



**20-22 OCTOBER 2018
KYIV**

**ADVANCING SCIENCE
THROUGH INTERNATIONAL
COOPERATION**

**Forum of Ukrainian Research
Diaspora,**

organized to mark the 100th anniversary
of the National Academy of Sciences of Ukraine



MINISTRY
OF EDUCATION AND SCIENCE
OF UKRAINE



KYIV, 20-22 October 2018

Venue: Great conference hall of the NAS of Ukraine, 55 Volodymyrska Street

Organizers & Supporters:

- ❖ National Academy of Sciences of Ukraine (NASU)
- ❖ Ministry of Education and Science of Ukraine (MESU)
- ❖ Minor Academy of Sciences of Ukraine (MASU)
- ❖ The Ukrainian International Committee of Science & Culture of the NASU
- ❖ The German-Ukrainian Academic Society, Germany
- ❖ Baden-Württemberg International GmbH, Germany
- ❖ EU-project 'Strengthening Research and Innovation Links towards Ukraine' (RILINKS2UA)
- ❖ Embassy of France in Ukraine
- ❖ Humboldt Club Ukraine
- ❖ Kyiv Academic University (KAU)
- ❖ The Young Scientists' Council of the NASU
- ❖ NGO "Women in Science", Ukraine

Media partners:

- ❖ Global Ukraine Foundation
- ❖ Up to Future



Organizing Committee:

- Acad. Yaroslav Yatskiv, NASU/ The Ukrainian International Committee of Science & Culture at the NASU
- Dr. Dmytro Cheberkus, MESU
- Prof. Olga Garaschuk, University of Tübingen, Germany/ The German-Ukrainian Academic Society
- Dr. Oksana Seumenicht, The German-Ukrainian Academic Society/ MDC, Berlin, Germany
- Acad. Stanislav Dovgyy, MASU
- Dr. habil. Oleksandra Antoniouk, Institute of Mathematics of the NASU/ KAU/ Humboldt Club Ukraine
- Prof. Vira Troyan, Non-governmental Organization "Women in Science", Ukraine
- Dr. Oleksandr Skorokhod, The Young Scientists' Council of the NASU





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Saturday, 20 October

8:30 Registration

9:00 Welcome remarks

- **Acad. Yaroslav Yatskiv**, NASU/ The Ukrainian International Committee of Science & Culture at the NASU
- **Prof. Olga Garaschuk**, University of Tübingen, Germany/ The German-Ukrainian Academic Society
- **Prof. Maksym Strikha**, Deputy-Minister, MESU
- **Ms. Anett Schwarz**, German Federal Ministry of Education and Research (BMBF)
- **Honorary Guests**

9:40 – 10:40 KEYNOTE TALKS

9:40 - 10:00 Acad. Valeriy Smoliy, Institute of History of Ukraine, NASU
“100 years of the National Academy of Sciences of Ukraine”

10:00 - 10:20 Acad. Roman Kushnir, Ukrainian branch of the Shevchenko Scientific Society/ Pidstryhach Institute for Applied Problems of Mechanics & Mathematics, NASU

“Shevchenko Scientific Society: 145 years devoted to the development of science and education in Ukraine”

10:20 - 10:40 Dr. Mykola Zheleznyak, Institute of Encyclopaedic Research, NASU

“The Ukrainian Scientific Diaspora in the Encyclopedia of Modern Ukraine”

10:40 – 11:00

Coffee-break



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PART I: INTERNATIONAL COOPERATION AND RELEVANT FUNDING

11:00 – 12:00 PLENARY SESSION 1: International Academic Cooperation Highlights

Chair: Dr. Igor Reshetnyak, EPFL, Switzerland/ Member of the Board of the Shevchenko Scientific Society in Europe

11:00 - 11:20 Prof. Alexey Ladokhin, The University of Kansas Medical Center, USA

“Ukraine + USA: Examples of Collaboration in Spectroscopic and Computational Refinement of Membrane Proteins”

11:20 - 11:40 Mr. Sylvain Rigolet, Embassy of France in Ukraine
“Overview of Franco-Ukrainian research cooperation”

11:40 - 11:55 Mrs. Olena Skalińska, Mitacs Globalink Research Internships, Shevchenko Foundation

“Canada's Mitacs Globalink Research Internship Program for Ukraine”

11:55 - 12:00 Dr. Violeta Moskalu, Global Ukraine Foundation, France

“From Tchernivtsi - Metz University Partnership to the Global Ukrainians Network: a 20 years international cooperation experience success story”.

