



13th Japanese-German Frontiers of Science Symposium

Steigenberger Hotel Sanssouci in Potsdam, October 6-9, 2016

Program

Thursday, October 6

Arrival of Japanese participants at Berlin Tegel Airport and bus transfer to the conference venue

Individual arrival of German participants

6:00-7:00 p.m.	Session Coordination Meeting (for Planning Group Members 2016 and speakers only)	<i>Salon Steuben</i>
6:30 p.m.	Registration	<i>Maxx 2</i>
7:00-9:00 p.m.	Welcome Reception	<i>Maxx 2</i>
	Katja Hartmann, Program Director Frontiers of Research, Alexander von Humboldt Foundation	
	Takeshi Kakegawa, Japan Society for the Promotion of Science FoS Advisory Board	

Friday, October 7

	Breakfast	<i>Restaurant</i>
8:30-9:00 a.m.	Opening Remarks	<i>Maxx 2</i>
	Helmut Schwarz, President, Alexander von Humboldt Foundation	
	Takeshi Kakegawa, Japan Society for the Promotion of Science FoS Advisory Board	
	Yvonne Stahl, German Co-Chair	
	Takashi Nakanishi, Japanese Co-Chair	
9:00-11:00 a.m.	Session I: Genome Editing: Function, Application and Future	<i>Maxx 2</i>
	Planning Group Members: Naoki Osada & Yvonne Stahl	
	Introduction:	
	<i>The Different Flavors of Antiviral Defense</i> Lennart Randau, Max Planck Institute for Terrestrial Microbiology, Marburg	
	Speakers:	
	<i>Single Base Pair Genome-Editing Technology and Its Future Applications</i> Hiroshi Ochiai, Department of Mathematical and Life Sciences, Graduate School of Science, Hiroshima University	

Prospects of Genome Editing in Fundamental and Applied Plant Research

Johannese Stuttmann, Institute of Biology/Genetics, Department of Plant Genetics, Martin Luther University Halle-Wittenberg

11:00-11:15 a.m.	Group photograph of all participants	<i>Garden</i>
11:15-11:30 a.m.	Coffee Break	<i>Salon Steuben</i>
11:30-12:45 p.m.	Poster Flash Talks	<i>Maxx 2</i>
12:45-2:00 p.m.	Lunch	<i>Restaurant</i>
2:00-3:30 p.m.	Poster Session - Part I: Posters with Odd Numbers incl. Coffee Break	<i>Salon Steuben</i>
3:30-4:30 p.m.	Presentation of JSPS and AvH Sachiko Kawakami, Section Chief of Frontiers of Science Symposium, Japan Society for the Promotion of Science Katja Hartmann, Program Director Frontiers of Research, Alexander von Humboldt Foundation	<i>Maxx 2</i>
4:30-6:30 p.m.	Session II: Chemistry of Confined Space Planning Group Members: Takashi Nakanishi & Patrick Theato Introduction: <i>Small Spaces Have Big Possibilities</i> Takashi Uemura, Department of Synthetic Chemistry and Biological Chemistry, Graduate School of Engineering, Kyoto University Speakers: <i>Molecular Guest Houses</i> Guido Clever, Chair of Bioinorganic Chemistry, Faculty of Chemical Biology, Technical University of Dortmund <i>Confined Space in Biological Molecules</i> Keiichi Inoue, Graduate School of Engineering, Nagoya Institute of Technology	<i>Maxx 2</i>
6:30-8:30 p.m.	Dinner	<i>Restaurant</i>

Saturday, October 8

	Breakfast	<i>Restaurant</i>
8:30-10:30 a.m.	Session III: Gender, Education and Inequality Planning Group Members: Tamaki Endo & Hella von Unger Introduction: <i>Effort, Ability and Stereotypes: How to Explain Gender Differences in Educational Outcomes</i> Ursula Kessels, Department of Education and Psychology, FU Berlin	<i>Maxx 2</i>

Speakers:

Doing Gender in the Classroom: Ethnographic Explorations
Bettina Fritzsche, Institute of Educational Sciences, University of
Education Freiburg

*New Aspects of the Gender Inequality in Education: Focusing on the
Case of Japan*
Wataru Nakazawa, Graduate School of Human Sciences, Osaka
University

10:30-12:00 a.m. **Poster Session - Part II: Posters with Even Numbers
incl. Coffee Break** *Salon
Steuben*

12:00-1:30 p.m. Lunch *Restaurant*

1:30-3:30 p.m. **Session IV: Breakdown of Dynamics** *Maxx 2*

Planning Group Members: Yasuhiro Hasegawa & Michael Schmiedeberg

Introduction:

*Breakdown of Dynamics - (In)Stabilities, Frustration and Critical
Transitions*

Marc Timme, Network Dynamics Group, Max Planck Institute for
Dynamics and Self-Organization, Göttingen

Speakers:

*On Easing Traffic Jams Utilizing the Nature of the Stability of Traffic
Flows*

Ryosuke Nishi, Department of Mechanical and Aerospace Engineering,
Graduate School of Engineering, Tottori University

Soft Glasses: Frustration and Flow

Matthias Krüger, Max Planck Institute for Intelligent Systems, Stuttgart

3:45 p.m. **Cultural Tour**

7:00 p.m. Dinner at Krongut Bornstedt

Sunday, October 9

Please note: Check-out time until 11:00 a.m.

Breakfast *Restaurant*

8:30-10:30 a.m. **Session V: Machine Consciousness** *Maxx 2*

Planning Group Members: Gabriele Peters & Shuntaro Yamazaki

Introduction:

Machine Consciousness: a Dream to Build a Strong AI

Shohei Hidaka, School of Knowledge Science, Japan Advanced Institute
of Science and Technology

Speakers:

*How Do We Learn and Think about our World and Become Language
Ready?*

Martin V. Butz, Computer Science, Cognitive Modeling, University of
Tübingen

How Can We Assess “Machine Consciousness”? – From the Perspective of Integrated Information Theory
Masafumi Oizumi, Laboratory for Mathematical Neuroscience, RIKEN - Brain Science Institute

10:30-11:00 a.m.	Coffee Break	<i>Salon Steuben</i>
11:00-1:00 p.m.	Session VI: The Future of Ice Planning Group Members: Thomas Laepple & Tomohiro Usui Introduction: <i>“The Future of Ice” Judged by the Things Past</i> Yoshinori Iizuka, Institute of Low Temperature Science, Hokkaido University Speakers: <i>Climate Variability and Ice Sheet Dynamics During the Past Three Glaciations</i> Stephen Obrochta, Faculty of International Resource Sciences, Akita University <i>Ice Physics Studies Using Deep Ice Cores in the Light of Global Warming</i> Ilka Weikusat, Alfred Wegener Institute, Bremerhaven	<i>Maxx 2</i>
1:00-1:30 p.m.	Concluding Remarks Takashi Nakanishi, Japanese Co-Chair Yvonne Stahl, German Co-Chair Yuko Fujigaki, Japan Society for the Promotion of Science FoS Advisory Board Katja Hartmann, Program Director Frontiers of Research, Alexander von Humboldt Foundation	<i>Maxx 2</i>
1:30-2:30 p.m.	Farewell Lunch	<i>Restaurant</i>
2:30 p.m.	Meeting ends Transfer to airport for Japanese participants	