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Cultural Robotics

First International Workshop, CR 2015 Held as Part of IEEE RO-MAN 2015 Kobe, Japan, August 31, 2015 Revised Selected Papers



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Preface

During the development of the IEEE RO-MAN2016 Cultural Robotics Workshop, we discovered an ever-expanding body of projects that could be classified as "cultural robotics"; robotic improvisational jazz musicians, a robot leading morning prayers, robot bartenders and ballet dancers, robots in theatrical performances, and more. It became very clear to us that robots were playing an increasing role in the production of culture, and that this role was collaborative, sincere, and significant. In research and in the media, more examples emerge every day. It is this significance that has motivated us to collate and share the resulting publications of our workshop.

Our call for contributions was answered by over 50 researchers from countries all over the world, including Australia, Egypt, Japan, Peru, Denmark, and Singapore. A total of 12 full papers and one short paper were accepted from 26 initially submitted. The diversity of the papers confirmed that the ways in which robots were shaping, and will continue to shape, human culture was already extending to areas of our lives that we had not imagined. The selected authors demonstrated a commitment to research investigating our key line of inquiry, that is: "What is the future of robotic contribution to human cultures?" Many of them offered unique and critical insights into the surrounding issues of this intersection of technology and culture, including educational, sociological, and gender–political concerns.

In collating the following papers, we hope to contribute in breadth and depth to the field of cultural robotics, and generate further discourse on the questions that emerged from the workshop discussions, including, "What will the advent of robotic-generated culture look like?"

The papers are organized into four categories. These categories are indicative of the extent to which culture has influenced the design or application of the robots involved, and they explore the progressive overlap between human- and robotic-generated culture. These categories are defined and explored in the opening chapter.

We would like to thank our contributing authors for their enthusiasm, commitment, and hard work: Your expertise and generosity in the submissions and discussions engendered an inspiring workshop and publication.

We would like to acknowledge the UNSW NIEA Creative Robotics Lab (CRL), and its director, Associate Professor Mari Velonaki. Thank you for founding a lab that is as close as a family, and inspires a creative approach to robotics research that is being met with international interest and vigor.

June 2016

Jeffrey T.K.V. Koh Belinda J. Dunstan David Silvera-Tawil

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