

# Daisuke Sakamoto, Ph.D

---

Department of Computer Science, Graduate School of  
Information Science and Technology,  
The University of Tokyo, 7-3-1 Hongo, Bunkyo 113-0033  
Tokyo, JAPAN

<http://daisukesakamoto.jp/en/>  
d.sakamoto@gmail.com  
Phone: (Removed)  
Fax: (Removed)

## RESEARCH INTEREST

Human-Robot Interaction (HRI), Human-Computer Interaction (HCI), User Interface and Experience, Sociability of Robots, HRI Systems and Evaluations, Human Factors, Tele-communication, Tele-existence.

## EDUCATION

- Ph.D., Systems Information Science** **2006-2008**  
Graduate School of Systems Information Science  
Future University-HAKODATE, Hokkaido, Japan  
Committee: Dr. Tesuo Ono (Chair), Dr. Ei-ichi Osawa (Vice chair), Dr. Yasuhiro Katagiri,  
Makoto Okamoto, and Dr. Hiroshi Ishiguro
- Master of System Information Science** **2004-2006**  
Graduate School of Systems Information Science  
Future University-HAKODATE, Hokkaido, Japan  
Advised by Dr. Tesuo Ono
- Bachelor of Media Architecture** **2000-2004**  
School of Systems Information Science  
Department of Media Architecture  
Future University-HAKODATE, Hokkaido, Japan  
Advised by Dr. Tesuo Ono

## PROFESSIONAL EXPERIENCE

- Dept. of Computer Science, Graduate School of Information Science and Technology,  
The University of Tokyo** **2011-current**  
Tokyo, Japan, Assistant Professor.
- Art Media Center, Tokyo University of the Arts** **2011-current**  
Tokyo, Japan, Part-time Lecturer.
- Japan Science and Technology Agency, ERATO IGARASHI Design Interface Project** **2011-current**  
Tokyo, Japan, Researcher.
- Japan Science and Technology Agency, ERATO IGARASHI Design Interface Project** **2010-2011**  
Tokyo, Japan, Research Advisor.
- Japan Society for Promotion Science** **2008-2010**  
Tokyo, Japan, Postdoctoral Fellow.
- Japan Science and Technology Agency, ERATO IGARASHI Design Interface Project** **2008-2010**  
Tokyo, Japan, Collaborator.  
Collaboration with Dr. Takeo Igarashi and Dr. Masahiko Inami
- ATR Intelligent Robotics and Communication labs.** **2008 - current**  
Kyoto, Japan. Cooperate Researcher (Visiting Researcher).  
Collaboration with Dr. Hiroshi Ishiguro

<b>ATR Intelligent Robotics and Communication labs.</b> Kyoto, Japan. Intern. Collaboration with Dr. Takayuki Kanda and Dr. Hiroshi Ishiguro	<b>2006-2008</b>
<b>ATR Intelligent Robotics and Communication labs.</b> Kyoto, Japan. Intern Student. Collaboration with Dr. Takayuki Kanda and Dr. Hiroshi Ishiguro	<b>2003</b>
<b>Sony corp.</b> Tokyo, Japan. Intern Student.	<b>2002</b>

## PUBLICATIONS

### Journal paper

Masahiro Shiomi, **Daisuke Sakamoto**, Takayuki Kanda, Carlos Toshinori Ishi, Hiroshi Ishiguro, and Norihiro Hagita. *Field Trial of a Networked Robot at a Train Station*, International Journal of Social Robotics, Volume 3, Number 1, 27-40, 2011.

**Daisuke Sakamoto**, Kotaro Hayashi, Takayuki Kanda, Masahiro Shiomi, Satoshi Koizumi, Hiroshi Ishiguro, Tsukasa Ogasawara and Norihiro Hagita. 2009. *Humanoid Robots as a Broadcasting Communication Medium in Open Public Spaces*, International Journal of Social Robotics, Springer, Vol. 1. No. 2. pp. 157-169.

**Daisuke Sakamoto**, Hiroshi Ishiguro. *GEMINOID: REMOTE-CONTROLLED ANDROID SYSTEM FOR STUDYING HUMAN PRESENCE*, Kansei Engineering International, Japan Society of KANSEI engineering, Vol. 8, No. 1, pp. 3-9, 2009.

