2015
April
Issue 60

EURAXESS LINKS CHINA

Dear readers,

Welcome to the April issue of our Newsletter, which is already in its 60th edition.

This month in our EU Insight, we focus on **higher education in Europe, more specifically, how to increase access.** You can read other interesting policy developments and updates from the EU (such as the signature of an agreement associating Ukraine to Horizon 2020) in the EU news. New updates from member states and associated countries follow.

In this month's interview, we have spoken to **Prof Dale Sanders, Director of the John Innes Centre,** leading institute for research in plant and microbial sciences in the UK. He has shared with us some of his thoughts on Sino-European research and mobility through the focus of the **JIC-CAS newly established joint research institute, the Centre of Excellence for Plant and Microbial Sciences (CEPAMS).**

We would like to sincerely invite all Wuhan-based researchers to the opening of the **2015 Research and Innovation Tour: Where Europe and China Connect**. Under the **umbrella of the 40th anniversary of EU-China relations**, the series of "R&I Tour" events will provide **a unique set of lectures and presentations promoting various European research and innovation programmes.** Attendees of the events will be also given opportunities to exchange views **face-to-face with the representatives of the EU Delegation, EU member states, and also EURAXESS**. The series of events kicks off at the Wuhan University of Technology on 18th May. Altogether, the "R&I Tour" will visit 16 cities throughout the whole year, so it is very likely an event will come close to many of you! We will keep you informed about the full schedule.

You will also find new fellowships and funding opportunities, jobs, invitations to events, as well as our regular press review.

Best regards

EURAXESS Links China

This newsletter is for you! Via china@euraxess.net, you can send us any **comments** on this newsletter, **contributions** or **suggestions** you would like to make, or let us know if you wish to unsubscribe.

To become a **member** of EURAXESS, you can **sign up** here, or follow us on LinkedIn and Facebook.

1 EU Insight – Increasing Access to Higher Education in Europe

Simply put, more must be done to increase access to higher education in the European Union. This statement succintly summarises the results of a recently published report by the European Commission—*Modernisation of Higher Education in Europe: Access, retention and employability 2014*—the second in a series focused on higher education in Europe. Why this is so has much to do with the role that knowledge, and subsequently education, plays in fulfiling the long-term developmental objectives the European Union has set for itself.

The report

Modernisation of Higher Education in Europe: Access, retention and employability 2014 is based on a study conducted by the Eurydice Network, which looked at 36 different education systems within the Europe (including all 28 EU Member States). The aim of the study was to evaluate the extent to which the European Commission's modernisation agenda, which "supports higher education systems in Europe in responding to the needs of our increasingly knowledge-based economy and societies", is being implemented across Europe. The full report plus report brief can be downloaded free of charge at the Eurydice website.

Why access to higher education is important

According to the European Commission, "knowledge [is] at the heart of the Union's efforts for achieving smart, sustainable and inclusive growth…and higher education in particular and its links with research and innovation, plays a crucial role in individual and societal development, and in providing the highly skilled human capital and the articulate citizens Europe needs to create jobs, economic growth and prosperity". Yet even with this lofty goal in mind, the majority of governments within the EU have so far failed to institute proper measures to support access to higher education.

What is behind this outcome?

The report names three distinct factors—an overly narrow focus on quantification, insufficient retainment and transition to labour market—as contributing to the slow pace widening participation in higher education in the European Union has taken so far.

The first of these factors concerns governments' placing too much emphasis on just increasing numbers, a practice which unfortunately limits access to many social groups and contributes to a lack of diversity. For example, one group not yet addressed by participation widening efforts are young people from disadvantaged families. Additionally, those with disabilities tend not to be included in widening efforts.

The second factor is the lack of sufficient retainment strategies for individuals once they gain access to higher education. Specifically, this refers to the lack of measures to help prevent students from dropping out, in particular those from underserved and underrepresented groups. Currently, not enough support is offered in terms of the mode of study (part vs full-time), timeframe (how long should it take to complete programme/degree), and information and guidance to those most at risk.

The third, and last, factor is employability. Because employability is a complex concept with more than one definition, this also means that more than one approach exists to how it might be measured (i.e. employment-based vs. competence-based). This lack of clarity in turn blurs understanding of the type of training students actually need in order to obtain jobs following completion of their degree programmes; all too often measures and policies (if they exist at all) confuse or conflate employment for the things (skills, previous work experience, mode of study) which actually account for one's ability to be employed.

However, beyond these factors, perhaps the most crucial reason underlying the problems associated with the widening of participation in higher education is a general lack of *systematic* monitoring processes. According to the report, all EU countries plus the eight additional European countries included in the study do have some type of policy measure in place to support higher education. The problem, unfortunately, is that at the current moment such measures are uneven and "insufficiently developed to provide an evidence-based picture across Europe".

To date, only one EU member state has truly stepped up to address this challenge—Ireland.

Sources and further information

[1] Eurydice Network, Modernisation of Higher Education in Europe: Access, retention and employability 2014 http://eacea.ec.europa.eu/education/eurydice/documents/thematic_reports/165EN.pdf [accessed 15 April 2015]

[2] European Commission (2011), "Supporting growth and jobs – an agenda for the modernisation of Europe's higher education systems".

http://eur-lex.europa.eu/legal-content/EN/ALL/?uri=CELEX:52011DC0567 [accessed 15 April 2015]

[3] O'Malley, Brendan. "Governments must do more to widen access—Eurydice." University World News Global Edition, 9 April 2015, Issue 362. [accessed 14 April 2015]

http://www.universityworldnews.com/article.php?story=20150403005719833

[4] Ibid.

2 Feature - Meet the researcher

Prof. Dale Sanders, Director of the John Innes Centre in the UK.

We interviewed Prof Sanders on the occasion of his recent visit to China, at the establishment of JIC-CAS newly established joint research institutite, the *Centre of Excellence for Plant and Microbial Sciences (CEPAMS).*

Professor Dale Sanders is the director of the John Innes Centre (JIC). The JIC is an internationally leading institute for research in plant sciences and microbiology in the UK. His research focusses on how plant cells respond to changes in their environment and how they store the nutrients they acquire. He was elected a Fellow of the Royal Society in 2001.

Prof Sanders gained his PhD from Darwin College, Cambridge in 1978. In 2014, under his directorship, the John Innes Centre established new collaborations with the Chinese Academy of Sciences.

Professor Sanders, please tell us about your role and responsibilities.

I am a director of the John Innes Centre in Norwich, a research institute for plant and microbial sciences. We have about fifty research groups. We focus on basic research of plants and microbes, as well as on more applied research in crops and agriculture.

What is your own research area?

My own research area is how plants absorb nutrients from the soil, and what they do with them once they are inside the plant. One of the projects I am most excited about is related to zinc. About 25% of the world's population doesn't get enough of this essential human nutrient, because it is not accumulated in cereal grains very much. Through genetic modification, we work on enriching cereal grains with this essential mineral.

Is this your first visit in China?

My interactions with China started about five years ago when I was appointed to the editorial board of what has become a major journal in the field of plant biology. The board of this Chinese-run journal meets once a year. In addition, we have started a collaboration with two institutes of the Chinese Academy of Sciences which necessitated frequent visits. We have agreed joint research projects and established a joint centre of excellence.

The CAS-JIC Centre of Excellence for Plant and Microbial Sciences (CEPAMS) is the new project between JIC and your Chinese partners. What are the goals and plans of the centre?

There are two strands of our collaboration. The first strand is joint research projects between JIC and the two institutes we interact with, Institute of Genetics and Developmental Biology in Beijing and Institute for Plant Physiology and Ecology in Shanghai. The second way is establishing the CEPAMS centre itself.

We are now in the process of appointing a director for this centre. Next, we will be hiring ten new faculty members who will be a part of CEPAMS. Members of staff will be permanently based in one of the two CAS institutes. We might set up a single institute down the line, but this was a quick way to get started and an effective way to do science.

John Innes Centre **John Innes Centre** in Norwich, East of England, is an independent, international centre of excellence in plant science and microbiology. Their research makes use of a wide range of disciplines in biological and chemical sciences, including microbiology, cell biology, biochemistry, chemistry, genetics, molecular biology, computational and mathematical biology. More at www.jic.ac.uk/

What are the challenges researchers currently face in plant science?

A lot of the biggest, exciting challenges come from genomics. First challenge is related to what you can understand with genomics. Ultimately, in agriculture we would like to be able to do so-called "predictive breeding", where you can predict what a plant will look like from its genome sequence

The second challenge has come out of microbial field. It is now incredibly easy to get the genome sequence for microbes - you can have it within 24 hours. That enables us to identify the potential for genetic encoding of pathways which make novel products. You can use the genetic information to predict the types of those products.

Finally, the third opportunity lies in the field of synthetic biology. We are very active in putting together bits and pieces of DNA in an organism that will express them and use them, such as yeast or bacterium.

What motivates you as a researcher?

I have two motivations. Firstly, I get very excited by discovery, especially unexpected discovery. When we discover something new in the lab, it is amazing to know we are the first people in the world to find a new fact about how life works. Secondly, it is being able to make a difference. Through understanding of basic research, we can do something good for the world, as mentioned on the example of my work with zinc deficiency.

