International Webinar Series on Open Science and the Decolonization of Knowledge

Arab Region edition

Wednesday, 28 October 2020
15:00 – 17:00 Cairo time (GMT+2)

Summary Report

The **Arab region edition** of the International Webinar Series on **Open Science and the Decolonization of Knowledge** was held online on Wednesday, 28 October 2020 at 15:00 Cairo time (GMT+2). It was organized jointly by UNESCO (Regional Bureau for Sciences in the Arab States – Cairo and Cluster Office for Maghreb – Rabat), the Canadian Commission for UNESCO and the UNESCO Chair in Community-Based Research and Social Responsibility in Higher Education. English-Arabic simultaneous interpretation was provided. Some photos are provided in the Annex.

The webinar series supports the UNESCO consultations on the development of a Recommendation on Open Science, an international normative document to be adopted by the UNESCO General Conference in November of 2021. The webinar series is based on a brief entitled "Open Science Beyond Open Access: For and With Communities A Step Towards the Decolonization of Knowledge".

1- Agenda

Cairo time (GMT+2)

15:00 – 15:10	**Opening remarks** • Representing the UNESCO Regional Bureau for Sciences in the Arab States and the UNESCO Maghreb Office: Dr. Ghaith Fariz (UNESCO Regional Bureau for Sciences in the Arab States – Cairo Office) • UNESCO Co-Chair in Community-Based Research and Social Responsibility in Higher Education: Dr. Budd Hall (University of Victoria - Canada)
15:10 – 15:20	**Background presentation of the brief on "Open Science Beyond Open Access: For and With Communities A Step Towards the Decolonization of Knowledge"** • Dr. Budd Hall (University of Victoria - Canada)

15:20 – 16:00	**Critique of the brief and Arab regional reflections** • Dr. Ghaith Fariz (UNESCO Regional Bureau for Sciences in the Arab States – Cairo Office) • Dr. Essam Khamis (UNESCO Open Science Advisory Committee) • Dr. Najat Saliba (American University of Beirut – Lebanon) • Dr. Hanae Lrhoul (School of Information Science - Morocco)
16:00 – 16:50	**General discussion** • Moderated by Ms. Jana El Baba (UNESCO Regional Bureau for Sciences in the Arab States – Cairo Office)
16:50 – 17:00	**Closing and call for action**

2- Participants

Participation in the event was open. Invitations were sent to the Arab Countries' National Commissions of UNESCO and disseminated among UNESCO's network of stakeholders concerned with science. More than 150 persons registered to participate, whereas effective attendance was around 90 participants from several Arab countries (including some resident abroad).

3- Opening remarks

In his opening remarks, Dr. Ghaith Fariz, Director of the Regional Bureau for Sciences in the Arab States thanked the co-organizers for their initiative to hold this webinar series in support of the UNESCO Recommendation on Open Science, and for preparing a very valuable paper. He indicated that the topic under discussion in the webinar has been and continues to be at the heart of UNESCO's efforts in the area of science. Since 1974, the Recommendation on the Status of Scientific Researchers – which has been revised in 2017 to become the Recommendation on Science and Scientific Researchers – has stressed the responsibility of science in building more humane, just and inclusive societies.

The UNESCO Open Science Recommendation, the first draft of which was recently issued and is currently under consultation with Member States, reaffirms the need for the production, transmission and use of scientific knowledge to be more just, transparent and democratic. The recommendation defines open science as a complex concept that includes eight dimensions, including: open access, open data, open engagement of societal actors, and openness to diversity of knowledge. The COVID-19 pandemic gave further impetus to this approach. UNESCO Cairo Office stands ready to provide all possible support to advance open science in the Arab region.

Professor Budd Hall, UNESCO Co-Chair in Community-Based Research and Social Responsibility in Higher Education at the University of Victoria, and on behalf of the Canadian Commission for UNESCO, thanked UNESCO Cairo and Rabat Offices for facilitating this Arab regional edition of the webinar series. The Chair is documenting the discussions taking

place in the various webinars as a contribution to the refining of the text of the Recommendation on Open Science ahead of its adoption by the UNESCO General Conference in November 2021.

