

REMARKS BY GEORGIA TECH PRESIDENT G. WAYNE CLOUGH
Coulter Foundation meeting, September 27, 2004

I would like to add my voice to Sue's in welcoming our visitors to our campus and the Georgia Tech Hotel and Conference Center. We hope that while you are here you will have some time to visit our campus. This is an important time for all of us who are interested in biomedical engineering, and thanks to the Coulter Foundation and its leadership, an important opportunity is at hand. We at Georgia Tech and Emory know something about this from direct experience, and we look forward to seeing the role of translational research enhanced at our institutions with the help of the Coulter Foundation.

As Sue and her colleagues from the Foundation know, one of the principal reasons that we have been successful is the partnership between Emory University and Georgia Tech that brings together our respective strengths – medicine for Emory and engineering for Georgia Tech. This is an age characterized by a need for collaborations, and our partnership has matured at exactly the right time. All of us in this room are participants in consortium approaches, because no one has all of the smart people or unlimited resources, and the problems we face are multidisciplinary.

Looking over the institutions represented in the audience today, I found that Georgia Tech already has some form of collaboration with 14 of you. These consist of state initiatives like the Georgia Research Alliance, regional initiatives like the Science and Technology Advisory Team for Oak Ridge National Laboratory, and national initiatives like the National Nanotechnology Infrastructure Network and the National Lambda Rail System.

But, of all of these, the Emory-Georgia Tech partnership is the oldest and has been in continual operation for the longest time. As a result, it seems worthwhile to share some thoughts on the history of the relationship and the role of the Coulter Foundation in helping us energize our latest initiatives.

We all typically build our good ideas based on someone else's who went before us. In this case, we owe a huge debt to past presidents of Emory and Georgia Tech – Jim Laney and Joe Pettit – who in the 1980s came together and made a ground-breaking decision. They would support a research fund that would provide seed funding for joint research projects between faculty at Emory and Georgia Tech. The fund recognized that Emory had a strong medical school and Georgia Tech had strong programs in engineering and computer science, and that these relative strengths provided a unique opportunity for collaborative research. The joint research fund was an immediate success and led to both universities gradually adding faculty to take advantage of the growing collaboration. We were fortunate to have Professor Don Giddens as a leader in those early stages. Later Don left to become dean of engineering at Johns Hopkins and to lead their very prominent biomedical engineering program. But there is more to that story that I will relate later in my comments.

As a result of the Emory-Georgia Tech collaborative effort, Georgia Tech created a formal interdisciplinary center in biotechnology – the Institute for Bioengineering and Biosciences – and was able to attract Dr. Bob Nerem, who assumed the directorship of the center. Ultimately upwards of 60 Georgia Tech faculty became involved with the Center and many of them were directly involved in growing the joint research and education programs with colleagues at Emory. Joint degree programs were eventually created at the MS, PhD, and MD/PhD levels.

During the early 1990s, Georgia Tech made the decision to ramp up its investment in its biotechnology effort and began early discussions about establishing a formal program in biomedical engineering with Emory. Early on during this time, the Georgia Research Alliance was created, and one of its three thrusts was in biotechnology. Sometimes luck is as good as carefully designed strategy, because the formation of the GRA was a key element in providing support for equipment and faculty. It also helped that the GRA had great leadership in its first president, Bill Todd.

In addition, we were very fortunate that in the mid-1990s Emory hired Dr. Michael Johns as VP for Health Affairs. Mike and his colleague, Emory's Medical School Dean Dr. Tom Lawley, were strong supporters of the Emory-Georgia Tech effort. At Georgia Tech there were similar champions of the idea in our provost's office through Mike Thomas and his successor, Dr. Jean-Lou Chameau. All of these leaders brought a creative attitude that led to a steady expansion of what was underway at that time. The enthusiasm extended to the president's offices – from my own to that of Bill Chace who was then president of Emory.

It was not long before this combination of commitment and talent led to the first significant outcome – winning the NSF National Center of Excellence in Tissue Engineering, headed by Bob Nerem and supported strongly not only by Georgia Tech but also Emory. The GRA also provided matching funds, which made the Center possible.

The next key step in the growth of the partnership was the hiring of Don Giddens back from Johns Hopkins. This was made possible by the joint commitment of Emory and Georgia Tech to form an academic biomedical engineering department to complement the larger biotechnology programs. Both Emory and Georgia Tech agreed to a hard commitment of faculty positions and new buildings to make the new department a success from the outset. It was agreed that this would be a true joint department, something perhaps never before accomplished between a public and a private university. It took a great team effort to get this done. I will not bore you with the details, but it was a great day when the governing boards of the respective universities approved the plan.

A subsequent step in the development of the partnership came with the two universities decided to create a jointly operated wet lab incubator for commercialization of the ideas coming from our research laboratories. The incubator is managed by Georgia Tech's high technology business incubator, ATDC, but goes by the name of EmTec Bio.

With these exciting developments in place, we were fortunate to be able to find strong financial support for our efforts from first, the Whitaker Foundation, and second, the newly formed Coulter Foundation. A Whitaker leadership grant allowed Georgia Tech to build the new

Whitaker Biomedical Engineering Building, which we hope you will visit while you are here. This building is one of a complex of four buildings that focuses on biotechnology, nanotechnology, and biomolecular engineering. Three are completed, and the fourth will be under construction early next year.

Our relationship with the Coulter Foundation began by getting to know Mr. Coulter before he passed away. Wallace Coulter was a graduate of Georgia Tech in the 1930s and was a remarkably successful entrepreneur, inventor, businessman, and human being. His foresight is exemplified in the formation of the Coulter Foundation so that the proceeds from his estate could be used to advance the causes of biotechnology and biomedical engineering. Sue Vann and her colleagues have given the Foundation great leadership to bring it to where we are today.

In 2000, the Coulter Foundation made a commitment for a significant gift to support the creation of the Emory-Georgia Tech Department of Biomedical Engineering, and in recognition of this gift, the department is now named the Wallace H. Coulter Department of Biomedical Engineering at Georgia Tech and Emory. The Coulter gift was used to establish an endowment for the Department and to create a fund to support translational research. You will hear much more about this from our friend Dr. Larry McIntire, whom we were fortunate to recruit to take Don Giddens' place two years ago as chair of the Coulter Department when Don took on the job of dean of the College of Computing.

The most recent step in the partnership came a year ago when our friends at Emory made an inspired choice for their new president – Jim Wagner – who just happens to be a biomedical engineer. It will be our pleasure to hear from Jim in just a moment on his thoughts for the Emory-Georgia Tech partnership and the exciting ideas we are developing for its future.

The growth and development of the partnership has taken place over a period of almost 20 years. It has thrived because of the commitment of the leadership of both Emory and Georgia Tech throughout. I have described some of the highlights of this commitment, but the success also has to be attributed to the dozens of teams of faculty and students working together to create new knowledge as well as degree programs for our bright and talented students. And I especially want to mention Ajit Yoganathan, who has provided exceptional leadership in both research and academics.

Now, I don't want to leave you with the impression that problems did not arise along the way and that everything was easy, but the pervasive top-down and bottom-up effort always helped us find solutions quickly. In the end, the Emory-Georgia Tech partnership has been successful because of people who are dedicated to it, heart and soul. Those who have benefited have been our students, our community of Atlanta, and the state of Georgia. And, as pleased as we are with our progress, the best days lie ahead.

At this time, I am pleased to turn over the podium to my friend and colleague from Emory, Jim Wagner.