Takayuki Kanda, Masayuki Kamasima, Michita Imai, Tetsuo Ono, **Daisuke Sakamoto**, Hiroshi Ishiguro and Yuichiro Anzai. 2007. *A Humanoid Robot that Pretends to Listen to Route Guidance from a Human*, Autonomous Robots, Springer Netherlands, Vol. 22, No. 1, pp. 87-100.

**Daisuke Sakamoto**, Takayuki Kanda, Tetsuo Ono, Masayuki Kamashima, Michita Imai, and Hiroshi Ishiguro. 2005. *Cooperative embodied communication emerged by interactive humanoid robots*, International Journal of Human-Computer Studies, Elsevier, Vol. 62, pp. 247-265.

### Refereed conference and workshop

Yuta Sugiura, Gota Kakehi, Anusha Withana, Calista Lee, **Daisuke Sakamoto**, Maki Sugimoto, Masahiko Inami, and Takeo Igarashi. 2011. *Detecting Shape Deformation of Soft Objects Using Directional Photorefectivity Measurement*. In Proceedings of the 24th annual ACM Symposium on User Interface Software and Technology (UIST '11). ACM, New York, NY, USA, 509-516.

DOI: [10.1145/2047196.2047263](https://doi.org/10.1145/2047196.2047263)

Gota Kakehi, Yuta Sugiura, Anusha Withana, Calista Lee, Naohisa Nagaya, **Daisuke Sakamoto**, Maki Sugimoto, Masahiko Inami, and Takeo Igarashi. *FuwaFuwa: Detecting Shape Deformation of Soft Objects Using Directional Photorefectivity Measurement*. In ACM SIGGRAPH 2011 Emerging Technologies (SIGGRAPH '11). ACM, New York, NY, USA, , Article 5 , 1 pages.

DOI: [10.1145/2048259.2048264](https://doi.org/10.1145/2048259.2048264)

Kexi Liu, **Daisuke Sakamoto**, Masahiko Inami, and Takeo Igarashi. 2011. *Roboshop: multi-layered sketching interface for robot housework assignment and management*. In Proceedings of the 2011 annual conference on Human factors in computing systems (CHI '11). ACM, New York, NY, USA, 647-656.

DOI: [10.1145/1978942.1979035](https://doi.org/10.1145/1978942.1979035)

Takumi Shirokura, **Daisuke Sakamoto**, Yuta Sugiura, Tetsuo Ono, Masahiko Inami, and Takeo Igarashi. 2010. *RoboJockey: real-time, simultaneous, and continuous creation of robot actions for everyone*. In Proceedings of the 7th International Conference on Advances in Computer Entertainment Technology (ACE'10), Nov. 17-19, 2010, Taiwan.

DOI: [10.1145/1971630.1971646](https://doi.org/10.1145/1971630.1971646)

Yuta Sugiura, **Daisuke Sakamoto**, Anusha Withana, Masahiko Inami, and Takeo Igarashi. 2010. *Cooking with robots: designing a household system working in open environments*. In Proceedings of the 28th international Conference on Human Factors in Computing Systems (CHI '10). ACM, New York, NY, 2427-2430.

DOI: [10.1145/1753326.1753693](https://doi.org/10.1145/1753326.1753693)

Yuta Sugiura, Charith Lasantha Fernando, Anusha Indrajith Withana, **Daisuke Sakamoto**, Maki Sugimoto, Masahiko Inami, Takeo Igarashi, Kakehi Gota and Masahiko Inakage. *An Operation Method of Biped Walking Robot for Entertainment*. ACM SIGGRAPH Asia 2009 Emerging Technologies.

Thomas Seifried, Michael Haller, Stacey D. Scott, Florian Perteneder, Christian Rendl, **Daisuke Sakamoto**, Masahiko Inami, *CRISTAL: Design and Implementation of a Remote Control System Based on a Multi-touch Display*, In Proceedings of ACM International Conference on Interactive Tabletops and Surfaces 2009 (Tabletop2009).