4- Presentation of the brief on "Open Science Beyond Open Access: For and With Communities A Step Towards the Decolonization of Knowledge"

- While many countries and scholars understand "Open Science" to mean the same as "open access" to publications and data, Open Science can and should go further.
- Analyzing all the possibilities of "openness" during the COVID-19 pandemic, science could also open itself to society to be more relevant—particularly to civil society organizations and social movements.
- Greater openness to knowledges and systems of thought that come from Indigenous Peoples, minorities, and cultures from the Global South is needed. These knowledges are often ignored or excluded from Eurocentric science even though they could enrich scientific conversations across boundaries.
- A number of considerations are proposed for each form of openness to bring about a fair, decolonial Open Science—for and with communities, and beyond open access.

5- Main points made by Arab region speakers

The following points summarize some of the reflections made by the speakers in the event:

- Open science and the decolonization of knowledge are feasible and can result in tremendous benefits for the Arab region and the world; their achievement, however, requires several enablers, notably the protection of freedoms including freedom of thought.
- There is an on-going debate as to whether there is one global knowledge with different epistemologies and methodologies for arriving to this knowledge, or whether there are multiple knowledges.
- As long as science serves society, scientists should not be concerned about the interference of society in science.
- Additional avenues for opening science to those listed in the webinar brief include open funding, open access to policy-makers, freedom of publication, etc.
- Barriers to accessing knowledge may go beyond the financial cost of this access, in the sense that knowledge is monopolized and access to it is prohibited in order to maintain power.
- Digital technologies can play an enabling role in breaking science/ knowledge monopolies. For example, advancement in technology has empowered individual decisions; also artificial intelligence, can play an enabling role in breaking the language

barriers. On the other hand, and if not ethically managed, digital technologies may reproduce existing inequalities.

- There is not necessarily a contradiction between the concepts of knowledge economy and social justice. The problem is not in the knowledge economy, but in the purely capitalist economic dimension that has not always paid attention to justice. The knowledge economy can be restructured to be at the heart of an inclusive knowledge society.
- Open science can and should play a role in advancing social justice.
- Racism, discrimination, intolerance and injustice that are observed in the field of science (including against women in some countries) reflect, and cannot be dissociated from, the same manifestations in all other sectors and aspects of our life. In other words, the problem faced in science is only one manifestation of a deep-rooted ailment that can only be addressed through a whole of society approach to embrace differences.
- There is certainly an occidental knowledge hegemony: The visibility of science depends on the hegemony of Anglo-Saxon editors, politics and technological advancement.
- Scientific communities in some Arab countries face a dual problem of: a) weak access to scientific information; and b) low scientific production. Scientists are pressured to publish in prestigious journals, and often neglect local issues in their research. For example in Morocco, half of the national health priorities are covered by less than 1% of the scientific production.
- There are several successful initiatives in the region that can be learning examples and built upon. Examples mentioned:
    - Moroccan association for scientific information development;
    - DREAM (Digital resources and electronic open access library of Maghreb);
    - science shops;
    - Massive Open Online Course (MOOC) « Become a researcher »;
    - Citizen science projects in Lebanon in the areas of water pollution and waste reduction/management;
    - Environment Academy;
    - Khaddit Beirut (people-driven initiative to rebuild Beirut areas affected by the August 2020 port blast);
    - Academy of Scientific Research & Technology in Egypt;
    - Egyptian Knowledge Bank.
- Recommendations for moving forward:
    - *Create an effective platform for promoting open science in the Arab Region* (e.g. the Arab Science Podium proposed by UNESCO);
    - *Develop national research systems* with research priorities, but also align with regional STI strategy;
    - *Transition from "Lab to Fab":* establish and manage incubators and science and technology parks to bridge the gap between academic and applied research.