In your opinion, how important is international mobility for a researcher's career?

It matters hugely. It is almost essential these days to experience different ways of doing things and different environments, and integrate them into one's own way of doing science. There are different scientific cultures across the world, and there is not a single right way how to do science. Learning from different cultures means you can do science in a way that is right for you and your research, and that is very valuable.

What did you learn through your own interaction with China?

I learned a lot in terms of culture, and I gained new knowledge in different ways of doing science. For example, in the UK we rely much on postdoctoral researchers whereas the Chinese rely more on students. There are pros and

cons of both systems, but I have come to the conclusion the British way is probably more effective, as we have more senior researchers in the lab.

At a more scientific level, we learned an incredible amount of science from our Chinese colleagues. It is a relationship between equals with both sides working in parallel on global issues of today. For example, the Chinese are making huge progress in understanding how the rice genome impacts the properties of the rice plant.

What sparked your interest in science?

I have always been interested in science. My interest in plant science goes back to a specific moment in my penultimate year at school. During a school field trip, I learned about the diversity of plant species and why some species grow in some areas and some in others. I wanted to learn about how this is related to the physiology of the plant.

In my case, although I am not an ecologist, it was the experience of the natural world that turned me onto plants. Unfortunately, the plant field is not an area that many 18-year-olds get interested in. Within life sciences, they are more interested in biomedical topics.

Do you pass on your knowledge to the public and future generation of scientists?

To educate the future generation, I mainly pass on my knowledge through PhD students. I have had about 30 PhD students many of whom now have set up their own labs. This is how knowledge gets passed on through generations. I also interact a lot with the public, passing on my knowledge through public lectures and public dialogue. It is important to let the public tell you what is on their mind, listen to their questions. I also contribute to public understanding of science by writing an occasional article designed for a public audience, rather than a researcher-type audience.

Professor Sanders, thank you for the discussion.

3 EURAXESS Links Activities

3.1 2015 Research and Innovation Tour: Where Europe and China Connect

The **2015 Research and Innovation Tour: Where Europe and China Connect** is the 4th edition of an ambitious awareness raising campaign about European research and innovation. This year, the Tour is leading through 16 cities in 14 provinces across China. With an introduction of Europe's excellence in science and innovation, the Tour seeks to shape a vibrant EU-China research

and innovation community through an array of European research and innovation opportunities.

Under the **umbrella of the 40th anniversary of EU-China relations**, the series of events pursues the objective to consolidate Europe's position as the strong partner for China with regards to science and innovation cooperation. Each Tour event is tailored to provide **a unique set of lectures and presentations promoting different research and innovation programmes.** Moreover, attendees to the Tour events will be given opportunities to exchange views **face-to-face with the European representatives.** Highlights of each Tour seminar will be **inspiring testimonials** from former or current participants engaged in EU-level or EU Member State/Associated Country national collaborative research programmes.

The opening event is going to take place on **18 May at the Wuhan University of Technology under the high level auspices of the EU Ambassador to China, Mr Hans Dietmar Schweisgut, and a number of Consul Generals of EU Member States**. The event will showcase successful testimonials (including our own EURAXESS member and Science Slam 2013 winner Dr Yu Yang!) regarding EU-China research collaboration. Science and Technology Counsellors from several European countries (so far France, the UK, Italy and Finland are confirmed) will also present opportunities of their respective countries.

All Wuhan-based researchers are welcome to join. We welcome you to also forward the news to your colleagues in Wuhan. **The EU Delegation and EURAXESS Links China will be present as well**, so it's also a chance to interact with our China team. We will keep you informed about the details. In the meanwhile, find more information here.

3.2 EURAXESS Share: Researchers' Nights in Beijing and Shanghai

Big thanks to all of you who joined us for a "Light"-themed EURAXESS Share: Researchers' Nights in Beijing and Shanghai. In both places we had a fantastic time talking about research across Europe and China. We were happy to see so many of you enjoying the relaxed researchers-only vibe, plus generous offer of drinks and nibbles - leaving plenty of time for exchanging information and networking. For reports and photos, have a look here for Beijing and here for Shanghai or on Facebok (Shanghai). Stay tuned for more news and events from EURAXESS (and also from our colleagues, ThinkIN China, ESSCA School of Management and Understanding Science).

Special thanks goes to Dr Jianrong Deng from National Astronomica Observatories (CAS) who introduced to us the amazing CRAYFIS project. If you want to help discover answers to some fundamental questions of Nature, such as the origin of cosmic rays, the nature of dark matter, new natural symmetries, and possible extra dimensions of space-time, go and download the CRAYFIS app that helps you detect cosmic rays on your phone. By

downloading their app from http://crayfis.io/ you are effectively participating in creating the biggest cosmic ray sensor in the world!

4 News & Developments

4.1 EU & Multilateral Cooperation

Signature of Association Agreement with Ukraine

The Agreement for the association of Ukraine to Horizon 2020 was signed in Kiev on 20 March 2015 by Commissioner Moedas and Serhiy Kvit, Minister of Education and Science of Ukraine, in the presence of Mrs Marite Seile, Minister of Education and Science of Latvia, representing the EU Presidency. The signing ceremony was held at the Cabinet of Ministers following a meeting with Ukrainian Prime Minister Arseniy Yatsenyuk. The Agreement will still need to be ratified by the Ukrainian Parliament to enter into force, but Ukrainian legal entities can already participate in all Horizon 2020 actions funded under the 2015 budget, as the agreement covers the years 2015-2020. (International Research Update)

European Fund for Strategic Investment

The European Fund for Strategic Investment will be a package of measures to unlock public and private investments in the real economy of at least € 315 billion over the next three years (2015- 2017). The Investment Plan consists of three strands: (1) mobilising investment finance without creating new public debt; **(2) supporting projects and investments in key areas such as infrastructure, education, research and innovation** and (3) removing sector-specific and other financial and non-financial barriers to investment. The EFSI is a major step toward job creation and growth in the European economy.

Carlos Moedas, European Commissioner for Research, Science and Innovation, stressed the importance of investing in research and innovation in Europe. As for the EFSI, the Commissioner was convinced that "the new European Fund for Strategic Investment will further support research and innovation, by leveraging more public and private sector financing for "high risk high reward projects". (Press release, Factsheet, Where does Money Come From?)

EU and the Middle-East Building Bridges through Science Diplomacy

The EU Commissioner for Research, Science and Innovation took a new step towards strengthening cooperation in the Middle East through science diplomacy. To mark this increased and pro-active EU engagement with science diplomacy activities in the region, Commissioner Moedas participated on 13

April in a high level conference in Jordan on “Addressing shared challenges through science diplomacy: the case of the EU– Middle East Regional Cooperation” and visited the Synchrotron light for Experimental Science and Applications in the Middle East (SESAME) in Amman (Jordan). Commissioner Moedas said: “Cooperation in research and innovation with our Middle East partners is a priority for the EU.” (International Research Update)

European Commission launches scientific debate on how to feed the planet

The European Commission has launched an online consultation on how science and innovation can help the EU ensuring safe, nutritious, sufficient and sustainable food globally. The discussion is linked to the theme of this year's Universal Exhibition (Expo Milano 2015) "Feeding the Planet, Energy for Life", which aims to go beyond cultural activities and open a real political debate on

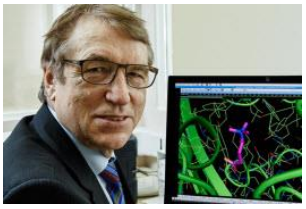
The consultation will **underpin the debate on a future research agenda to help tackle global food and nutrition security challenges**. It will focus on the areas where the EU's research efforts can have the strongest impact, such as how to improve public health through nutrition, increase food safety and quality, reduce food loss and waste, make rural development more sustainable, increase agricultural yields through sustainable intensification, as well as how to better understand food markets and increase access to food for people around the world. The consultation is available online. (Joint Research Centre)

European Commission launches €3m prize to improve air quality in cities

A prize of €3 million will be awarded to the person or team that develops the best material to reduce the concentration of particulate matter in urban areas, the European Commission announced on 16 April. The aim is to improve air quality in cities and reduce the serious health risks posed by particulate matter (PM), the **air pollutant** which has the most severe impact on health.

The Horizon Prize on materials for clean air aims to stimulate innovative thinking to find a material-based solution to the problem. The material can be made from any chemical substance (e.g. plastic, concrete, asphalt, etc.) capable or reducing PM concentration in the air (e.g. by capturing it).

As of today, the rules of contest are available **online**. Contestants will be able to submit their entries from 26 January 2017 until 23 January 2018. (European Commission)



Ivars Kalvins, inventor of mildronate heart medication and others

European Inventor Award finalists 2015: inventors behind 15 ground-breaking innovations selected

Their inventions make day-to-day life easier, create economic value and generate employment. They sometimes even save lives. The European Patent Office (EPO) announced on 21 April the 15 finalists for the European Inventor Award 2015. With this prestigious annual award, the EPO honours scientists and engineers in five categories whose inventions have been patented by the

EPO and have contributed to technological progress, social development and economic growth. The 10th edition of the award will be held in Paris on 11 June, when the winners will be announced at a ceremony attended by prominent representatives of the worlds of politics, business, research and industry. Once again the public will select the winner of the Popular Prize, which will be decided by online voting in the run-up to the ceremony.

