



POTENTIALS AND CHALLENGES FOR INTERNATIONAL SCIENCE COOPERATION.

2nd Helmholtz-CAS Workshop organized by the WIKOOP-INFRA Project

Two-day meeting on 5-6 June, 2023

Venue: Room 901, Institutes of Science and Development, Chinese Academy of Sciences
(中国科学院科技战略咨询研究院九层 901 会议室, 北京市海淀区中关村北一条 15 号)

Address: No.15 ZhongGuanCun BeiYiTiao, Beijing, China

Join Zoom Meeting (Day 1): <https://desy.zoom.us/j/68797825982>

Meeting-ID: 687 9782 5982; Passcode: WIKOOP

DRAFT AGENDA

Objective

The workshop serves as a platform for bilateral exchange and discussions on how to navigate mutual cooperation and sustain global science through uncertain times. It is a follow-up of the two-day workshop taking place in September 2022. The focus of this year's hybrid workshop is on possibilities and best practices of science for global impact. All members from Helmholtz and CAS may participate at the workshop online. The workshop will be followed by in-person only background discussions in Beijing on the challenges for mutually beneficial cooperation.

Hybrid Workshop (Mon, 5 June)

13:45-14:00 BJT, 07:45-08:00 CET

Technical Check

14:00-14:15 BJT, 08:00-08:15 CET

Welcome Addresses

Chair: Yan WU, Deputy Director General, Bureau of International Cooperation, CAS

- Gang SU, Director General, Bureau of Frontier Sciences and Education, Chinese Academy of Sciences (on behalf of Vice President Dr. Yaping Zhang)

- Helmut DOSCH, Vice President and Research field coordinator Matter of Helmholtz Association, Chairman of the DESY board of directors

14:15-14:30 BJT, 08:15-08:30 CET

Introduction to the 2nd Workshop

- Marcus CONLE, DESY

14:30-15:15 BJT, 08:30-09:15 CET

A. Science Policy Advice

Chair: Jiaofeng PAN, Director, Institutes of Science and Development, CAS

1) TBA

- Rongping MU, Professor, Institutes of Science and Development, CAS

2) Science Policy Advice at Helmholtz – National and international activities

- Alexandra ROSENBAACH, Deputy Director External Affairs, Helmholtz Association

15:15-16:00 BJT, 09:15-10:00 CET

B. Interdisciplinary research at large-scale facilities

Chair: Elke Ploenjes-Palm, DESY

1) Carbon Dioxide-oriented Institutional Research Platform for Photon Science

- Wei WEI, Vice President, Shanghai Advanced Research Institute, CAS

2) The Centre for Molecular Water Science (CMWS): a pan-European research consortium of key experts from water-related sciences

- Melanie SCHNELL, Lead Scientist, DESY

---Break (30 minutes)---

16:30-17:15 BJT, 10:30-11:15 CET

C. Science Data Management

Chair: Xin CHEN, Deputy Director, General Data Center, CAS

1) Scientific Data Management Policy at HEPS

- Hao HU, Senior Engineer, Institute of High Energy Physics, CAS

2) Umbrella data policy for multi-divisional research centers

- Özlem ÖZKAN, Senior Policy Officer, Helmholtz Metadata Collaboration

17:15-18:00 BJT, 11:15-12:00 CET

D. Artificial Intelligence and Research Integrity

Chair: Yi ZENG, Institute of Automation, CAS (participate online)

1) Generative Artificial Intelligence and new research ethics

- Xiao LU, Professor, Institutes of Science and Development, CAS

2) TBA

- Peter STEINBACH, Team Leader, Helmholtz AI Consultant Team for Matter Research, Helmholtz-Zentrum Dresden-Rossendorf (HZDR)

18:00-18:30 BJT, 12:00-12:30 CET

E. Wrap-up

Chair: Helmut DOSCH, Vice President, Helmholtz Association

Background Discussions (in person only, Tue., 6 June)

9:30-11:00 BJT

A. Challenges for mutually beneficial Cooperation

Chair: Götz Neuneck (IFSH)