12:00 – 13:00

Networking lunch



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13:00 – 15:10 PLENARY SESSION 2: Ukrainian-German Academic Cooperation Highlights

A dedicated session marking the 25th anniversary of the S&T Cooperation Agreement between Ukraine and Germany

Introductory remarks and Chair: Dr. Gisela Zimmermann, German Academic Exchange Service (DAAD) Information center, Kyiv

13:10 - 13:30 Ms. Anett Schwarz, Unit 212 - Cooperation with Eastern Partnership countries, Russia and Central Asia, German Federal Ministry of Education and Research (BMBF)

“25 Years of German-Ukrainian Cooperation in Science and Technology”

13:30 - 13:50 Ms. Mechthild Köhler, Department for International Cooperation, German Research Foundation (DFG)

“German Research Foundation: research funding and institutional cooperation with Ukraine”

13:50 - 14:10 Ms. Julia Simon, Baden-Wuerttemberg International, Germany
„The Research Landscape in Baden-Württemberg: Perspectives for research collaboration“

14:10 - 14:40 Prof. Bernd Heinrich, Eberhard Karls Universität Tuebingen, Germany

“German-Ukrainian cooperation in legal studies”

14:40 - 15:10 Prof. Mikhail Belogolovskii, G.V. Kurdyumov Institute for Metal Physics, Kyiv, NASU

“Twenty years of scientific collaboration with Friedrich-Schiller University Jena in superconductivity research: evolution and some results”

15:10 – 15:30

Coffee-break



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15:30 – 17:10 PLENARY SESSION 3: “H2020 promotion: current outcomes and prospects for Ukraine”

15:30 - 15:50 Prof. Maksym Strikha, Deputy-Minister, MESU: "Ukraine's participation in the Horizon 2020"

15:50 - 16:10 Dr. Stefan Weiers, Deputy Head of Unit 5 "Spreading excellence and widening participation", Directorate General "Research and Innovation", European Commission (tbc)

16:10 - 16:25 Dr. Maryna Gorokhovatska, NASU: "Coordinated H2020 projects with the participation of the NASU and the possibilities they offer"

16:25 - 16:40 Dr. Mykola Dzubinsky, G4 Fission Unit, Directorate G Energy, Directorate General for Research and Innovation, European Commission: "Presenting EURATOM programme: H2020 and beyond"

16:40 - 16:55 Dr. Dmytro Kamenskyi, High Field Magnet Laboratory, Radboud University, The Netherlands: "European user facilities: how to efficiently access and use them?"

16:55 - 17:10 Dr. Yegor Domanov, L'OREAL Research & Innovation, France: "Horizon 2020 proposal selection – overview of the process and advice from an expert evaluator"

17:15 – 18:40 ROUND TABLE: How can we support ‘brain circulation’?

Introductory remarks and Moderator: **Dr. Oksana Seumenicht**, German-Ukrainian Academic Society/ MDC, Berlin, Germany

Speakers of the previous session will be joined by:

Prof. Oleksii Boyarsky, Leiden University, The Netherlands, ERC grant-holder

Dr. Denys Makarov, The Helmholtz-Zentrum Dresden-Rossendorf, Germany, ERC and FET grants-holder

Dr. Yulia Bezvershenko, Deputy-Head of the Council of Young Researchers, NASU

19:00 – 20:00 Networking Reception (On invitation)



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Sunday, 21 October

PART I: INTERNATIONAL COOPERATION AND RELEVANT FUNDING
(continued)

9:30 Networking coffee-break

10:00 – 12:00 PLENARY SESSION 4: Research Highlights

Section I: Exact & Natural Sciences

**Chair: Dr. habil. Oleksandra Antoniouk, Institute of Mathematics of the NASU/ KAU/
Humboldt Club Ukraine**

10:00 - 10:15 Prof. Yuri Genenko, Materials Modelling Group, Department of Materials Sciences, Darmstadt University of Technology, Germany

"Polarization switching kinetics in polycrystalline ferroelectrics"

10:15 - 10:30 Dr. Denys Makarov, The Helmholtz-Zentrum Dresden-Rossendorf, Germany

"Intelligent materials and devices"

10:35 - 10:50 Dr. Viktoriia Paientko, Department of Amorphous and Structurally Ordered Oxides, Chuiko Institute of Surface Chemistry, NASU, Ukraine

"Composite Materials with Immobilized Bioactive Compounds on Inorganic Matrices (clays, nanosilica)"

10:50 - 11:05 Prof. Oleg Davydov, University of Giessen, Germany

"Kernel-based approximation"