- *Remove research boundaries and encourage Transdisciplinary Research*, i.e. collaboration in which exchanging information, altering discipline-specific approaches, sharing resources and integrating disciplines achieves a common scientific goal;
- *Advance knowledge for all*: Create open repositories to enhance local science production; Inform researchers about databases that include many languages; Encourage studies about scientific output of the south region (bibliometric indicators and science map); Establish science shops (social responsibility of universities); Develop university libraries; etc.
- *Support local journals and local languages*: Create national databases of journals; National initiatives to index local journals; Enhance the quality of national journals; Create translation services in the English department to help Ph.D. students; etc.
- *Further the understanding of open science, and incentivize scientists:* Organize training sessions, conferences, MOOCs, etc.; Share the success stories of open science practices and experiences; Include Open Science practices in the evaluation of researchers' performance and funding proposals.
- *Leverage south-south and north-south cooperation*, including for facilitating access to research data, enhancing international collaboration and international research projects for specific actions, etc.
- *Rethink the university model*: knowledge is not only for and by the rich and educated.
- *Support community engagement in science to develop science-based solutions with the people for the people*: Collectively use a trans-disciplinary approach to create an indigenous knowledge platform in Arabic inclusive to all; Compete over ideas and solutions as a nation rather than over scarce resources and partisan interests; Translate scientific terms not only to Arabic but to colloquial dialects so that all can participate in improving their lives; Innovate the technology to develop tools and gadgets readily available and easily used by people so they can make informed decisions about the challenges they are facing; ensure access to information as a mechanism for good governance and accountable policy-making.

6- Key points made by participants

During the open discussion, participants made the following points:

- *Feasibility of open science*: Participants welcomed open science as a matter of principle and acknowledged the potential societal benefits that could be achieved from providing wide access to knowledge and the fruits of science, especially in terms of reducing disparities between countries and advancing human development. Nevertheless, some participants considered this idealistic, noting that knowledge production continues to be shaped by power relations and geared towards revenue generation. Competition in science, and the availability of incentives for researchers, are matters that cannot be

discounted. It is clear that open science can become a reality only through a shift in mindset from an individualistic to a whole-of-society approach where science makes a difference in the lives of people and the benefits of science accrue to all.

- *Intellectual property*: There was a call to regulate intellectual property systems in order to avoid depriving scientists from benefiting from the fruits of their research while preventing exploitation. Participatory and collaborative research needs to be conducted in such a way as to protect the rights of contributors, so that science is built on justice and achieves justice. There were diverging views as to whether open science and intellectual property are mutually exclusive. Open science seeks primarily to put knowledge in the hands of those who need it, and as such may contradict with intellectual property concepts. The use of Creative Commons licences was suggested to share open resources, as these licenses enable the author to share, distribute, adapt their work in whichever format (article, video, image…). Some participants called for removing intellectual property barriers between the Arab countries to advance a common regional scientific foundation.
- *Traditional knowledges*: No knowledges should be excluded, including traditional knowledges; however when used, need to recognize the limitations given that such knowledges have not been arrived at using scientific methods.
- *Translation and the language barrier*: There were diverging views as to what should be translated and by whom. On the one hand there is a big need to translate and disseminate research in order to inform policy and the community at large. However, the rate of production of knowledge is so fast that it might be an impossible task. Ideally, scientists are best placed to translate their works, but again here is it practical or even possible to translate the enormous bulk of scientific papers that appears everyday. Some participants welcomed the establishment of funded centres of translations in Arab universities and to benefit from the translation expertise available in the region.
- *The digital space:* The Arab region is yet to transform from an information society into a knowledge society, noting that the digital divide continues to exclude some Arab countries. The role of the public digital space in the Arab countries is limited because of weak media and information literacies in society. Artificial intelligence offers a great opportunity for expanding Arabic digital content.
- *The role of universities*: Universities in the Arab region are yet to make the shift into 3rd and 4th generation universities where scientific research leads to the creation of added value in the form of entrepreneurial activities. University ranking should not be the top priority, but rather how to benefit from scientific research coming from the university.
- Suggested actions for moving forward:
    - Prepare an Arab perspective on the UNESCO Recommendation on Open Science similar to the one prepared by Canada.
    - Promote the culture of open science among researchers in the Arab countries and examine ways of implementing this concept on the ground.

- Have further discussion on the issue of intellectual property and its place in an open science project. Such a discussion needs to be informed by an in-depth understanding of who is registering IP in the Arab countries and the benefits being achieved in the region.
- Learn from the successful experiences in other countries.

7- Concluding reflections

The global and Arab regional dialogues around open science and the decolonization of science need to continue, both at the philosophical level (open science as a concept and school of life) but also at the practical level (open science in practice). The UNESCO Recommendation on Open Science is an opportunity to widen this discussion and to engage all concerned stakeholders towards implementation.

Annex. Photos