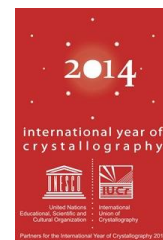




Pan African and South African Summit of the International Year of Crystallography: IYCr2014Africa

Bloemfontein, South Africa, 15-17 October 2014



The President: International Union of Crystallography

The Director of the Science Policy and Capacity Building Division: UNESCO

The President: European Crystallographic Association

The Commissioner of Human Resources, Science and Technology: Africa Union

All African Government Ministries of Science and Technology, Higher Education, Scientific research and Education

In celebration of 2014 as the International Year of Crystallography (IYCr) as declared by the United Nations General Assembly (UNGA; resolution A/RES/66/28), the International Union of Crystallography (IUCr) and UNESCO are leading the year-long activities.

With this document we are pleased to briefly report on the successful 'Pan African Summit of the International Year of Crystallography 2014' (IYCr2014Africa) in Bloemfontein, South Africa, 15-17 October 2014. It provided the opportunity to consider, discuss and review the status of education and research on the broadly defined discipline of Crystallography in countries in the region.

The conference and summit meeting was attended by more than 100 senior researchers, early career researchers, post-doctoral fellows and students representing more than 40 research groups from 32 universities and more than 20 countries, primarily from Africa and Europe, and included decision makers. The delegates were in agreement that there is clearly a sub-optimal level of regional collaboration which requires immediate action. It is our view that supporting the broad discipline of Crystallography will significantly contribute to promoting science in general.

We therefore request through this letter that the IUCr and UNESCO, supported by the European Crystallographic Association (ECA), but also in particular governments of African Countries and via the African Union and the International Council for Scientific Unions (ICSU), all initiate and support further actions to promote regional scientific collaboration. These include, but are not limited to, the following:

- pro-actively continue with programmes to ensure that the legacy of the International Year of Crystallography and particularly the promotion of science is preserved;
- over time provide basic diffraction equipment for crystallographers in all countries in the region to allow research activity in Crystallography and balanced partnership collaboration across Africa and beyond;
- facilitate the establishment of National Committees of Crystallography in African Countries and support the activities of the existing ones;
- introduce a scientific visa to ensure mobility of researchers between African nations. Such a visa would allow for the exchange and collaboration between African countries and the sharing of scientific resources and expertise, to address common developmental targets, for the benefit of all.

This scientific visa should be free of charge, be valid for at least a year, and should be issued quickly once certified by appropriate higher education and research bodies;

- support training workshops;
- encourage the mobility of researchers within the region;
- promote joint research projects;
- leverage national bodies, institutions and international funding agencies for financial support;
- facilitate regional conferences on the subject of Crystallography and its applications in Africa;
- assist in the promotion of Crystallography and science in education programmes;
- provide the very poor countries with minimal infra structure and materials for research such as powerful computers for data analyses and servers;
- assist in creating a database, listing African crystallographers;
- establish a public awareness and engagement programme that will create fact-based understanding of Crystallography through awareness, dialogue and education in the region.

We further request that the IUCr and UNESCO facilitate the establishment of an African IYCr Cooperation Fund. As a community, we commit to engaging our local academies, funding agencies and/or governments to provide annual contributions commensurate with each country's economic status. The aim is to raise 80 000 to 100 000 Euro per annum for this fund. We request the IUCr to commit to seed-funding of US\$ 20 000 per annum for a three-year period. We further request the IUCr to manage these funds, or any local institution (such as AfCA, once established) nominated by the IUCr.

The funds will support actions such as:

- increasing collaboration and cooperation among scientists in Africa;
- providing seed money for up to two projects per annum initially, involving a minimum of 2 countries in the region, of which at least one should be well established in Crystallography;
- funding for short term visits of up to 3 months for early career researchers;
- supporting training workshops at established centres of Crystallography or at emerging centres in the region;
- enabling the sharing of facilities within the region.

We envisage the formation of an African Crystallographic Association (AfCA) to support and expand upon the actions above. A steering committee for this has been established at IYCr2014Africa in Bloemfontein.

These actions will enable Crystallography to be used in the promotion of science in the region and reiterate the need for immediate and well defined action.

Signed by those present,

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Serah Kimani	Postdoctoral fellow	University of Cape Town	SA
Phello Hlo	Msc student	UFS	SA
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