11:05 - 11:20 Dr. Mariya Shyshkina, Institute of Information Technologies and Learning Tools of NAEdSU, Ukraine

"The Open Learning and Research Platform Integrating Databases, Robotics and Languages Technologies"

11:20 - 11:35 Dr. Vitalii Makogin, Institute of Stochastics, Ulm University, Germany: "On mean-variance hedging under partial observations and terminal wealth constraints"

11:35 - 11:50 Mrs. Liudmyla Titova, Artificial Intelligence Department, Kharkiv National University of Radio Electronics

"Development of the Collective Awareness Platform"



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Section II: Life Sciences & Medicine

Chair: Acad. Maryna Skok, Palladin Institute of Biochemistry, NASU/ Humboldt Club Ukraine

10:00 - 10:15 Prof. Ihor Huk, Medical University of Vienna, Vienna, Austria

“How medicine is changing our lives - from chemical elements to endothelial cells”

10:15 - 10:30 Prof. Viktor Umansky, DKFZ, Heidelberg, Germany

“New strategies of tumor immunotherapy”

10:35 - 10:50 Dr. Lyubov Ostrovska, StemCiTerra LLC, Baltimore, MD, USA

“State of the Art in Cancer Treatment”

10:50 - 11:05 Dr. Yegor Domanov, Skin Biophysics Group, L'OREAL Research & Innovation, France

“Skin biophysics for cosmetics – research challenges, advances and opportunities”

11:05 - 11:20 Prof. Olga Garaschuk, University of Tuebingen, Germany

“Mental health of the aging society: challenges and cooperation opportunities”

11:20 - 11:35 Dr. Svitlana Kurinna, The University of Manchester, UK

“MicroRNAs in skin Regeneration”

11:35 - 11:50 Prof. Oleg Lavrentovich, Kent State University Kent, Ohio, USA

“Commanding bacterial dynamics by liquid crystals”



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12:00 - 12:15

KEYNOTE TALK

Acad. Stanislav Dovgyy, Minor Academy of Sciences of Ukraine (MASU)
“Minor Academy of Sciences of Ukraine becomes the UNESCO center: fostering the development of the future brains of Ukraine”

12:15 – 14:00 Networking lunch/ Poster session/ Exhibition of the MASU/ Info-tables

PART II: FOSTERING INNOVATION, RESEARCH IN AND WITH INDUSTRY

14:00 – 14:30

KEYNOTE TALK

Acad. Michael Zgurovsky, National Technical University of Ukraine "Igor Sikorsky Kyiv Polytechnic Institute“
“Innovation platform "Sikorsky Challenge" as a model of the future high-tech platform in Ukraine”

14:30 – 15:30

PLENARY SESSION 5: R&D Highlights

Prof. Igor Komarov, Institute of High Technology, Taras Shevchenko National University of Kyiv, Ukraine/ Enamine Ltd., “Antimicrobial Peptides: from Basic Research to Market”

Dr Anatolii Gyrych, Nomad Bioscience GmbH, Germany

“Research and Development in Plant Biotechnology: Nomad Bioscience experience”

Dr Oleks Gouscha, LUNA Optoelectronics, USA (tbc)

“Recent advances in 2D nano-optoelectronics”

15:30 – 17:00

ROUND TABLE: “Supporting Innovation in Ukraine”,

Introductory remarks and Chair: Dr Olga Birke, EU NCP

Dr. Daria Chaika, MESU

Prof. Igor Egorov, National Committee for Science and Technology Development of Ukraine, Institute of Economics, NASU

Mr. Vitaliy Goncharuk, CEO and founder of Augmented Pixels, VC, founder of the Eastern European Computer Vision Conference, Palo Alto, California, USA

Mrs. Olga Krupska, “National Development and Innovation” Foundation, Kyiv

19:00 Visit to Kyiv Opera House (self-funded, separate registration will be required)



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Monday, 22 October

PART III: STRUCTURAL REFORMS OF THE UKRAINIAN SCIENCE SYSTEM

9:00 – 11:00 PLENARY SESSION 6: “Building the Bridge As You Walk On It”

Chair: Prof. Maksym Strikha, Deputy-Minister, MESU

09:00 - 09:20 Prof. Maksym Strikha, Deputy-Minister, MESU
“Structural Reforms in the R&D Area of Ukraine”

09:20 - 09:40 Prof. Oleksiy Kolezhuk, National Committee on Science and Technology Development of Ukraine/ Institute of High Technologies, Taras Shevchenko National University of Kyiv

“National Council on Science and Technology of Ukraine: 1st Year Mission Summary”

09:40 -10:00 Ass. Acad. Alla Yemets, National Committee on Science and Technology Development of Ukraine

“Establishment of the National Research Foundation of Ukraine”

10:00 - 10:20 Prof. Igor Egorov, National Committee for Science and Technology Development of Ukraine, Institute of Economics, NASU

“Evaluation of the research institutes of the NAS of Ukraine: What has already been achieved and what challenges are still to be met?”