More than 300 individuals and teams of inventors were proposed for this year's award, 15 of whom have been selected as finalists by the independent international jury. The 2015 finalists are from 11 countries: Austria, Australia, China, France, Japan, Latvia, the Netherlands, Sweden, Switzerland, the UK and the US. Their inventions cover a wide range of technological fields including biochemistry, civil engineering, energy, electronics, industrial chemistry, material science, medical technology, nutrition and physics.

"These ground-breaking inventions showcase Europe's role as a prime technology region and a hub of innovation for inventors from all over the world," said EPO President Benoît Battistelli. "The European patent system not only provides appropriate conditions to inventors from around the world for realising their creativity but also incentivises investors and entrepreneurs to strengthen their R&D activities and thus contribute to the economic prosperity of a region of 600 million people. These inventions once again show that the development of the European economy lies in its innovative capacity." (European Patent Office)

A new Wave of Scientific Transatlantic Cooperation

The Minister for Agriculture, Food and the Marine, Simon Coveney T.D. joined on 16 April 2015 with Carlos Moedas, European Commissioner for Research, Science and Innovation, and Karmenu Vella, Commissioner for Environment, Maritime Affairs and Fisheries in Brussels, along with Canada's Minister of Fisheries and Oceans Gail Shea, to announce the **first trans-Atlantic mapping survey to take place under the Atlantic Ocean Research Alliance**.

Commissioner Moedas stated *"I am committed to harnessing the societal and economic value of our oceans, while protecting fragile marine ecosystems. Under Horizon 2020 we have invested just under €70 million to support the Galway Statement follow-up. The first calls delivered excellent project proposals involving international teams. I am glad that this investment is being leveraged to make our transatlantic vision a reality."* (European Commission)

Foresight 2025: integrated and fast-evolving standards key to innovation

A JRC foresight study suggests the European standardisation system should accelerate and rely on an integrated strategy. The study argues this is the only way standardisation will be able to keep pace with technological developments and societal challenges, stimulating innovation and fostering competition.

In an ever-more globalised economy with increasingly fierce competition, European industry will need to rely more on new, advanced manufacturing systems and technologies, for which new or upgraded standards will be needed

on a regular basis to ensure quality and performance throughout the production and distribution system.

The study also provides a template to identify standardisation needs so that they can be addressed earlier and in a more systematic way. (Joint Research Centre)

Cheap and renewable electricity anywhere

Most wind energy comes from turbines 150 metres above ground level. Winds at this altitude are however weak and intermittent, with most wind farms operating at only 25 - 30% of their capacity. **EU-funded researchers have developed a prototype wind energy system that works at much higher altitudes, where winds are stronger and more constant**, increasing electricity production dramatically. A commercialised product is in the pipeline.

Read more here.

Infoday: Science with and for Society 2015

Date: 22/05/2015

Venue: Brussels, Belgium

The information day and brokerage event is targeted at all stakeholders interested in the Science with and for Society Programme of Horizon 2020. **Science with and for Society will help build effective cooperation between science and society, recruit new talent for science and to pair scientific excellence with social awareness and responsibility.**

The networking event will be of particular interest and relevance to members of the Science with and for Society research community who are looking for networking and funding opportunities within Horizon 2020. It will be mainly targeted at the researchers and other stakeholders preparing for the first and second calls of Horizon 2020 relevant to the Science with and for Society.

This event is organized by SiS.net2, the international network of National Contact Points (NCPs) in the field of Science with and for Society in Horizon 2020 in cooperation with the European Commission. (European Commission)

European Commission Foresight fiches: "Global Trends to 2030"

The set of European Commission Foresight fiches, analysing global trends to 2030, which was developed in the preparation of 'The Future of Europe is Science' report, is now available.

At a time when the new European Commission announced that it will concentrate on bold initiatives, it is important to recall that any policy decision has complex ramifications. Indeed, an increasing number of decisions affect several policy portfolios, and they need to take into account an increasing number of parameters, like geo-politics, economics, finance, security, health, environment, climate change, sociology, urbanisation, ageing society, and

integrate funda-mental European social values such gender equality and ethics. In ad-dition, the technological breakthroughs are accelerating as never be-fore in history and social innovation (e.g. social media) augments the speed of information gathering and dissemination.

Because societies become ever more complex, collaborative long-term anticipation must replace the "silo" thinking habits and the short-termism that has characterised many aspects of policy-making in Europe.

'We cannot predict the future, but we have the opportunity to invent it, based on sound science and technology foresight'. Related Documents:

Foresight Fiches 2014

(European Commission)

Smart grids in Europe: outlook and large scale application

On 1 April 2015, the JRC released two reports in the area of smart grids, which look at how smart grids research and innovation can help achieve the Energy Union's targets of secure, sustainable, competitive and affordable energy.

This analysis, which is based on data coming from daily grid management and real demonstration testing, helps evaluate the costs and benefits of developing a smart grid. In particular, the report makes an effort to monetise the several effects of interventions on software and physical infrastructure aimed at improving operation automation, constantly monitoring the health status of the grid (reducing the risk of failures and the consequent costs), and allowing for integration of more distributed generation (such as solar and wind power), thereby decreasing fossil-fuelled generation and CO2 emissions.

Reports have been presented at Innogrid, the European Research & Development conference for electricity transmission and distribution grids taking place on 31 March-1 April 2015 in Brussels, by JRC Director, Giovanni De Santi. The conference was attended by experts from the industry, associations, EU institutions, projects, NGOs and EU Member States contributing to the exchange of information and debates on the development of future electricity grids. (Joint Research Center)

U-Multirank 2015 edition

The European Comission global university ranking tool, U-Multirank, which assesses the performance of more than 850 higher education institutions worldwide, recently released its second set of results.

Particularly interesting for students and PhD candidates, the tool allows comparing performance of more than 1,200 higher education institutions, 1,800 faculties and 7,500 study programmes from more than 83 countries.

Read the EURAXESS Links EU Insight focused on U-Multirank that was published in May 2014.

Register your university to be in the next U-Multirank!

At this time registration of interest is possible for institutions that want to join in 2016. The fields then will be Biology, Chemistry, Mathematics, History, Sociology and Social Work/Welfare.

Register your university's interest for 2016

http://www.multirank.eu/contact-us/registration-2016/

Please note that institutions which have already registered for 2015 do not have to re-register for 2016!

4.2 EU Member States*, China & Bilateral Cooperation

France: The French R&D Clubs Convenes in New Parts of China

The R&D Club is a platform that facilitates exchange between French high-tech companies in China and has met more than 80 times in four different regions of China since its foundation in 2008. The French embassy now reports that the club is planning to extend their meeting venues beyond the traditional locations to convene, trying to focus more on the fast developing regions in the West of China and North East.

The R&D club is a unique link between the French Embassy in Beijing, French researchers engaged in Chinese research cooperation and French high-tech companies operating in China. The club is led by the scientific section of the French Embassy, which invites stakeholders and facilitates the discussion and content, while the French Chamber of Commerce hosts the meeting and organizes side-events. (France en Chine)

France: L'Oréal China Opens the Third Phase of Its Research and Innovation Center in Shanghai

On Tuesday, March 31, 2015 L'Oréal's Research and Innovation Center in the Pudong area of Shanghai opened the third part of its China facilities in the presence of the Consul General of France in Shanghai. With the addition of the new facilities the Center now covers 20,000 m² and hosts 300 researchers becoming L'Oréal's largest R&D platform worldwide. The new building utilizes eco-friendly technologies and features ultra-modern laboratories.

* Including countries associated with Horizon 2020.

L'Oréal is a good example of a European company successfully doing extensive research in China. The company has been present in the country since 1997 and opened up the first facilities in 2005. The second part of the facilities was put into use in 2010 and the third part that just opened completes the scientific potential of the operation. (France en Chine)

Switzerland: CASIA and EPFL Launch Sino-Swiss Laboratory for Data Intensive Neuroscience

The Institute of Automation of the Chinese Academy of Sciences (CASIA) and the Swiss Federal Institute of Technology in Lausanne (EPFL) launched the Sino-Swiss Laboratory for Data Intensive Neuroscience on March 26 at a ceremony in Beijing. Professor WANG Donglin, president of CASIA, Professor XU Bo, vice president of CASIA, Professor Sean Hill of EPFL, Mr. Michael Waser, deputy head of the Science, Technology and Education Section of the Swiss Embassy in China, and several researchers attended the event.

The joint laboratory, with two labs, one at CASIA and one at PFL, is the fruit of two years of growing collaboration between the two institutes.