DOI: [10.1145/1731903.1731911](https://doi.org/10.1145/1731903.1731911)

Kohei Ogawa, Christoph Bartneck, **Daisuke Sakamoto**, Takayuki Kanda, Tetsuo Ono, Hiroshi Ishiguro, 2009. *Can An Android Persuade You?* In Proceedings of 18th IEEE International Symposium on Robot and Human Communication (ROMAN2009).

DOI: [10.1109/ROMAN.2009.5326352](https://doi.org/10.1109/ROMAN.2009.5326352)

Thomas Seifried, Christian Rendl, Florian Perteneder, Jakob Leitner, Michael Haller, **Daisuke Sakamoto**, Jun Kato, Masahiko Inami, Stacey Scott. 2009. *CRISTAL: Control of Remotely Interfaced Systems Using Touch-Based Actions in Living Spaces*. SIGGRAPH 2009 Emerging Technologies, New Orleans, USA (3rd - 7th August, 2009).

Jun Kato, **Daisuke Sakamoto**, Masahiko Inami, Takeo Igarashi. 2009. *Multi-touch Interface for Controlling Multiple Mobile Robots*, CHI '09 extended abstracts on Human factors in computing systems (CHI2009), Boston, USA (April 2009).

DOI: [10.1145/1520340.1520500](https://doi.org/10.1145/1520340.1520500)

**Daisuke Sakamoto**, Koichiro Honda, Masahiko Inami, Takeo Igarashi. 2009. *Sketch and Run: A Stroke-based Interface for Home Robots*, In Proceeding of the Twenty-Seventh Annual SIGCHI Conference on Human Factors in Computing Systems (CHI2009), pp. 197-200, Boston, USA (April 2009).

DOI: [10.1145/1518701.1518733](https://doi.org/10.1145/1518701.1518733)

Masahiro Shiomi, **Daisuke Sakamoto**, Takayuki Kanda, Carlos Toshinori Ishi, Hiroshi Ishiguro, Norihiro Hagita, 2008. *A Semi-autonomous Communication Robot -A Field Trial at a Train Station -*, ACM/IEEE 3rd Annual Conference on Human-Robot Interaction (HRI2008), Amsterdam, Netherlands (March 2008).

DOI: [10.1145/1349822.1349862](https://doi.org/10.1145/1349822.1349862)

**Daisuke Sakamoto**, Takayuki Kanda, Testuo Ono, Hiroshi Ishiguro, Norihiro Hagita. 2007. *Android as a Telecommunication medium with Human Like Presence*, 2nd ACM/IEEE International Conference on Human-Robot Interaction (HRI2007), Washington D.C., USA, (March 2007).

DOI: [10.1145/1228716.1228743](https://doi.org/10.1145/1228716.1228743)

Kotaro Hayashi, **Daisuke Sakamoto**, Takayuki Kanda, Masahiro Shiomi, Satoshi Koizumi, Hiroshi Ishiguro, Tsukasa Ogasawara, and Norihiro Hagita. 2007. *Humanoid robots as a passive-social medium - a field experiment at a train station -*, 2nd ACM/IEEE International Conference on Human-Robot Interaction (HRI2007), Washington, D.C., USA, (March 2007).

DOI: [10.1145/1228716.1228735](https://doi.org/10.1145/1228716.1228735)

**Daisuke Sakamoto**, Tetsuo ONO. 2006. *Sociality of Robots: Do Robots Construct or Collapse Human Relations?* 1st Annual Conference on Human-Robot Interaction(HRI2006), ACM SIGCHI.

DOI: [10.1145/1121241.1121313](https://doi.org/10.1145/1121241.1121313)

Komatsu, T., Suzuki, S., Suzuki, K., Ono, T., Matsubara, H., Uchimoto, T., Okada, H., Kitano, I., **Sakamoto, D.**, Sato, T., Honma, M., Sato, T., Osada, J., Hata., M and Inui, H. 2005. *Reconfigurable robot with intuitive authoring system—"Dress-Up Robot"*- In Proceedings of the 36th International symposium on Robotics (ISR2005), 2005.

**Daisuke Sakamoto**, Tetsuo ONO. 2005. *activeCanvas: Using Ambient Displays as a Canvas for Embedded Interactive Art*, IFIP/IPSJ 4th International Conference on Entertainment Computing (ICEC).

