

KEY TAKEAWAYS

- Bio2Bio working group releases Position Statement on conservation of biodiversity
- GYA Science Leadership Programme spans the globe
- National young academies issue statement in support of UN Sustainable Development Goals
- Global State of Young Scientists Africa project going strong
- Annual General Meeting to take place 7-11 May in Pattaya, Thailand

ACTIONS YOU CAN TAKE

- Help expand the SLP into Latin America, and find suitable partners in the region. For suggestions, please [email](#) Beate Wagner.
- Disseminate the [GloSYS Africa Survey](#) link through your own networks of African researchers.
- Collaboration is welcome for the 2019 AGM. For enquiries, please [email](#) Koen Vermeir.
- Download Connections 2018 [here](#).
- Download the 2017 Yearly Report [here](#).

This first-ever bulletin provides a quarterly overview and highlights of Global Young Academy (GYA) activities and upcoming events to help identify and strengthen cooperation with our various strategic partners. This bulletin will complement the monthly newsletters available from our website, which provide more comprehensive details. In this issue we share a selection of updates that include capacity-building initiatives through the Science Leadership Programme and national young academies, a mentoring project for at-risk and refugee scholars, and our project investigating the research environment of young scholars (GloSYS Africa).

WORK OF THE GYA

Science Leadership Programme provides outstanding Young Scientists with innovative training.

Optimizing future scientific development will require the interconnectivity and internationalisation of large interdisciplinary teams. The GYA Science Leadership Programmes (SLP) address this need by prioritising training in innovative thinking, managerial and negotiation skills, team leadership and effective communication. The annual Africa Science Leadership Programme (ASLP), an initiative of the University of Pretoria and the GYA initiated in South Africa in 2013, addresses the enormous scope and need for science leadership training on that continent. Funded by the [Robert Bosch Foundation](#), this program has trained 63 ASLP Fellows from 15 African countries. The third ASLP Fellows training program will take place 16-21 March in Pretoria, South Africa.

A second regional SLP was established by the GYA for the [ASEAN region](#) in June 2016, in Thailand, with a second cohort of ASEAN Science Leadership Programme Fellows

trained in Malaysia in September 2017. The GYA is now keen to expand the SLP into Latin America, and is actively seeking partners in the region. For suggestions, please contact [Dr Beate Wagner](#), Managing Director of GYA.

Aiding scholars at risk through the At-Risk and Refugee Membership Initiative.

There is an urgent need to protect and support academic researchers fleeing conflict zones around the world. In their new host countries, these scientists often struggle to gain access to, or acceptance within, the professional networks needed to sustain their careers. This GYA project seeks to enable the re-integration of exceptional, early-career refugee and at-risk scholars into research through a mentorship program developed and led by GYA members. The initiative has two main aims: 1) to use a mentorship model to enable at-risk and refugee researchers to develop the professional skills that are most relevant to their new host countries; and 2) to enable at-risk and refugee

researchers to submit competitive membership applications to the GYA and national young academies. In this work, the GYA actively co-operates with the [World Academy of Sciences](#), [Scholars at Risk](#), [Scholar Rescue Fund](#), and the [Council for At-Risk Academics](#), as well as with the [Philipp Schwartz-Initiative of the Alexander von Humboldt-Stiftung](#), which provides universities and research institutions in Germany with the means to host threatened foreign researchers.

National young academies issue statement supporting UN's Sustainable Development Goals.

In July 2017, the GYA co-organized the Third Worldwide Meeting of Young Academies in Johannesburg, South Africa. This meeting of more than 60 representatives from the GYA and over 35 young academies from all over the world

focused on the question of how both young academies and young scientists can contribute to the achievement of the United Nations' Sustainable Development Goals (SDGs). The [bi-annual meeting's Statement](#) declares that young academies can and should play a central role in conceptualizing, developing and implementing strategies to achieve the SDGs. The Statement also urges policy-makers working on the SDGs, as well as senior academies, to act on their proclamation that 'young people are key drivers of sustainable development', and thereby to seek and utilise advice from young academies.

