, 2009, Atlanta**  
  Understand how to assess the strengths and weaknesses of small enterprises in order to make informed decisions about using public financing for small-business development.

- **IEDC Marketing and Attraction**  
  **Aug. 3–4, 2009, Atlanta**  
  Learn how to provide accurate, current, and credible information to targeted prospects for location or expansion, including using the Internet as an economic development marketing tool.

- **IEDC Business Retention and Expansion**  
  **Dec. 3–4, 2009, Atlanta**  
  Become proficient in addressing the needs and concerns of local existing businesses to better help them remain and grow in your community.

For more information on courses, contact Jennifer Freeman (404.894.4904 or jennifer.freeman@innovate.gatech.edu).