“Accelerating Discovery: Distilling Natural Laws from Experimental Data, from Physics to Biology”

Can machines discover scientific laws automatically?
This talk will outline recent research projects, starting with self-reflecting robotic systems and ending with machines that can formulate hypotheses, design experiments, and interpret the results to discover new scientific laws. We will see examples from psychology to cosmology, from classical physics to modern physics, from big science to small science.

Dr. Lipson is the director of Cornell University’s Creative Machines Lab at the Sibley School of Mechanical and Aerospace Engineering. His work focuses on evolutionary robotics and creating machines that can demonstrate some aspects of human creativity.