GLOBAL STATE OF YOUNG SCIENTISTS (GLOSYS) AFRICA PROJECT GOING STRONG

The first GloSYS [report](#), published in 2014, highlighted that today's young researchers face a competitive funding environment, long work hours, and spend a large proportion of their workday on tasks that are not research-related.

A second important conclusion of the initial GloSYS study was that our knowledge of the state of young scientists comes almost entirely from research in North America and Europe. The GYA is now conducting regional studies to help fill this knowledge gap. The first regional study, GloSYS ASEAN, focused on researchers in Thailand, Malaysia, Singapore and Indonesia, and launched its [report](#) in February 2017.

We are seeking strategic partners to attend an implementation strategy [workshop](#) at the Next Einstein Forum Global Gathering in Kigali, Rwanda, 28 March 2018.

A second regional study, GloSYS Africa, is now underway.

The project, funded by the German Federal Ministry of Education and Research (BMBF), is divided into three phases ([see video here](#)). In the first phase, the research team compiles statistical indicator data to provide an overview of the state of young scientists across fourteen focal countries in Africa (nearing

completion). The second phase involves the dissemination of a [survey](#) to early career researchers throughout Africa and the African diaspora to gain insights into the perceptions of the research environment, as well as detailed mobility and career histories (underway). In the third phase, the research team conducts semi-structured interviews with young scientists and scholars to obtain more

in-depth qualitative data that further contextualizes findings from the previous phases (this phase is set to begin in March 2018). The anticipated release date of the full GloSYS Africa report is December 2018.

Readers can help by disseminating the [GloSYS Africa Survey link](#) through your own networks of African researchers.

GloSYS Africa project focal countries



LOOKING FORWARD

Annual General Meeting in Pattaya, Thailand, 7-11 May. Despite modern communication technologies, there is still no substitute for face-to-face interactions. The GYA's annual International Conference of Young Scientists and General Meeting (AGM) brings together its members, policy makers and senior representatives of the international science management and policy community who contribute their expertise, offer their advice, and enter into a dialogue with GYA members. The 2018 Conference will focus on the theme: 'Forever Young? Sustainable and healthy longevity through science and technology', and will take place in Pattaya, Thailand. Featured speakers include Nobel Prize Winner Harald zur Hausen, and special guests will include Princess Sumaya of Jordan. All GYA partners are welcome to attend. Please see the [event site](#) for more information.

Funds and partners are still being sought for capacity-building initiatives during the AGM, particularly for the new members' Science Leadership Programme.

Second Women in Science without Borders Conference, 21-23 March.

The Second Women in Science without Borders Conference will be held in Johannesburg, South Africa, under the title of WISWB-Indaba-'Resilience in Diversity'. A common focus cutting across this conference will be the role that women play in influencing positive outcomes within the science, technology, engineering and mathematics (STEM) ecosystem as thought leaders and mentors, researchers, educators and policy makers. The conference will encourage participation from both male and female scientists in all fields of STEM and gender issues, where presenters will share their cutting-edge research. Members of the GYA Women in Science Working Group will attend. Further information is available [here](#).

Global Individual Responsibility – The Role of the Citizen in Refugee Integration, 25-27 March.

The GYA Working Group Global Migration and Human Rights will hold an International Conference titled 'Global Individual Responsibility – The Role of the Citizen in Refugee Integration' at the Munich Center for Ethics, University of Munich. The conference is funded by the [Fritz Thyssen Foundation](#), and will open with a public keynote lecture by Professor Alison Philipps, who holds a UNESCO Chair for Refugee Integration at the University of Glasgow.

The Next Einstein Forum Global Gathering 26-28 March.