Beginning in 2013, scientists from CASIA and EPFL began communicating about neuroinformatics. In September 2014, several scientists from CASIA and EPFL held a joint workshop in Lausanne, discussing both sides' recent advances in neuroinformatics and brain simulation. After further discussions, CASIA and EPFL agreed to establish the Sino-Swiss Laboratory for Data Intensive Neuroscience. Both sides will send scientists to the joint lab for academic exchange and joint collaboration. (CAS)

5 Grants & Fellowships

5.1 EU - Call announcements for international researchers

To find out more about **EU funding opportunities** for your research or innovation project please visit the **European Commission's Participant Portal** where all calls are published.

International researchers are also invited to join the database of independent experts for European research and innovation. Distinguished specialists are strongly encouraged to join the database of independent experts, through which they can participate in the evaluation of project proposals and monitoring of actions, submitted under Horizon 2020.

Europe: KIC InnoEnergy PhD School for PhD Candidates Who Want to Add Skills in Innovation and Entrepreneurship

KIC InnoEnergy PhD School fosters an innovative and entrepreneurial culture while growing a pan-European network in the energy sector. KIC InnoEnergy is one of the first Knowledge and Innovation Communities (KICs) fostered by the **European Institute of Innovation and Technology (EIT).**

KIC InnoEnergy PhD School is a customised education in innovation and entrepreneurship for:

- PhD candidates wishing to add skills in innovation and entrepreneurship to their ongoing PhD studies.
- Labs at universities or research institutes wishing to boost their innovation capacity by having a PhD candidate committed to innovation in their labs.
- Companies in the energy sector wishing to recruit highly-skilled energy engineers to increase their innovation capacity and thus their competitive advantage.

To promote the ability to link technical research with business opportunities in the energy sector, each candidate builds up an individual training and mobility program by:

- Choosing among a set of mandatory and optional courses that he/she plans to attend. The courses cover a wide range of Entrepreneurship, Innovation and Business Creation (EIB) topics as well as technical ones.
- Planning a 4-12 month stay at another European university, research institute or energy company.

The candidate is free to plan these activities as he/she wishes during the PhD project as long as the requirements of the PhD School are fulfilled.

Courses are taken in parallel with ongoing PhD studies either at the home university or during a 4-12 month stay at another European university, research institute or energy company supported by our mobility programme. All promote the ability to link technical research with business opportunities in the energy sector.

PhD School is always open for your application; the evaluation committee meets three times a year, usually in **January, May and September.**

Special KIC Summer School announcement

Summer school 'The Journey' has been run for over five years in Europe with over 1000 participants. EU initiative Climate-KIC has now for the first time also launched a special global edition to bring together top graduates from around the world. The five week course is set to offer a unique combination of science and entrepreneurship. It will be a crash course to identify opportunities in climate change and how to set up a startup to commercialize solutions.

The best 45 international applicants to the course will journey across Great Britain, Germany and Switzerland. Students work on ideas for solutions to real-world climate related issues and compete in teams. Based on their own creativity and climate change knowledge, the teams present a detailed business plan to a judging panel consisting of leading venture capitalists, start-up entrepreneurs and scientists.

The deadline for Chinese graduates and students to apply is **15 May 2015,** scholarships are available for uniquely qualified applicants. Click for info.

Open calls under Horizon 2020

Access all open calls on the Horizon 2020 Participant Portal.

Excellent Science programme
7 open calls including:
European Research Council frontier research grants:
ERC Advanced Grant **–** Deadline **2 June 2015**
ERC Proof of Concept Grant – Deadline **1 October 2015** (cut-off dates 5 Feb. and 28 May 2015)
MSCA Individual Fellowship – Deadline **10 September 2015**

Industrial Leadership
10 open calls, *ALL calls are open to Chinese participation!):*

Societal Challenges
27 open calls including the following ones particularly encouraging collaboration with China *(however, ALL calls are open to Chinese participation!):*
LCE-18-2015: Supporting Joint Actions on demonstration and validation of innovative energy solutions – Deadline **5 May 2015**
INT-11-2015: European cultural and science diplomacy: exploiting the potential of culture and science in the EU's external relations – Deadline **28 May 2015**

4.2 EU Member States*: Call announcements for international researchers

Belgium: Belspo Postdoc fellowships to non-EU researcher

The Federal Science Policy Office in Belgium (BELSPO) implements a fellowship scheme for highly qualified non-EU researchers (i.e. postdoctoral level or equivalent experience), granting them an opportunity to work for 6 to 18 months in a Belgian research team.

Qualifications for being eligible include holding a doctor's degree at the date of entry the Fellowship, being under the age limit of 50 at the date of entry the Fellowship, having the nationality of a target country, and be associated to research in one of these target countries.

The target countries this year cover the BRICS countries (including China), every African country as well as Vietnam.

The deadline for application is **May 31st, 2015**. More information can be found on the website of Belspo.

Croatia: Fellowships at CAS SEE Rijeka

The Fellowship Programme CAS SEE Rijeka is an international researcher mobility programme that offers up to five months residencies in Rijeka and in the countries of the Balkans region (Bosnia-Herzegovina, Serbia, Montenegro, Macedonia, Kosovo, and Albania). The Fellowships are mainly offered in the fields of the humanities and social sciences but may also be granted to scholars in life and exact sciences, provided that their proposed research project does not require laboratory facilities and that it interfaces with humanities and social sciences. The Programme welcomes applications worldwide from promising young scholars as well as from leading senior researchers. Deadline is **31 March 2015. Click here for more information.**

Germany: 10 doctoral fellowships in Chemistry, Biology, Physics and Natural Sciences Education at Humboldt University

SALSA, the Graduate School of Analytical Sciences Adlershof at Humboldt-Universität zu Berlin, is announcing 10 doctoral fellowships to begin on October 1st, 2015. The program offers a structured, three-year period of multidisciplinary research combined with an integrated curriculum in Analytical Sciences.

Applications will be accepted upon submission via online application tool only (www.analytical-sciences.de), which will be accessible from April 15th until May 11th, 2015. Graduate students (master's degree or equivalent) in chemistry, biology, physics and related disciplines with an interest in Analytical Sciences

* Including countries associated with Horizon 2020.

as well as graduates with a background in natural sciences education are invited to apply. http://www.analytical-sciences.de

Germany: Green Talents Award 2015

The German Federal Ministry of Education and Research (BMBF) holds annually the prestigious "Green Talents - International Forum for High Potentials in Sustainable Development" to promote the international exchange of ideas regarding green solutions. The award honours 25 young researchers from around the world each year. The winners come from various scientific disciplines and are recognised for their outstanding achievements in making our societies more sustainable. The Green Talents are selected by a high-ranking jury of German experts and are granted unique access to the elite of the country's sustainability research field. This includes:

- An invitation to Germany in 2015 to participate in the fully funded two-week science forum. While touring Germany, top locations will open their doors to the Green Talents and offer them an exclusive insight into their facilities and projects.
- A chance to present themselves and their work in personal discussions held as part of individual appointments with experts of their choice (during the two-week science forum).
- A second invitation to Germany in 2016 for a fully funded research stay of up to three months. At an inspiring location of their choice, the Green Talents will gain new experiences and advance their professional careers while establishing long-lasting partnerships.
- Exclusive access to the "Green Talents Network" of currently 130 high potentials in sustainable development from over 40 countries.

The competition is open to anybody that doesn't hold a German passport or lives in Germany and isn't older than 32 years of age at the time of application. Moreover, participants eligible to apply for "Green Talents" have to be enrolled in a Master's programme or have already achieved a Master/PhD degree with significantly above-average grades in any field related to sustainable development.

Application deadline is 02 June 2015, 12pm (noon, Central European Time).

Apply here. More information can be found on the website of the Green Talents Competition.

Germany: Applications for German Chancellor Fellowship of the Alexander von Humboldt Foundation open

The next application round for the German Chancellor Fellowship of the Alexander von Humboldt Foundation is open.

Each year, the German Chancellor Fellowship for prospective leaders gives up to 50 highly talented young professionals from Brazil, China, India, Russia and the USA the opportunity to spend a year in Germany enhancing their professional qualifications. Working with a host and mentor of their choice, the fellows implement independently developed projects in their respective field,

e.g. in politics, business, society, culture or the media. The fellowship programme is under the patronage of the Chancellor of the Federal Republic of Germany. The deadline for applications is 15 September.

Application requirements include

- a Bachelor's or equivalent academic degree
- initial proven leadership experience
- German or English language skills
- a project plan
- a letter of acceptance from the fellow's German host, who may work e.g. in an organisation, a business, in public administration, a museum or the media.

Founded in 1953 by the Federal Republic of Germany, the Alexander von Humboldt Foundation fosters and funds international collaboration between excellent individuals, be they prospective leaders or active researchers and academics, through its fellowship programmes and awards.

You can apply online until **15 September 2015**. More information on the German Chancellor Fellowship is available at www.humboldt-foundation.de/youngleaders.

Germany: 6 Postdoc Fellowships at the Universitat Konstanz - Germany

The 'Zukunftskolleg', a Scientific institution of The Universität Konstanz, is offering up to 6 Postdoctoral fellowships. These fellowships are available to researchers regardless of their nationality and field of research. The Deadline for Applications is 18 May, 2015.

See more information on the websie of the Universität Konstanz.