1) Current German Debates on Science Cooperation with China

- Margot Schüller (GIGA)

2) Conference on "Research Security" in May 2023 in Berlin: Summary of the Main Points

- Marcus Conlé (DESY)

3) Feedback and Discussion

---Break (30 minutes)---

11:30-12:30 BJT

B. Suggested Paths towards Sustainable Cooperation

Chair: Yifang WANG

1) Standpoints and Positions

- CAS

2) Discussion and Outlook

Chairs and Presenters



Wei WEI, Professor and Ph.D supervisor, vice-president of the Shanghai Advanced Research Institute, Chinese Academy of Sciences. He is a candidate of the National Ten-thousand Talent Project, and nominated as the “Ministry of Science and Technology Youth Leader in Technological Innovation”. His main research focus includes budget, policies, and reduction technologies for greenhouse gas. He is the major author of a range

of reports from MOST, including “Evaluation of CO₂ utilization technologies in China”, “Evaluation of CCUS technologies in China”, “Research on Technology development Roadmap for Carbon Capture Utilization and Storage (CCUS) in China (2011)”, and “Research on Technology development Roadmap for Carbon Capture Utilization and Storage (CCUS) in China (2019)”. He has been issued with 3 international and more than 80 domestic patents, with over 400 peer-reviewed papers published on international journals including Nature, Nature Chemistry, Nature Geoscience, Joule, Environmental Science & Technology, Angew. Chem. Int. Ed..



Hao HU, Senior Engineer of Institute of High Energy Physics, Chinese Academy of Science, responsible for the research and development of scientific data management of High Energy Photon Source(HEPS) and High Energy cosmic Radiation Detection facility (HERD). She is an expert in scientific data policy, data management technology and data format standardization. She has been in charge of a NSFC Youth Project and published research articles in *Journal of*

Synchrotron Radiation, Big Data, Proceedings of CHEP Conference, etc.



Xiao LU, Professor of the Institutes of Science and Development, Chinese Academy of Sciences, Executive Director of the Research Center for Scientific Norms and Ethics of Academic Divisions of CAS. Her research interests include S&T policy and management, the governance of new emerging technologies, sociology and science. She was an expert for policy consultation for the Ministry of Finance, the Ministry of Human Resources and Social Security, the Ministry of Science and Technology of P. R. China. She has been in charge of a number of national research project, for example, NSFC Youth

Project, Project of Youth Innovation Promotion Association of CAS, etc., She has published research articles in *Research Policy*, *Bulletin of Chinese Academy of Sciences*, *Chinese Science Bulletin*, *Studies in Science of Science*, etc.



Helmut DOSCH

Helmut Dosch is a solid-state physicist, Chairman of the Board of Directors of Deutsches Elektronen-Synchrotron DESY in Hamburg, and, since 2013, Vice President of the Helmholtz Association. After studying and obtaining his doctorate in physics in Munich and working at Cornell University and the University of Wuppertal, he was Director at the Max Planck Institute for Metal Research in Stuttgart before moving to Hamburg in 2009. He is an expert in the use of synchrotron radiation to study surface and interface phenomena. Dosch has received several awards for his research, including the Röntgen medal of the city of Remscheid, an honorary doctorate from the Kurchatov Institute in Moscow, and an honorary membership of the Materials Research Society of India.



Elke PLOENJES-PALM

Dr. Elke Ploenjes-Palm is the Group Leader FS-FLASH-B “FLASH Beamlines and Optics” at Deutsches Elektronen-Synchrotron DESY. In addition, she serves as the scientific coordinator of the EU Project LEAPS-INNOV (“Open innovation for accelerator-based light sources in Europe”) since 2021 and the FLASH representative at FELs OF EUROPE, a collaboration of all free electron laser (FEL) facilities in Europe, since 2016. After receiving her graduate degree and doctorate in physics from the University of Bonn, she was a postdoctoral researcher at Ohio State University. Elke has joined DESY in 2002.



