

Dean Kamen is an inventor, an entrepreneur, and a tireless advocate for science and technology. His roles as inventor and advocate are intertwined—his own passion for technology and its practical uses has driven his personal determination to spread the word about technology's virtues and by so doing to change the culture of the United States.

As an inventor, he holds more than 440 U.S. and foreign patents, many of them for innovative medical devices that have expanded the frontiers of health care worldwide. While still a college undergraduate, he invented the first wearable infusion pump, which rapidly gained acceptance from such diverse medical specialties as chemotherapy, neonatology, and endocrinology. In 1976, he founded his first medical device company, AutoSyringe, Inc., to manufacture and market the pumps. At age 30, he sold that company to Baxter Healthcare Corporation. By then, he had added a number of other infusion devices, including the first wearable insulin pump for diabetics.

Following the sale of AutoSyringe, Inc., he founded DEKA Research & Development Corporation to develop internally generated inventions as well as to provide research and development for major corporate clients. Kamen led DEKA's development of the HomeChoice™ peritoneal dialysis system for Baxter International Inc. The HomeChoice™ system allows patients to be dialyzed in the privacy and comfort of their home and quickly became the worldwide market leader. Kamen also led the development of technology to improve slide preparation for the CYTYC (now Hologic Inc.) ThinPrep® Pap Test. Kamen-led DEKA teams have also developed critical components of the UVAR™ XTS™ System, an extracorporeal photophereisis device marketed by Therakos, a unit of Johnson & Johnson, for treatment of T-Cell lymphoma. An advanced prosthetic arm in development for DARPA should advance the quality of life for returning injured soldiers. Other notable developments include the Hydroflex™ surgical irrigation pump for C.R. Bard, the Crown™ stent, an improvement to the original Palmaz-Schatz stent, for Johnson & Johnson, the iBOT™ mobility device, and the Segway® Human Transporter.

Kamen has received many awards for his efforts. Notably, Kamen was awarded the National Medal of Technology in 2000. Presented by President Clinton, this award was in recognition for inventions that have advanced medical care worldwide, and for innovative and imaginative leadership in awakening America to the excitement of science and technology. Kamen was also awarded the Lemelson-MIT Prize in 2002, and was inducted into the National Inventors Hall of Fame in May 2005. He is a Fellow of the American Institute for Medical & Biological Engineering, and has been a member of the National Academy of Engineering since 1997.

In 2010, Dean hosted the Planet Green television series *Dean of Invention*.

In addition to DEKA, one of Dean's proudest accomplishments is founding *FIRST*® (For Inspiration and Recognition of Science and Technology), an organization dedicated to motivating the next generation to understand, use and enjoy science and technology. Founded in 1989, this year *FIRST* will serve more than 300,000 young people, ages 6 to 18, in more than 60 countries around the globe. High-school-aged participants are eligible to apply for more than \$16 million in scholarships from leading colleges, universities, and corporations. Studies have shown that *FIRST* Alumni are highly motivated to pursue careers in science and engineering, thus fulfilling Dean's goal of inspiring the next generation of technological leaders.