Ireland: Postgraduate Research Scholarship - J.E. Cairnes School of Business & Economics

J.E. Cairnes School of Business, Nui Galway, Ireland, is offering a postgraduate research scholarship.

Applicants should submit a full CV, a research statement of not more than 400 words outlining their interest in an area, and the names and addresses of at least two and not more than five referees (two to be academic referees) by post or email to: Professor Breda Sweeney, Accountancy & Finance, J.E. Cairnes School of Business & Economics.

Closing date for receipt of applications is May 22nd, 2015

Further information may be sought from: Professor Breda Sweeney, Accountancy & Finance. Email: breda.sweeney@nuigalway.ie

Italy: Fellowship Programmes at NATO Defense College in Rome, Italy

The NATO Defense College currently offers five fellowships each year in the field of defense and security policy research related to NATO and its partners. The objective is to promote research and political consulting in areas of particular interest to the Euro-Atlantic Partnership Council (EAPC), to NATO's partners in the Partnership for Peace (PfP) and to NATO's Mediterranean Dialogue (MD) partners and Other Military Cooperation (OMC) / Partners Across the Globe (PAG).

This year, two fellowships are available for candidates from PfP countries, two for candidates from MD countires and one for a candidate from an OMC/PAG country. Each fellowship will last for four months, at which time the fellow will be located at the NATO Defense College, in Rome, Italy.

The deadline is September 30, 2015. See more information about the fellowship and the eligibility on the website on the website of NATO.

Italy: TOChina Summer School 2015

In late June 2014, some 25 PhD candidates, graduate students, and young scholars and professionals from around the world gathered in Torino for the 8th edition of the TOChina Summer School and its two weeks of advanced training in the politics, political economy and foreign policy of contemporary China.

This coming Summer, the 9th edition of the School will run in Torino from Monday June 29th to Friday July 10th, 2015.

The aim of the TOChina activities will be to work at the intersection between China's long-term structural transformations in socio-political, economic and cultural terms, and those particularly salient recent trends that inform international debate at the present time.

Second (and last) round of admissions will close **24 May**. All complete applications reaching the TOChina Program Manager by this date (CET) are evaluated. More information about the TOChina Summer School can be found here.

Italy: Italian Government Scholarships for Foreign Students

The Italian Government awards scholarships for studying in Italy both to foreign citizens and Italian citizens resident abroad (IRE). The scholarships are offered for the following type of courses: Undergraduate University courses (renewals only); Postgraduate University courses; Master's Degree courses (Levels I or II); Ph.D. Courses; Specialisation Schools; Research under academic supervision; Courses of Higher Education in Art, Music and Dance (AFAM); Advanced Courses on Italian language and culture Courses for Teachers of Italian as second language.

The applicant's must be between 18-35 years old and have some proficiency in Italian. List of eligible countries can be found HERE.

The deadline for application is 13 May 2015. More information can be found on the website of the Italian Ministry of Foreign Affairs.

UK: International Exchanges Scheme and Cost-Share Programme of The Royal Society

The Royal Society offers a International Exchange Scheme that is for scientists in the UK who want to stimulate new collaborations with leading scientists overseas through either a one-off visit or bilateral travel.

The scheme covers **all areas of the life and physical sciences, including engineering, but excluding clinical medicine.**

Both the UK applicant and overseas applicant must:

- have a PhD, or be likely to have a PhD by the time the funding starts
- hold a fixed or permanent contract at an eligible organisation for the duration of the project (ineligible organisations include industrial, private and commercial organisations, university spin-out companies, government bodies and research institutes and research councils)
- be based in the respective countries at the time of the application
- If the intentino is to collaborate with partners in Taiwan, France, Ireland, China or Russia, the proposal can also be considered as a cost share application. This entails the UK applicant submitting a proposal to the Royal Society for up to £12,000 and the overseas applicant simultaneously submitting a proposal for an additional amount up to/equivalent to £12,000 to a partner organisation, with whom the Royal Society has a funding agreement.

The scheme will close on **1 June 2015**. More information can be found on the website of The Royal Society.

UK: PhD scholarships at the AHRC Centre for Digital Copyright and IP Research in China

Combining British and Chinese expertise, the Arts and Humanities Research Council (AHRC) Centre for Digital Copyright and IP Research in China will investigate the global copyright challenges and opportunities for creative and tech industries. Copyright and intellectual property (IP) laws are critical considerations for start-ups, entrepreneurs and corporations, particularly 'disruptive innovators' who use technology to shake-up existing business models.

Up to three fully funded PhD scholarships for September 2015 entry are available. Students will be registered and supervised **at the University of Nottingham's Ningbo campus in China** and will receive a scholarship that covers tuition fees, on-campus accommodation costs and health insurance for three years. A stipend of 3,000RMB per month will be paid and a travel fund of 10,000RMB per student will be available to support research-related activities.

Applications are welcome from Chinese and international students. Applications must be received by **31 May 2015.**

More information can be found on the website of Nottingham University.

4.3 Calls still open

Calls first announced in previous editions of the newsletter

EU: MSCA Individual Fellowship

Marie Sklodowska-Curie **Individual Fellowships** are meant to support the best, promising individual researchers from anywhere in the world (applicants must have a PhD by the call's deadline). You can download a **pocket guide** to MSCA.

There are two types of Individual Fellowships: European Fellowships and Global Fellowships.

Deadline: 10 September 2015

Details and all application documents are on the Participant Portal.

This blog has all you need to know about Marie Sklodowska-Curie Actions.

This blog can also be **useful to individual mobile researchers**, especially the IF (Individual Fellowships) section. http://mariecurieactions.blogspot.ch/

EU: ERC Advanced Grant

Advanced Grants are designed to support excellent Principal Investigators of any nationality.The deadline for this call is **Tuesday, 2 June 2015. Details** online.

EU: The European Respiratory Society (ERS) Fellowships

Deadline: 31 July 2015. Further information on this link.

Europe - International Doctoral Programme in Economics

Deadline: 7 May. Further information here

Austria: Erwin Schrödinger Fellowships

It allows allow young scientists doing research in Austria to perform work stays at leading foreign research institutions. **Applications accepted continuously**. Further information here

Belgium: Travel Grants for Long Stays Abroad

Submission deadline: no later than 3 months before departure. Applicants must attach the invitation of the host institution. Click for more details.

Belgium: BEWARE Fellowship: *Industry* and *Academia*

A new call has been launched in **February 2015** (cut-off dates: April 30, June 30, September 30 and November 30). Online applying form will be available from March 15th online.

Estonia: Government Scholarships

More information on the scholarships are available on StudyinEstonia portal; the list of international programmes is here.

Estonia: Kristjan Jaak Scholarships

Four categories with varying deadlines. **1 June** (Foreign Visits: Short term), Further information here

France: ANR "Hosting High-Level Researchers" Call

Dedicated to individuals, it is open to all scientific fields. **It enables "junior" or "senior" researchers from any country to carry out an ambitious research project in France.**

The deadline is **29 May 2015**. More information on ANR's website.

France: Connect Talent

The support for Connect Talent is funded by Pays de la Loire Region to research, training and innovation "breakthrough projects".

Deadlines: **September 2015 and February 2016.** More at www.connectalent.org

France: Institut Pasteur: Doctoral Doctoral Grants

For more information, visit online website or contact: *boursesRIIP@pasteur.fr*

France: Institut Pasteur Postdoctoral Grants call for proposals

Applicants of **any nationality**, holding a **PhD degree** and having **no previous postdoctoral experience** may apply. Further information here. Deadline: **end of May**

France: EMERGENCES 2015: Call for applications for Chinese scientists in the field of emerging infectious diseases

Deadline **31 May, 2015**. Application details are available on the website of the French Embassy in China.

France: IHÉS Call for Visiting Researchers

The ***Institut des Hautes Études Scientifiques*** (IHÉS) encourages **theoretical research** in mathematics, physics and human sciences methodology.

Deadline: May. Further information here.

Germany: Humboldt Research Fellowships

The applications for **Fellowships for Postdoctoral Researchers** and **for Experienced Researchers** are reviewed on a rolling basis. Further information here (Postdoctoral) and here (Experienced Researchers).

Germany: Emmy Noether Programme

Applications reviewed continuously. Further information is available here.

Ireland: Enterprise Partnership Scheme (Postdoctoral)

Open to all nationalities, deadline 17 June 2015. More info is online.

Ireland: SFI's Industry Fellowship Programme 2015

The purpose of the Industry Fellowship programme is to facilitate the bi-directional **movement of academic and industry researchers. Next deadline: 3 June.** Further information here.

Italy: Train2Move

Deadline for submission is the **5 May 2015.** All useful information is available at http://www.train2move.unito.it .

Italy: Call for 86 posts in PhD courses at the Scuola Normale Superiore

Applicatios can be admitted **by 31 August 2015**, for the autumn session. Click online for more information.

Hungary: Stipendium Hungaricum for PhD Students

Click for more information www.stipendiumhungaricum.hu/.

The Netherlands: NWO VISITORS TRAVEL GRANT

The call is now open, information here.

