## Team Lead by Dr. Gunnar Lucko

## Below is an excerpt from Michelle's college application essay:

When my Algebra teacher, Mr. Diffley, asked me during my sophomore year what I wanted to study in college, I thought about my older brother, Jamal, who is studying engineering at North Carolina A&T University.

I've looked up to Jamal for as long as I can remember. He is my favorite brother out of seven and one of the first in my family to go to college. Jamal always had this subtle, yet powerful, and intimidating, yet friendly demeanor. He was extremely intelligent. I've always wanted to be just like him.

So when Mr. Diffley asked me about my plans for college, I responded assuredly: *engineering*. That's when Mr. Diffley told me about the ACE Mentor Program...

"I think you should join it," Mr. Diffley suggested. So I followed Mr. Diffley's advice -- and the decision made me realize that I definitely want to pursue a career in engineering.

The first thing we did was choose a group project. We decided to design a hospital.

The project called for a number of design considerations and necessities, such as a backup generator, a cafeteria, an emergency entrance and parking lot for ambulances, plenty of rooms and bathrooms, and incinerator, a parking lot and lobby.

Later, we got into more detailed discussions about things such as an eco-efficient rainwater collection system to flush the toilets, hexagon-shaped rooms with triangular bathrooms, and how to design the different wards.

Although it took a lot of hard work, we ultimately came up with a design for a state-of-the art, energy efficient hospital facility that still had visual appeal.

I had an immense feeling of accomplishment when my peers and I presented our hospital design in the ACE Mentor conference in Washington, D.C. I felt elated to be a part of something so sophisticated.

Over the course of eight months in ACE, I learned many valuable lessons but the most crucial lesson I learned was about function. That is to say, anyone can have a good design idea but it has to function properly in order to get built.

Being in the ACE Mentor program opened my eyes to so many different aspects of architecture in engineering. I'd like nothing more than the opportunity to continue my engineering studies at [your university].