10:20 - 10:35 Prof. Olga Garaschuk, Eberhard Karls University of Tübingen, Germany/ President of the German-Ukrainian Academic Society

“Introduction to the UKRAINET Project database: Resource for collaboration and experts’ database”

10:35 - 11:00 Questions and Answers

11:00 – 11:15

Coffee-break



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11:15 – 13:00 ROUND-TABLE on the establishment of expert committee(s) to support reforming science in Ukraine

Chairs: Prof. Alexey Ladokhin, University of Kansas Medical Center, USA and Prof. Olga Garaschuk, University of Tuebingen, Germany/ German-Ukrainian Academic Society

- Prof. Maksym Strikha, Deputy-Minister, MESU
- Prof. Oleksiy Kolezhuk, National Council on Science and Technology of Ukraine/Institute of High Technologies, Taras Shevchenko National University of Kyiv
- Ass. Acad. Alla Yemets, National Committee on Science and Technology Development of Ukraine/ Institute of Food Biotechnology and Genomics NASU
- Prof. Igor Egorov, National Committee for Science and Technology Development of Ukraine/ Institute of Economics, NASU
- Dr. Dmytro Cheberkus, MESU

13:00 – 13:15 Closing Remarks

End of the Forum



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LIST OF POSTER PRESENTATIONS

Sunday, 21 October

Venue: Great conference hall of the NAS of Ukraine, Volodymyrska Street, 55

12:15 – 14:00 Networking lunch/ Poster session/ Exhibition of the MASU/ Info-tables

Tamara Beresh, University of Vienna, Austria: “Growth oriented development and its impact on socio-economic in transition economy context”

Oleksandra Bienert, independent researcher, Berlin, Germany: “Frauenbiografien: Lebenswelten Schriftstellerinnen, Künstlerinnen und weibliche Intellektuelle aus der Ukraine im Berlin der Zwischenkriegszeit/ Women biographies: lives of writers, artists and female intellectuals from Ukraine in Berlin of the interwar period”

Ms. Iryna Lysenko, Herder-Institute for Historical Research of East Central Europe, Marburg, Germany “Historical politics before and during the Maidan Revolution 2013/14”

Dr. Igor Reshetnyak, Chaire de Simulation à l’Echelle Atomique (CSEA)/ Ecole Polytechnique Fédérale de Lausanne (EPFL), Switzerland

“Electronic structure and excitonic effects in the vandates”

Dr. Kyrylo Snizhko, Weizmann Institute of Science, Rehovot, Israel: “Universal quantum noise in adiabatic pumping”

Dr. Yulia Sytnikova, Brigham & Women's Hospital/Harvard Medical School/ Broad Institute, Cambridge, MA, USA: “Chromatin organization: experimental and computational approaches”

Ms. Margaryta Tevosian, Institute of Physiological Chemistry/ University Medical Center of the Johannes Gutenberg University Mainz, Germany: “Role of the endocannabinoid anandamide signaling in neurons activated during chronic social defeat in mice”

Dr. Natalia Voievoda, CNRS, Paris, France: “InRoad: Towards more coherent research infrastructure landscape in Europe”

Dr. Olena Zhitlukhina, O.O.Galkin Donetsk Institute of Physics and Engineering, NAS of Ukraine (temporarily relocated to Kyiv): “Controllable Charge and Spin Flow in Superconducting Quantum Networks”



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Information tables:

- The German-Ukrainian Academic Society, Germany
- Baden-Württemberg International GmbH, Germany
- DAAD
- Humboldt Club Ukraine
- NGO “ Women in Science”, Ukraine
- The Ukrainian Biochemical Journal
- Journal “Biotechnologia Acta”

SATELLITE EVENTS

14-19 of October 2018

KAU Data Science School

<https://sites.google.com/view/kaudatascience/home>

Meet Up “How to become Data Scientist?”

<https://www.eventbrite.com/e/meetup-how-to-become-a-data-scientist-essential-competencies-skills-and-what-employers-are-looking-tickets-51103215092?aff=eac2>

19 of October 2018

Conference of the Alumni-Network Ukraine-Germany

<https://www.uni-wuerzburg.de/alumni/internationales/alumni-netzwerk-ukraine-deutschland/>