Luxembourg: National Research Fund (FNR) - INTER Mobility Call for Proposals 2015

Deadline**: 30 June 2015.** More information.

Norway: Personal Visiting Researcher Grants

Next deadline: 27 May. Further information here

Norway: FRIPRO Mobility Grants

Deadline **27 May 2015**. Find info online.

Portugal: Grants for Sabbatical Leave.

All research fields and nationalities are eligible. The call is permanently open, information (in Portuguese) can be found online.

Slovakia: Scholarships of the Ministry of Education, Science, Research and Sport of the Slovak Republic

Study/research stay for PhD students (5 months), teaching/research stay for university teachers and researchers (3 months)

More information about the deadline and eligibility criteria can be found here and here. Next deadline: **31 May 2015**

Switzerland: Swiss National Science Foundation: International Exploratory Workshops

Next deadlines: **3 June** and **7 October 2015**. More information online.

Turkey: TÜBİTAK Programme 2221 - Fellowships for Visiting Scientists and Scientists on Sabbatical Leave

Short-term (up to 1 month), Long-term (up to 12 months) and Sabbatical Leave (from 3 months to 12 months). Applications accepted on a rolling basis. Further information here.

The UK: Leverhulme Trust Visiting Professorships

Deadline: 14 May. Further information here

***

Other useful websites for EU fellowships and funding:

- Find A Postdoc

- Find scholarships in Europe

- Find PhDs in Europe

- Austrian Database for Scholarships and Research Grants

- Danish Ministry of Higher Education and Science Funding Guide

- Estonian Research Portal

- France PhD portal

- DAAD's Research in Germany Portal

- DAAD Research Fellowships and Grants Portal

6 Jobs

Access thousands of job and fellowship announcements in Europe and worldwide on the ***EURAXESS Jobs portal***. You can sort jobs by country, level of seniority, field or research or via free text searches.

You can also advertise jobs and fellowships at your organisation, free of charge, on the EURAXESS Links China website.

6.1 Jobs in Europe and China

Europe: Job Opportunities for You Supported by Marie Skłodowska-Curie Actions

Looking for a research related job in Europe? Maybe not looking but interested to see what's available these days?

In addition to EURAXESS Job Portal, which collects different job opportunities for researchers from all over Europe, you might be interested in taking a look at website of Marie Skłodowska-Curie Actions research fellowship which has a section called *Jobs for you*. Example of jobs posted recently are a postion of a Early Stage Researcher in Spectroscopy of fluorinated Peptides and Peptidomimetics, PhD fellowship in synaptic physiology and a PhD position in fisheries management at Norwegian College of Fishery Science.

Take a look at MSCA website.

Germany: More than 150 open positions for international PhD students, Postdocs and researchers at Helmholtz Centres in Germany

Work at Germany's largest scientific organisation: The Helmholtz-Gemeinschaft Deutscher Forschungszentren currently offer over 150 open positions for international PhD students, Postdocs and researchers in various research fields.

Here you will find all job vacancies.

Spain: 8 PostDoc Fellowships in Biomedicine at IRB Barcelona - Institute for Research in Biomedicine (supported by the EU)

Eight two-year competitive fellowships will be offered in this international call supported by EU Marie Curie Actions.

The Institute for Research in Biomedicine (IRB Barcelona) is an independent, non-profit research centre engaged in basic and applied biomedical science. Its ultimate aim is to improve the quality of people's lives by developing new applications for the remarkable discoveries that are being made in the life sciences. IRB Barcelona was established in 2005 by the Government of Catalonia, the University of Barcelona and the Barcelona Science Park. (See more on EURAXESS)

China: SIMM Recruits High-level Talents (Thousand Talent Program for Young Outstanding Scientists/ Hundred Talent Program)

Shanghai Institute of Materia Medica (hereafter referred as SIMM), Chinese Academy of Sciences (hereafter referred as CAS), founded in 1932 by Professor ZHAO Chenggu, has the longest history as a comprehensive research institution for drug discovery in China. Positions available in various fields, see online.

6.2 Other EU Research Jobs Portals

EU

- Academic Jobs EU
- Euro Science Jobs
- European Job Mobility Portal
- Careers with the European Union: European Personnel Selection Office
- Careers with the European Union (EPSO), non-permanent positions
- EuroBrussels- European Southern Observatory (ESO) recruitment portal
- CERN job portal
- Joint Research Centre external staff recruitment portal

Jobs Portals in Member States and Associated Countries:

- CEA PhD and Postdoctorate offers portal
- Belgian Federal Portal for Research and Innovation
- Cyprus' Research Promotion Foundation Database
- CNRS external examination portal
- Max Planck Society's job portal
- Helmoltz Association's job portal
- Irish Research Council Funding Portal
- Italian National Research Council vacancies
- BBSRC vacancies (UK)

- Science and Technology Facilities Council vacancies (UK)

7 Events

7.1 EURAXESS Links China recommends

6th EMBO Meeting, Birmingham 5-8 September, 2015. Major Life Science Event in Europe

The EMBO Meeting is an annual event held in Europe to promote the life sciences and the exchange of scientific results. The meeting encourages scientists to look beyond their own fields, engage with the international scientific community and explore interdisciplinary approaches to research in the life sciences. Participants experience new perspectives on topics that cover the entire range of the life sciences - from studies of molecules and the cell all the way up to investigation of larger, complex biological systems. More info here.

Lift China 2015: Making Innovation Happen

Lift will host the second edition of Lift China in partnership with swissnex China on 16-21 June 2015 in Shanghai and Shenzhen.

Since 2006 Lift Events explores the business and social implications of technological innovation through the organisation of international event series and open innovation programs in Europe and Asia. The first Lift conference edition was created in 2006 in Geneva; it has since become one of the **leading European digital innovation conferences.**

Held in Shanghai, Lift China will bring together innovators, entrepreneurs, artists and pioneers from China and abroad to exchange on digital technologies. This one-day event features inspiring talks, interactive masterclasses and workshops, as well as an exhibition. The conference will end with an evening dedicated to innovation. (Lift China)

Sino-Euro BioPartnering (SEBP), Shanghai: “A rendezvous between European SMEs and Chinese leading firms“

Sino-Euro BioPartnering (SEBP) is a collaborative annual event that proposes a cost-effective and tailor-made business platform for European SMEs whom are interested in the Chinese market.

This year's event will be held 14th of May, 2015 at the Grand Kempinski Hotel, Pudong, Shanghai, China. The registration is open at their website until 11th of May. More here.

7.2 Upcoming scientific events in Europe and in China

Field	Date	Location	Title (click for more details)
Events in Europe			
4th China – Europe Water Platform	12 May 2015	Brussels	The 4th CEWP High Level Conference
Future of the Doctora	28-29 May 2015	Vienna, Austria	Conference on Complex Networks and Climate Variability
Nanotechnologies	10-12 June 2015	Riga, Latvia	EuroNanoForum 2015 Conference
A new start for Europe: Opening up to an ERA of Innovation	22-23 June 2015	Brussels, Belgium	European Commission
65th Lindau Nobel Laureate Meeting	28 June-3 July 2015	Lindau, Germany	Lindau Meeting
Life Sciences	5-8 September 2015	Birmingham, the UK	6th EMBO Meeting
Food Safety	14-16 October 2015	Milan, Italy	Shaping the Future of Food Safety, Together
Events in China			
Cancer research	4-8 May, 2015	Suzhou	Precision Cancer Biology and Medicine
Green aviation	5-8 May, 2015	Xi'an	GRAIN2 Workshop
Computer science	24-26 May, 2015	Beijing	2015 Conference on New Advances in Big Data (NABD 2015)
Computer science	24-26 May, 2015	Beijing	2015 Conference on Internet of Things and Smart City (IoTSC 2015)
EU-China R&I Cooperation	17-18 June 2015	Beijing	INCONTACT

8 Press Review*

* EURAXESS Links China cannot authorise the reproduction of news items taken from other publications, nor is it responsible for the authenticity of the selected content. Anyone wishing to reproduce articles is advised to contact the originating source of the relevant news item.

8.1 Policy & Papers

China aims to be leader in innovation

Chinese policymakers are laying the foundation for a transformation of the country by 2020 from its primary role as a manufacturer to that of a leading innovator.

Over the past three decades, China has emerged as a major manufacturing base for the world, but the country's competitiveness in advanced manufacturing remains relatively weak, partly because of domestic companies' low investment in research and development.

Only 14 percent of Chinese enterprises with primary operating revenue of more than 20 million yuan ($3.2 million) annually have any R&D activity. Spending on R&D accounts for only about 0.8 percent of their total revenue, while their counterparts in developed countries, such as the United States, spend around 3 percent of sales revenue on R&D.

Qi Chengyuan, director-general of the high-tech industry department of the NDRC, said: "China welcomes the building of R&D centers in China by prestigious international scientific institutions and encourages foreign institutions to participate in China's technical programs, including both basic and applied research," Qi said.