**Daisuke Sakamoto**, Takayuki Kanda, Tetsuo Ono, Masayuki Kamashima, Michita Imai, and Hiroshi Ishiguro. 2004. *Cooperative embodied communication emerged by interactive humanoid robots*, IEEE International Workshop on Robot and Human Communication (ROMAN2004), pp. 443-448.

DOI: [10.1109/ROMAN.2004.1374801](https://doi.org/10.1109/ROMAN.2004.1374801)

Masayuki Kamasima, Takayuki Kanda, Michita Imai, Tetuo Ono, **Daisuke Sakamoto**, Hiroshi Ishiguro, Yuichiro Anzai. 2004. *Embodied Cooperative Behaviors by an Autonomous Humanoid Robot*, IEEE/RSJ International Conference on Intelligent Robots and Systems (IROS2004), pp.2506-2513.

DOI: [10.1109/IROS.2004.1389785](https://doi.org/10.1109/IROS.2004.1389785)

## ACADEMIC SERVICES

**Organizing Committee Member** 2010-2012  
Special Interest Group on Interaction Design (SIGIXD), Japan

ACM International Conference on Interactive Tabletops and Surfaces (ITS), Publicity Chair 2011

International Conference on Artificial Reality and Telexistence (ICAT), Publicity Co-chair 2011

**Program committee** 2010-2011  
International Conference on Advances in Computer Entertainment Technology (ACE)

International Conference on Artificial Reality and Telexistence (ICAT), Program Committee 2011

ACM International Conference on Interactive Tabletops and Surfaces (ITS) 2009

**Reviewer**  
ACM SIGCHI Symposium on Engineering Interactive Computing Systems (EICS) 2011-2012

ACM International Conference on Human Factors in Computing Systems (CHI) 2010-2012

ACM Conference on Computer Supported Cooperative Work (CSCW) 2012

ACM Symposium on User Interface Software and Technology (UIST) 2010

ACM International Conference on Ubiquitous Computing (UbiComp) 2010

International Conference on Artificial Reality and Telexistence (ICAT) 2010

ACM International Conference on Interactive Tabletops and Surfaces (ITS / Tabletops) 2009-2010

ACM Symposium on User Interface Software and Technology (UIST), Demonstration 2009

ACM/IEEE International Conference on Human-Robot Interaction (HRI) 2006-2010

International Conference on Advances in Computer Entertainment Technology (ACE) 2008-2009

IEEE/RSJ International Conference on Intelligent Robots and Systems (IROS) 2007-2009

IEEE International Symposium on Robot and Human Interactive Communication (RO-MAN) 2009

### Teaching Assistant

Department of Media Architecture, Future University-Hakodate, Japan  
Intelligent Programming (2002, 2003), Programming Exercise (2003)

## AWARDS (PARTIAL LIST)

**Best Paper Silver Award** 2010  
International Conference on Advances in Computer Entertainment Technology (ACE 2010)

**Grand Prix du Jury** 2010  
Laval Virtual 2010, France

**Best of Emerging Technologies Award 2009** 2009  
ACM SIGGRAPH 2009, Emerging technologies.

**IPSJ Best Paper Award** 2009  
IPSJ (Japanese ACM), Japan

- First Prize, Robot Media Art International Competition** 2007  
Kobe Biennale 2007, Japan
- Best Paper Award** 2007  
2<sup>nd</sup> ACM/IEEE International Conference on Human-Robot Interaction (HRI2007)
- Best Paper Award** 2007  
IPSJ (Japanese ACM), Japanese Symposium on Interaction

## LANGUAGE SKILL

**Japanese**  
Native

**English**  
Intermediate

## REFERENCE

**Prof. Tetsuo Ono**

Graduate School of Information Science and Technology, Hokkaido University  
<http://chaosweb.complex.eng.hokudai.ac.jp/~tono/>

**Prof. Takeo Igarashi**

Dept. of Computer Science, Graduate School of Information Science and Technology, The University of Tokyo  
<http://www-ui.is.s.u-tokyo.ac.jp/~takeo/>

**Prof. Hiroshi Ishiguro**

School of Engineering, Dept. of Adaptive Machine Systems, Osaka University  
<http://www.ed.ams.eng.osaka-u.ac.jp/~ishiguro/>