

Dr. Frances Ligler: Superhero

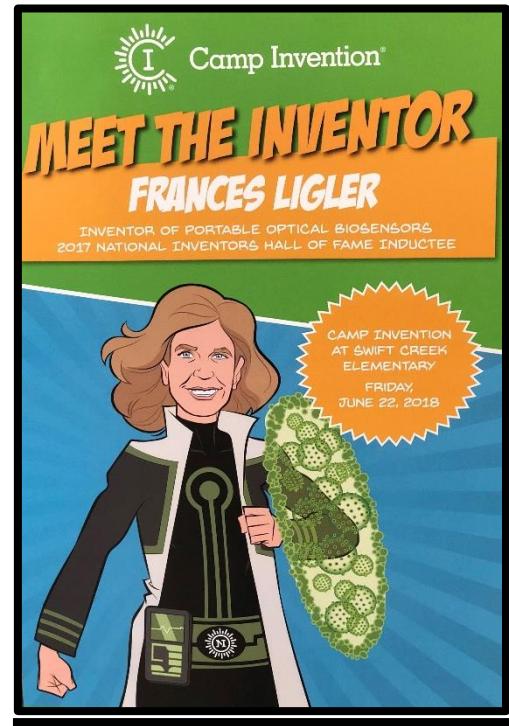
Dr. Frances Ligler, the Lampe Distinguished Professor in the Joint UNC/NC State Biomedical Engineering Department, is a pioneer in biosensors and microfluidics. She is known for her extensive work in multiple areas including tissue-on-chip, biochemistry, and immunology and her major impacts in key areas such as bioterror defense, environmental monitoring, food safety, and disease diagnosis. Dr. Ligler is also a member of the National Academy of Engineering.

However, a lesser known fact is that Dr. Ligler has done exceptional work as a scientific mentor for [Camp Invention](#): a nationally acclaimed summer program led by local teachers giving ~200,000 kids nationwide the opportunity to become innovators through teamwork, hands-on creative problem solving, and interaction with prominent figures like Dr. Ligler.

In 2017, The National Inventors Hall of Fame (NIHF) inducted Dr. Ligler into the Hall and invited her to participate in the program, and she immediately became a role model for the kids participating. Part of NIHF's mission is to introduce Camp Invention kids to inventors and innovators who have significantly influenced our world, with the hope that the kids will identify these visionaries as their role models.

In line with their vision, NIHF has created a team of superheroes, the Innovation Force™, that includes NIHF inductees who have inspired activities in the Camp Invention program. In recognition of Dr. Ligler's role as a leading innovator and her dedication to the program, she was integrated into the superhero squad and deemed "the Inventor of Portable Optical Biosensors". As children get to know Dr. Ligler and other members of the Innovation Force™, the hope is that the kids will recognize that inventors are inspiring and approachable career role models.

Dr. Ligler has also been elected as a Fellow of the National Academy of Inventors. The published [Fellow Profile Interview](#) describes how both Dr. Ligler and her husband dove into their work with Camp Invention with gusto: signing up for multiple camp sessions each year and connecting with the kids, especially underserved kids, while also educating women faculty about how inventing and patenting can put technology in the hands of the public and those in need. Dr. Ligler is now not only a world-renowned scientist/engineer and greatly valued member of the UNC/NC State faculty, but also a superhero and role model for all children to value their own creativity and pursue their interests in STEM fields.



Dr. Fran Ligler the Superhero



Dr. Fran Ligler using her superpowers to inspire the kids at camp invention and Dr. George Ligler advising them on steps necessary to produce their inventions for others to use