In addition, the country will establish a market-oriented mechanism for innovation, increase the supportive role of policies and increase the voice of businesses in State innovation decisions. (China Daily)

Country leads way in patent applications

China maintained its position as the world leader in annual patent applications for the fourth consecutive year in 2014, with 928,000 invention patent applications filed, a 12.5 percent year-on-year increase, the State Intellectual Property Office of China announced. (China Daily)

Reform, innovation key to boost demand, growth: Li

Changchun - Local governments should keep track of changing economic patterns and fine-tune policies through reform and innovation accordingly to steady growth, Chinese Premier Li Keqiang said after a two-day inspection trip to northeastern Jilin Province.

The new-type urbanization is crucial to economic growth and restructuring and infrastructure development can not only supply necessary services but also boost employment, Li said after visiting a construction site of a local transportation hub. (China Daily)

"Internet Plus" to Catapult China into Crowdfunding Age

Crowdfunding could boost China's cultural industries, a sector identified as having potential for development under the government's new "Internet Plus" program.

The Internet Plus initiative, announced by Premier Li Keqiang at the parliamentary sessions in March, aims to integrate mobile Internet, cloud computing, big data and the Internet of Things with modern manufacturing. With the rise of mobile Internet, the program could open up a wealth of other opportunities.

Since 2010, China's network hardware infrastructure, such as 4G technology, has developed rapidly. By the end of 2014, there were an estimated 649 million Internet users, 557 million of whom use their cell phones to get online.

With this many users, any industry could benefit from Internet Plus, Fan Zhou, dean of the culture development institute of the Communication University of China, said. (CAS)

Higher Education Initiatives to Bring More from Countryside to Colleges

A total of 100 Chinese universities, including some of the country's best colleges, joined a Ministry of Education initiative to reserve at least 2 percent of their admissions spots for students from rural areas in poor regions in central and western provinces.

By April 17, 46 of them, counting the elite Peking and Tsinghua universities, had unveiled their plan and selection criteria for candidates in rural areas.

Eligible rural students will be able to receive up to 60 bonus points on top of the national college entrance exam in applications at participating universities. (Caixin)

8.2 Voices & opinions

Steriotype of Less Open-Minded Chinese Academia must be broken

As the fourth US-China Cultural Forum was wrapped up on Friday, Chinese and US scholars said that the stereotyped perception of a less open-minded Chinese academia must be broken.

"The understanding, both in the universities or in society at large, about the knowledge- including the teaching materials- about the outside world is much

opener," said Ding Wei, Vice Minister of Chinese Ministry of Culture. "We need to keep this openness."

Ding said openness was the key factor that guaranteed the impressive growth that China enjoyed in the past three decades, adding that the future generations in China would continue to be more open. (Global Times)

China's scientific progress hinges on access to data

It is hard — and getting harder — for Chinese scientists to access high-quality domestic data. Most of the public data are held by government departments, some of which are strengthening their monopoly and making it harder for researchers to access the information. This affects researchers in the humanities and social sciences especially, but also extends to fields such as environmental science and public health, because the data involved can be politically sensitive. At conferences, I hear numerous complaints from colleagues about how hard it is to extract routine figures such as air-pollutant levels from the authorities, for example.

Even when data are published, some are likely to be of poor quality because they have not been collected properly. The most notable example is the controversy on China's gross domestic product (GDP). There is a significant — and widening — difference between the official national estimate and the total calculated by adding up the GDPs of each of China's 31 province-level divisions. The National Bureau of Statistics in Beijing admits that different data-collection methods are used at the provincial level, and is trying to harmonize them. So far, progress has not been encouraging. (Nature)

8.3 Thematic Activities

Food, agriculture & fisheries, biotechnology

Group of Chinese Scientists Modify a Human Genome in Embryos for the First Time in History

A new paper, published April 18 in the journal Protein and Cell by a Chinese group led by gene-function researcher Junjiu Huang of Sun Yat-sen University, shows that work on editing human genome in embryos has already been done, and Nature News spoke to a Chinese source that said at least four different groups are "pursuing gene editing in human embryos." This would be the first time in history this has been done.

CRISPR, the technology that makes all this possible, can find bad sections of DNA and cut them and even replace them with DNA that doesn't code for deadly diseases, but it can also make unwanted substitutions. Its level of accuracy is still very low.

Huang's group successfully introduced the DNA they wanted in only "a fraction" of the 28 embryos that had been "successfully spliced" (they tried 86 embryos at the start and tested 54 of the 71 that survived the procedure). They also found a "surprising number of 'off-target' mutations," according to Nature News.

Huang told Nature News that they stopped then because they knew that if they were do this work medically, that success rate would need to be closer to 100%. (Yahoo, also more on Nature)

Hybrid rice varieties face new scrutiny

China's agricultural authority is set to conduct more comprehensive assessments of hybrid rice varieties following a massive crop failure in Anhui province caused by abnormal weather conditions and rice disease. Hybrid rice seed provider Yuan Longping High-Tech Agriculture Co said that it will stop selling its Liangyou 0293 variety following widespread low yields or crop failure. Agricultural scientist and company founder Yuan Longping, widely dubbed the "father of hybrid rice", said the crop failure in Anhui cannot serve as evidence that there are problems in all hybrid rice varieties. (China Daily)

China-led Research Team Sequences Cotton Genome

A joint biological research team led by Chinese scientists has completed genome sequencing of cultivated upland cotton, a new breakthrough in cotton genome studies.

The research sequenced and assembled the genome (AtDt) of gossypium hirsutum, an important fiber crop cultivated worldwide, providing insights into the genomic evolution of the cotton, the Chinese Academy of Agricultural Sciences (CAAS) said on Saturday.

The results will not only support multiple areas of cotton study but also speed up seed selection, said Li Fuguang, one of the researchers.

The research was completed with the combined effort of scientists from several organizations, including Peking University, BGI-Shenzhen, Wuhan University and Southern Plains Agricultural Research Center under the U.S. Department of Agriculture. (CAS)

* * *

Information & communication technologies

China seeks homegrown expertise as U.S. bans supercomputer chip sales

Chinese supercomputer builders have downplayed a U.S. government ban on selling Intel processors to China and said the ban may instead boost homegrown expertise.

Lu Yutong, chief designer of Tianhe-2, currently the world's most powerful supercomputer system, said the system will "definitely achieve its upgrade goal" despite the ban.

"Supercomputer upgrades are not solely decided by CPUs, though the ban will have some negative impact," said Lu.

Chinese engineers had planned to upgrade Tianhe-2's processing power from its current 55 petaflops per second (55,000 trillion calculations per second) to more than 100 petaflops in 2015. (Xinhuanet)

* * *

Nanosciences, nanotechnologies, materials & new production technologies

UAVs bring new trends in environmental protection

Unmanned aerial vehicles (UAVs) are playing an increasingly important role in China's battle against pollution. During the latest air pollution inspections in Beijing, Tianjin, Hebei Province and surrounding areas, law enforcement officials of the Ministry of Environmental Protection deployed UAVs to check key p laces. (China Daily)

Makers of drones eye growth in civilian use

State-owned defense contractors are racing to convert their military drones so they can grab a share of the lucrative civilian market, according to industry insiders. (China Daily)

Enzyme Cocktail Turns Biomass Into Hydrogen

The hydrogen economy envisions a future of high energy efficiency and nearly zero pollution. However, most hydrogen is currently produced from fossil fuels such as natural gas and coal, resulting in net greenhouse gas emissions. Existing hydrogen production facilities are equipped with high-temperature and high-pressure reactors that require high capital investment and large scale facilities. They cannot be scaled down to produce environmental friendly and affordable hydrogen for local users.

Professor Zhang Yiheng affiliated with Tianjin Institute of Industrial Biotechnology of Chinese Academy of Sciences, and his co-workers in the US, have developed an enzyme cocktail containing more than 15 enzymes which can produce hydrogen from both glucose and xylose of corn stover, one of the most abundant agricultural remains in the world. (Asian Scientist)

* * *

Environment (including climate change, conservation and biology)

China unveils landmark plan to curb water pollution

China will from late 2016 ban industrial plants, paper mills and refineries that pollute the country's water supplies, part of a wider plan to improve rivers, lakes, coasts and aquifers that have become chronically degraded following decades of breakneck economic growth.

Under the long-awaited 'Ten-point water plan', China's cabinet said it aims to lift the share of good quality water, ranked at national standard three or above, to more than 70% by 2020 in seven major river basins including the Yellow and Yangtze. (China Dialogue)

New Home For Critically Endangered Porpoises

WWF's 2014 Living Planet Report shows freshwater species are declining at a rate of 79 percent each year—much faster than their terrestrial or marine counterparts. The finless porpoise is no exception; its numbers are declining at around 13.7 percent per year. Without intervention, the species could become extinct in as little as five years. By relocating the porpoises, the government, WWF and partners are creating a better opportunity for the species to thrive. (Asian Scientist)

* * *

Energy

Apple to build first int'l solar project in SW China

Apple is helping to build a 40-megawatt solar power project in China's southwestern plateau in order to work toward its environmental and climate commitments, according to a company senior executive.

The project, which will be able to power 61,000 homes a year, will add 80 million kilowatt hours of clean energy to the grid annually, said Lisa Jackson, vice president for environmental initiatives at Apple.