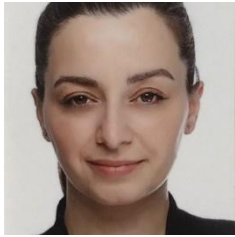
Melanie SCHNELL

Melanie Schnell is a professor for Physical Chemistry at the Christian-Albrecht University of Kiel and a Lead Scientist at Deutsches Elektronen-Synchrotron DESY where she heads the research group “Spectroscopy of molecular processes”. Before joining DESY, she had been a group leader at both, the Fritz Haber Institute of the Max Planck Society and then the Max Planck Institute for the Structure and Dynamics of Matter. Melanie studied chemistry in Hannover and Bonn, received her doctorate in physical chemistry from the University of Hannover and worked as a postdoctoral researcher at the National Institute for Standards and Technology in Gaithersburg, Maryland, USA.



Alexandra ROSENBACH

Alexandra Rosenbach is International Relations Manager at the Head Office of the Helmholtz Association in Berlin since January 2017. In this position, she is responsible for the Association’s international funding programs and the development and implementation of the Helmholtz internationalization strategy, amongst others. In addition, she is also Deputy Director of the department Communication and External Affairs at the Head Office of the Helmholtz Association. Prior to that, she was Head of International Relations at Maastricht University in the Netherlands. Alexandra Rosenbach has a B.A. in German and English Studies and an M.A. in Media Culture.



Özlem ÖZKAN

Dr Özlem ÖZKAN is the Senior Data Policy Officer of Helmholtz Metadata Collaboration (HMC) for the field of Matter. In this role, she provides consultation services to Matter institutes, assisting them in the development and refinement of their data management policies and guideline documents. Özlem holds a Master's and PhD in Medical Informatics from Middle East Technical University, where her research primarily focused on genetic and health data protection. Prior to her current position at Helmholtz-Zentrum Berlin (HZB), Özlem was working as a Research Data Manager at Max Delbrück Center.



Götz NEUNECK

Götz Neuneck is Senior Research Fellow at the Institute for Peace Research and Security Policy at the University of Hamburg (IFSH) and Professor at the MIN Faculty at the University of Hamburg. From 2008-2018, he was the Deputy Director of IFSH. Neuneck is a member of the Council of the “Pugwash Conferences on Science and World Affairs”. After completing his degree in physics in Düsseldorf in 1984, he was part of the working group of Horst Afheldt and Carl-Friedrich von Weizsäcker run by the Max Planck Society in Starnberg. He earned his PhD in Mathematics (Dr. rer. nat. 1985) from University of Hamburg. Götz has received several honors, including the Federal Cross of Merit and the foreign membership of the Russian and Armenian Academy of Sciences. He is Deputy Chair of the DESY Commission for Ethics in Research.



Margot SCHÜLLER

Dr Margot Schüller is Senior Research Fellow at the GIGA Institute for Asian Studies, German Institute for Global and Area Studies (GIGA). After her study of economics, she spent 2.5 years on a scholarship for language study and field research in China. She received her PhD in Economics in 1989 and started her work at GIGA in 1990. She is a regular lecturer on Chinese and East Asian economics in Germany and abroad and a consultant of governmental and private institutions. Her current research focusses on science, technology and innovation in Asia, especially China. She was a member of the Sino-German Innovation Platform, an Initiative of the German Federal Ministry of Education and Research (BMBF) and the Chinese Ministry of Science and Technology (MOST) from 2012 to 2020.



Marcus CONLÉ

Dr. Marcus Conlé is a research fellow at Deutsches Elektronen-Synchrotron DESY. He is the coordinator of the project WIKOOP-INFRA that develops recommendations for handling cooperation with China at large research infrastructures. He is also an associate at the German Institute for Global and Area Studies (GIGA), where he co-authors the Asia Pacific Research Area (APRA) Performance Monitoring reports commissioned by the German Federal Ministry of Education and Research (BMBF). Marcus has done extensive research on China's regional and sectoral innovation systems in Bremen and Duisburg. He studied Area Studies/China in Cologne and Dalian and completed his doctorate at the Mercator School of Management, University of Duisburg-Essen.