The Next Einstein Forum Global Gathering connects science, society and policy in Africa and the rest of the world – with the goal to leverage science for human development globally. The GYA, in partnership with the [Canadian Institute for Advanced Research](#), the [African Institute for Mathematical Sciences](#), and the [African Academy of Sciences](#), are co-organising a Women in Science leadership workshop [pre-event](#) on 22-24 March to support the development of the next generation of female researchers. The GloSYS Africa team will also present its initial study results in a [side event](#) on 28 March. In addition, GYA members are contributing to development of the NEF Science Leadership Programme [pre-event](#) on 25 March. The Next Einstein Forum is an initiative of the African Institute for Mathematical Sciences (AIMS) in partnership with the [Robert Bosch Stiftung](#). The Global Gathering 2018 will be held in Kigali, Rwanda under the patronage of H.E. Paul Kagame, President of the Republic of Rwanda.

Photo: GYA Office, AGM 2017

GYA WORKING GROUPS IN ACTION

DIY Synthetic Biology Working Group holds hackathon in Hanover, Germany.

Synthetic Biology relates to human-made biological mechanisms, artificial biochemical and cellular pathways created using natural and synthetic biomolecules and their component materials. These technologies have both benefits and dangers associated with them. To address the dangers, members of the GYA Working Group [DIY Synthetic Biology](#) conceived an interactive mini-hackathon focused on approaches to predict and address security risks associated with technological progress in the field of genome editing. With the support of the [Volkswagen Foundation](#), this event was held before their international workshop '[Assessing the Security Implications of Genome Editing Technology](#)' in Hanover, Germany from 12-13 October. The hackathon was a first-of-its-kind pilot event. In an informal game-like setting, 25 participants brainstormed and exchanged ideas about national and international policy solutions to potential future security challenges posed by genome editing applications.

Biodiversity for Survival via Biomedicine Working Group releases Statement.

A significant proportion of the world's estimated ten million species of fungi, plants, and animals are at risk of extinction. This poses a number of risks, chief among them being the loss of potential ingredients for use in pharmaceutical cures for human diseases. To help address this problem, a group of young scientists has formed the Working Group Biodiversity for Survival via Biomedicine ([Bio2Bio](#)), a global, cross-disciplinary initiative to support scientists working to prevent the loss of biodiversity. As part of these efforts, in January 2018 the GYA issued a Position Statement titled '[Global Young Academy Position Statement on Conservation of Biodiversity: Protecting Molecular Diversity and Biomedical](#)

[Discoveries](#)', which outlines key challenges and possible avenues for solving them. The Statement was sent to various national academies of science and universities around the world, as well as to partners such as the World Health Organization, the International Council for Science, and the United Nations Environment Programme. In addition, output from group members recently appeared in the Journal of Global Health, which published a viewpoint article titled '[Biodiversity, drug discovery, and the future of global health: Introducing the biodiversity to biomedicine consortium, a call to action](#)'.

Fundamental Research Working Group report published by GYA.

A report titled '[Restoring Canada's Competitiveness in Fundamental Research: The View from the Bench](#)' was published by the GYA in June 2017. The report, produced by the GYA's [Importance of Fundamental Research Working Group](#), revealed that Canada's support for fundamental research – the basic building block of scientific innovation – has crumbled over the past decade, leaving many accomplished researchers completely unfunded. Collecting data from over 1,300 members of the Canadian research community, it reports that the proportion of Canadian researchers who conducted only fundamental research plummeted from 24% to 1.6% between 2006-2010 and 2011-2015, respectively. Moreover, those reporting that their research programmes are dominated by fundamental research declined from 75% to 58%. Changes to available research funding were the most commonly reported reason for these shifts.

The [working group](#) is collaborating on a similar report that addresses the importance of fundamental research worldwide.

ABOUT THE GYA

The GYA was founded with the vision to be the voice of young scientists around the world. By empowering early- to mid-career researchers to lead international, interdisciplinary, and intergenerational dialogues, the GYA mobilises talent from six continents for capacity-building, mentoring, engaging in science policy and improving the existing research environment. Members are chosen for their demonstrated excellence in scientific achievement and their commitment to service. Currently, there are 200 GYA members and 171 alumni from 70 countries. The head Office is hosted at the German National Academy of Sciences, [Leopoldina](#).

CONTACT INFORMATION

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