"We are excited about the amount because it will generate far more energy than is being used by all of our offices and retail stores in China," Jackson told Xinhua through a telephone interview.

Currently, Apple has 19 corporate offices in China, including 17 in the mainland and two in Hong Kong, as well as 21 retail stores in the country. (Global Times)

Solar power space station to dispel smog considered

The battle to dispel smog, cut greenhouse gases and solve the energy crisis is moving to space. Chinese scientists are mulling the construction of a solar power station 36,000 kilometers above ground. If realized, it will surpass the scale of the Apollo project and the International Space Station, and be the largest-ever space project. The power station would be a super spacecraft on a geosynchronous orbit equipped with huge solar panels. The electricity generated would be converted to microwaves or lasers and transmitted to a collector on Earth. (China Daily)

* * *

Transport (including aeronautics)

New system will monitor traffic flow around country

A real-time traffic status platform to help reduce road congestion and optimize urban traffic plans has been launched in China. Initiated by navigation and digital map provider AutoNavi in conjunction with traffic management authorities in eight cities across the country, it will provide authorities with real-time information, including road conditions in popular destinations and a ranking of congestion hotspots in cities (China Daily)

China-developed C919 to have 'most powerful brain'

The first prototype of China's homegrown passenger jet, the C919, will be equipped with "the most powerful brain" the world aviation industry has ever seen, the Xinhua News Agency reported. The C919 will make its maiden test flight before the end of the year, and assembly of the first prototype is progressing well. (China Daily)

Shanghai to introduce sky-train with transparent carriages

Shanghai is going to introduce its so-called "elevated railway" system into the city, with transparent carriages meant to provide passengers with an unobstructed 360-degree view of the city. An elevated railway, also known as overhead railway or sky train, is a rapid transit railway with tracks above street level. The railway to be introduced in Shanghai will be a suspension system, with carriages hanging below the track.(China Daily)

China builds mother ship for 11,000-meter manned submersible

China started building of the mother vessel for a 11,000-meter manned submersible as part of the country's deep-sea research ambitions.

The ship,"Zhang Jian", named after the founder of Shanghai Ocean University, is 97 meters long and 17.8 meters wide. It has a designed displacement of around 4,800 tonnes and a 15,000-nautical mile endurance ability.

Designed to carry 60 people, the ship will be equipped with advanced laboratories, data processing and information centers and other devices. (Global Times)

Big growth expected in general aviation

China will need about 10,000 light aircraft within the next five years to accommodate the general aviation sector's rapid expansion, an industry insider said. (China Daily)

* * *

Socioeconomic sciences & the humanities, archaeology & paleontology

World's Earliest Flower may Date back 162 mln Years: Study

The world's first typical flower may date back to 162 million years ago, more than 37 million years earlier than previously thought, Chinese researchers reported in a new study.

The fossil flower, named Euanthus panii, was found in western Liaoning Province, according to the study, which was published in the recent edition of the UK-based Historical Biology, an international journal of paleobiology.

The findings were made by Wang Xin, a research fellow at the Nanjing Institute of Geology and Paleobiology of the Chinese Academy of Sciences, and Liu Zhongjian, a professor at the National Orchid Conservation Center. (CAS)

* * *

Space

China launches its latest Beidou satellite

China launched a new-generation satellite into space on Monday night, starting the expansion of its indigenous navigation and positioning network to global coverage.The satellite, the 20th for the Beidou Navigation Satellite System, was sent into orbit by the Yuanzheng-1 upper stage vehicle after being lifted by a Long March-3C carrier rocket from the Xichang Satellite Launch Center in Sichuan province.

The launch is the first step in China's plan to turn the navigation system's current regional service into global coverage, according to a statement issued by the center. China launched the first Beidou satellite in 2000. The system began providing positioning, navigation, timing and short-message services to civilian users in China and surrounding areas in the Asia-Pacific region in December 2012. Currently, the system consists of 15 satellites. (China Daily)

Rockets aim for overseas market

China has brought its most advanced rockets to a Brazilian defense show, aiming to expand the South American market for its space vehicles, an industry insider said. "This is the first time we have displayed the Long March 7 launch vehicle at a foreign exhibition," said Li Tongyu, head of aerospace products at the China Academy of Launch Vehicle Technology, the nation's major rocket developer and a subsidiary of China Aerospace Science and Technology Corp.

Currently, the commercial launch market is dominated by the United States, Russia and France, he said. China aims to have 10 percent of the international satellite market and 15 percent of the commercial launch sector by the end of the year, according to China Aerospace Science and Technology Corp. (China Daily)

* * *

People & Higher Education

Rhodes Scholarships Expanding to Include Chinese Students

The organization that administers Rhodes scholarships, the prestigious grant program that sends promising students to the University of Oxford, is preparing to expand to the developing world and other countries and will soon begin naming scholars from China.

By entering China, the program, which has struggled financially in recent years, is also creating a new platform to raise money. But even among the many alumni who believe that an expansion is overdue and that Chinese students should be a part of it, there is some concern about whether the Communist Party will try to exert pressure on the selection process to exclude university students whom the authorities view as critical of the government. (New York Times)

Top 5 most secretive and mysterious research universities in China

If you are a student of science or engineering looking for a “thrilling” exchange programme in China, this may be the right place for you. The universities on the list below enjoy high reputations in China and they all accept overseas students, but they rarely publish papers in international journals due to the sensitivity of

their research, so you may not easily find their names on most world university rankings. If you visit them, don't be misled by the peaceful and friendly atmosphere on campus. The old professor riding a dusty bike with fatherly smile and silvery hair along your way to class could be chairing the development of China's most deadly space weapons. (SCMP)

* * *

Research Infrastructures

China's First Marine Science Lab Launched in Qingdao

China's first national-level lab for marine science and technology opened in the coastal city of Qingdao in the eastern province of Shandong, provincial authorities said.

Qingdao National Laboratory for Marine Science and Technology was approved by the Ministry of Science and Technology in early 2014 and jointly built by the provincial government of Shandong and the government of Qingdao City.

Scientists from 11 marine-related organizations, including Ocean University of China and the Institute of Oceanology of the Chinese Academy of Sciences, will participate in the lab's research.

According to Chen Yiyu, an academician of the Chinese Academy of Sciences and head of the laboratory, the lab is expected to become one of the world's seven largest marine science research centers within 10 years. (CAS)

China's 'Snow Dragon' returns from 31st Antarctic trip

The icebreaker "Xuelong" (Snow Dragon), returned to Shanghai, concluding China's 31st Antarctic expedition.

The China-led team completed reconnaissance and survey observations for a planned bio-ecology and satellite remote research station. The team also undertook marine geology; geophysics; marine chemistry and biology; and biotic resource analysis in the Southern Ocean. Scientists succeeded in drilling ice cores with a total length of 172 meters, which will inform ancient climate study. (China Daily)

China Launches New Deep-sea Research in Pacific Ocean

China's first self-designed deep-sea exploration vessel, Haiyang Liuhao, left the port city of Guangzhou on Tuesday for research in the Pacific Ocean.

The vessel, on its fifth research expedition since being delivered for use in October 2009, set off at 10 a.m. with 130 researchers on board and carrying unmanned submersible Haima. It is due to return in the middle of November, according to China's marine geological authorities.

Haiyang Liuhao, also known as Ocean No. 6, will use advanced technology to collect samples and measure microtopography near the sea bed.

This will be the first time that Haima, which can dive to 4,500 meters via remote control, has explored deep sea resources in the Pacific Ocean.

Haiyang Liuhao finished its last research expedition in November after a 162-day exploration of the Pacific Ocean. (CASx)

International S&T relations

Chinese universities to accept Malaysian exam results

Results of the Chinese language examination in the *Sijil Pelajaran Malaysia*, or Malaysian Certificate of Education, will soon be recognised by China, marking a success for the Malaysian Chinese Association's efforts to boost the language. (University World News)

* * *

About this newsletter

EURAXESS LINKS CHINA NEWSLETTER is a monthly electronic newsletter, edited by EURAXESS Links China, which provides information of specific interest to European researchers and non-European researchers in China who are interested in the European research landscape and in conducting research in Europe or with European partners.

The information contained in this publication is intended for personal use only. It should not be taken in any way to reflect the views of the European Commission nor of the Delegation of the European Union to China.

Please email china@euraxess.net for any comments on this newsletter, contributions you would like to make, if you think any other colleagues would be interested in receiving this newsletter, or if you wish to unsubscribe.

Editors: Andrea Střelcová, EURAXESS Links China Country Representative

* * *

About EURAXESS Links China

EURAXESS Links China is a networking tool for European researchers active in China and for Chinese researchers wishing to collaborate and/or pursue a

career in Europe. EURAXESS Links China provides information about research in Europe, European research policy, opportunities for research funding, for EU-China and international collaboration and for trans-national mobility. **Membership is free**.

Visit us at china.euraxess.org and Join the EURAXESS Links China community.

EURAXESS Links networks have thus far been launched in North America (USA & Canada) Japan, China, India, the ASEAN hub (encompassing Singapore, Thailand, Malaysia, Vietnam and Indonesia) and Brazil.