Participants from CAS

Gang SU, Director General, Professor, Bureau of Frontier Sciences and Education, CAS (on Monday only)

Yan WU, Deputy Director-General, Bureau of International Cooperation, CAS (on Monday only)

Hui SUN, Director, Division of European Affairs, Bureau of International Cooperation, CAS

Qiang FANG, Senior Program Coordinator, Bureau of International Cooperation, CAS

Yudan ZHANG, Program Coordinator, Bureau of International Cooperation, CAS

Jiaofeng PAN, Director, Institutes of Science and Development, CAS (on Monday only)

Rongping MU, Professor, Institutes of Science and Development, CAS (on Monday only)

Xiao LU, Professor, Institutes of Science and Development, CAS

Haibo LIU, Professor, Institutes of Science and Development, CAS

Chunliang FAN, Professor, Institutes of Science and Development, CAS

Hui LIN, Director, Department of Science & Technology Management, Institutes of Science and Development, CAS

Yifang WANG, Director, CAS Member, Institute of High Energy Physics, CAS (on Tuesday only)

Zhentang ZHAO, CAS Member, Shanghai Advanced Research Institute, CAS (on Tuesday only)

Wei WEI, Vice President, Shanghai Advanced Research Institute, CAS (on Monday only)

Hong DING, Deputy Director, Professor, Tsung-Dao LEE Institute, Shanghai Jiaotong University (on Tuesday only)

Hao HU, Senior Engineer, Institute of High Energy Physics, CAS (on Monday only)

Xinwen MA, Professor, Institute of Modern Physics, CAS

Yi ZENG, Professor, Institute of Automation, CAS (participate online)

Xin CHEN, Deputy Director, General Data Center, CAS

Lulu JIANG, Deputy Director of Data Publishing and Data Engineering Lab, CNIC, CAS

Jia LIU, Director, Senior Engineer, Identification Technology and Application Service Lab, CNIC, CAS
(on Tuesday only)

Zexia LI, Professor, National Science Library, CAS

Yizhan LI, Associate Professor, National Science Library, CAS

Dong WANG, Assistant Professor, National Science Library, CAS

(In-person) Participants from WIKOOP-Helmholtz

Helmut DOSCH, Vice President and Research field coordinator Matter of Helmholtz Association,
Chairman of the DESY board of directors

Frank LEHNER, Head of Directorate's Office, Deutsches Elektronen-Synchrotron DESY

Martin SANDHOP, Team Leader International Affairs, Deutsches Elektronen-Synchrotron DESY

Marcus CONLÉ, Project leader WIKOOP-INFRA, Deutsches Elektronen-Synchrotron DESY

Harald REICHERT, Project leader PETRA IV, Deutsches Elektronen-Synchrotron DESY

Hans WEISE, Lead scientist, Accelerator Division, Deutsches Elektronen-Synchrotron DESY

Lucas SCHAPER, Project leader FLASH 2020+, Deutsches Elektronen-Synchrotron DESY

Elke PLOENJES-PALM, Group Leader FLASH Beamlines and Optics, Deutsches Elektronen-Synchrotron DESY

Jost WOLFF (DIB), Staff member, International Affairs, Deutsches Elektronen-Synchrotron DESY

Margot SCHUELLER, WIKOOP-INFRA Team Member and Senior Research Fellow at German
Institute for Global and Area Studies (GIGA)

Goetz NEUNECK, Professor, WIKOOP-INFRA Team Member and Senior Research Fellow at
Institute for Peace Research and Security Policy at the University of Hamburg (IFSH)

Alexandra ROSENBACH, Deputy Director External Affairs, Helmholtz Association

Hong HE, Chief Representative in China, Helmholtz Association

Christian SCHERF, Administrative Director, Helmholtz Centre for Infection Research (HZI) *(on
Tuesday only)*

Ludwig STROINK, Head "Projects & International Affairs", Helmholtz Centre Potsdam/ GFZ German
Research Centre for Geosciences *(on Tuesday only)*

Claudia MAYER, Head of International Cooperations, The German Cancer Research Center (DKFZ)