

Dean Kamens Lecture

The main take away I got from Dean Kamen's lecture was that technology should be made for the betterment of less fortunate. His first invention was made while he was a freshman in college. The insulin delivery system, as he called it, was the first thing he made to help his brother take precise amounts of medicine. He later sold the company that he made out of the device to someone who could mass manufacture the product for hospitals and patients. All of his devices and inventions incorporated many fields of science and engineering needing a group of dedicated engineers, scientists and programmers to bring them to fruition. That helped correlate why almost all of the engineering and computer science classes have teams or lab partners to help us learn now how to work with other people from different backgrounds and majors. The point that he made most of his inventions and projects focused on helping people stuck out to me. Every product and device solved another problem and made current technology advance as a result. It shows the impact we can have on the world and others going into these fields and how unbelievable most inventions and ideas are. One device that shows this perfectly was the water purifier he designed to give people clean water no matter where they live. The idea of using the energy of the heated vapor to instant boil the incoming water to save on power was absurd and unheard of but stressed the minute details we learn in other classes or picking a helicopter designer to make a stunt for a catheter that can withstand certain stresses and strain. Another example was the effect he had on U.S veterans with prosthetic arms and the special wheelchair to help people upstairs and ledges. The prosthetic arms sensed the nerve signals the user would normally send through their arm to do simple tasks. He showed a video of the veteran eating cereal and picking up grapes having really accurate sensing to control the power of the arm. The wheelchair has a two-wheel system on both sides to help the user upstairs and up ledges, or even to talk on the same verticality of others. In doing this he showed the importance of working with big businesses like coke or fedex benefitting both parties and the consumers. The next portion of his lecture going over first robotics reminded me of when I was in the program and how impactful all the mentors were in the program. The impact the program has worldwide and on children growing up finding a love for science, technology, engineering, and math (STEM) fields is astonishing. This shows the impact one person or a small team can have on the world by using their passion for the betterment of others rather than for themselves.