

# Can soft robots transform health care, gaming, and other fields?

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Highly deformable materials are now being engineered to create soft robots that can interact safely with humans and other living systems. But this rapidly advancing field requires more than high-tech materials. Innovation and breakthroughs in a variety of scientific disciplines will be essential, and experts representing these diverse fields participated in a lively and provocative Roundtable Discussion on the future promise and current challenges of soft robots, published in *Soft Robotics (SoRo)*.

The insightful Roundtable Discussion, entitled "At the Crossroads: Interdisciplinary Paths to Soft Robots," brings together leading researchers in various fields necessary for the successful development, integration, and application of this complex technology. The participants describe the state of the field and predict what are likely to be among the first and highly successful applications of soft robot technology: health care and biomedical engineering (for example, to treat [patients with heart failure](#) or paralysis, or to improve prosthetic limbs); gaming and entertainment; human-machine interfaces; and shape-changing structures (such as advanced [airplane wing](#) designs).

"Each of these experts brings a different perspective to soft robotics, and yet there was a surprising amount of agreement on the key challenges facing the next generation of [interactive robots](#)," says Barry A. Trimmer, who directs the Neuromechanics and Biomimetic Devices Laboratory at Tufts University (Medford, MA).

**More information:** At the Crossroads: Interdisciplinary Paths to Soft

Robots: Moderator: Barry Trimmer, Participants: Randy H. Ewoldt, Mirko Kovac, Hod Lipson, Nanshu Lu, Mohsen Shahinpoor, and Carmel Majidi, *Soft Robotics*, July 2013, 1(P): 63-69. [DOI: 10.1089/soro.2013.1509](#)

Provided by Mary Ann Liebert, Inc

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