

Quarterly Newsletter Issue 1 2017

EURAXESS BRAZIL

EURAXESS Brazil Newsletter is a quarterly electronic newsletter, edited by EURAXESS Brazil, which provides information of specific interest to European and non-European researchers in Brazil who are interested in the European research landscape and conducting research in 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 Brazil.

Please email to brazil@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: Charlotte GRAWITZ, EURAXESS Brazil, Country Representative and Ingrid LE VAN, EURAXESS Brazil Support Officer

Contents

1	Briefing2
	Cooperation between the EU and Brazil on Science, Technology and Innovation, by Alejandro Zurita2
2	Hot topics – MSCA Individual Fellowships: New opportunities for Brazilian researchers and Brazilian host institutions6
	Interview with Daniel PRAEG, Swiss researcher currently in Brazil with a Marie Sklodowska Curie Actions (MSCA) global fellowship
3	EURAXESS members in focus: ESTONIA – a place for independent minds
	Research and Development in Estonia10
	Research Excellence in Estonia10
	Estonian R&D Strategy10
	Entrepreneurship and Innovation11
	Funding and Recruitment Opportunities11
	Important Information for Incoming Researchers11
	EU Council presidency11
	Interview with Brazilian researchers in Estonia12
4	EURAXESS Brazil activities
	4.1 EURAXESS Brazil commemorates ERC 10th anniversary, Rio de Janeiro, 6 April 2017
	4.2 Tour of Brazil event at FAUBAI Conference 201713
	4.3 Workshop on Funding opportunities for Brazil-Europe mobility and cooperation, FAPESP, 8 March 2017
	4.4 Looking for funding opportunities? EURAXESS can help you!14
	4.5 In case you missed our Flashnotes14

1 Briefing

Cooperation between the EU and Brazil on Science, Technology and Innovation, by Alejandro Zurita

The accumulation of knowledge is the driver of economic growth in the globalised modern world. Hence the development of science, technology and innovation (STI) also promotes the sustainable development of the society. Therefore, policy makers should consider STI also with the same relevance like other key social sectors like health and education. This is in line with Brazilian governmental statements at international forums, e.g. the 4th BRICS STI Ministerial meeting and the G20 STI Ministers' meeting. Here it was confirmed that research and innovation (R&I) policies are the priority of the government to accelerate the economic recovery and the social development of the country.

In this context, the cooperation on STI between the European Union (EU) and the Federative Republic of Brazil aims at **increasing the social and economic impact of STI in their societies**. This cooperation has been consolidated in recent years, and has also been occupying a significant position in political agendas. In effect, STI appears as an important contribution to the working documents of the bilateral Joint Committee, preparing the coming 8th EU-Brazil Summit expected to be held in Brazil during 2017.

The promotion of STI cooperation of the EU with Brazil poses, however, several challenges at bilateral and regional levels: One of them is the relative low Brazilian participation in the Horizon 2020 programme in comparison to the previous 7th Framework Programme. The non-automatic funding rule applied in Horizon 2020 for specific emerging economies is one of the reasons for the decreased participation. In this respect, the EU Delegation to Brazil, together with Brazilian authorities and stakeholders, is working on specific schemes of participation in the Horizon 2020 programme and improved dissemination strategies of the opportunities offered by this programme. This is mainly implemented in cooperation with the Ministry of Science, Technology, Innovations and Communications (MCTIC) and the Ministry of Foreign Affairs (MRE), and in close interaction with different relevant federal and State entities, e.g. the National Council for S&T Development (CNPq), the Studies and Projects Financing Agency (FINEP), the Council of the State Funding Agencies (CONFAP), the Research Foundation of São Paulo (FAPESP) and the Coordination for the Improvement of Higher Education Personnel (CAPES) among others.

Indeed, a first goal is to effectively use the opportunities offered by Horizon 2020 to strengthen the excellence in STI of the bilateral cooperation. In this regard, two main actions have been performed: The first one is the adoption of specific guidelines, establishing frameworks to provide matching funds mechanisms for participation in Horizon 2020 projects. In this respect, the Letter of Intent signed in 2014 between CONFAP and the EU Delegation to Brazil represented the overall umbrella under which single States' Research Support Foundations (FAPs) were encouraged to implement mechanisms for participation in Horizon 2020 projects. The first Funding Agency defining modalities and rules for participation through co-financing mechanisms was the FAPESP, in coordination with the EU Delegation to Brazil. The outcome was the publication of the "Guidelines for the preparation of research proposals in collaboration with proposals submitted to EU Horizon 2020". On this basis and under the overall guidance and support of CONFAP, eight different FAPs have up to now launched their own guidelines on specific procedures for assessing case by case participations of entities from their States in Horizon 2020 projects.

Dr.-Ing Alejandro ZURITA is the Head of Science, Technology and Innovation at the EU Delegation to Brazil.

With a background in energy, Mr. Zurita developed his career in private and public sectors.

He started working for the European Commission in 1990, and in 1996 he moved to DG Research (nuclear fission) in Brussels where he contributed to project management and policy development in various reactor safety areas. Before starting at the EU Delegation to Brazil, he held the position of head of the Euratom International Cooperation sector.

A second main action refers to the Implementing Arrangement signed by the European Commission (EC) and the CONFAP, which encourages post-doctoral individual researchers from FAPs, CNPq and CAPES to integrate research teams funded by the European Research Council (ERC), performing cutting-edge research across Europe. In this respect, from the last call for expressions of interest of ERC-grantees, a total of 303 principal investigators coordinating ERC projects expressed interest to integrate Brazilian scientists. It is expected that this arrangement will give a new momentum in the bilateral collaborative and networking activities, and also contribute to the implementation of the researchers' mobility, one of the pillars of the EU-CELAC Common Research Area.

Since talent is spread everywhere, new challenges appear concerning the question on how to possibly complement the support of those Brazilian States not having adopted specific guidelines for their entities and scientists participating in Horizon 2020 projects. Additionally, discussions have been launched on possible arrangements aiming at supporting those Brazilian enterprises participating in Horizon 2020 projects.

Furthermore, a very important challenge for both parties is to effectively disseminate information relating to the Horizon 2020 programme to all possible participants of a large federative and asymmetric country like Brazil. The EU is working together with its member states and EURAXESS in events and activities related to dissemination of the Horizon 2020 programme. One example is the so-called Tour of Brazil event and other common approaches concerning specific collaborative activities and networks with Brazil. Since 2014, about ten Brazilian states have been hosting different Tour of Brazil events, an initiative that will be continued in the near future. The collaboration on mobility of researchers is more advanced with the programmes Marie Skłodowska-Curie Actions (MSCA) and Erasmus+, very well received by Brazilian and European scientists. In this respect, EURAXESS Brazil also promotes MSCA for individual researchers in both directions - to the EU and also to Brazil - working closely with MSCA fellows. EURAXESS also promotes various science communication activities in partnership with the Brazilian Academy of Sciences.

Moreover, the bilateral cooperation on R&I is also supported by two specific bilateral projects that have been recently launched, firstly: INCOBRA promoting bilateral R&I networking and cooperation activities, mainly through specific and brokerage events, promotional materials, info-days, webinars and training activities. Secondly, the new project CEBRABIC aims at launching a centre for Europe-Brazil business innovation cooperation, also focussed on enterprise initiatives. Both are composed of numerous Brazilian and European members.

A second main goal is that the EU and Brazil should be prepared to **tackle challenges with a global dimension or affecting specifically both parties**. In this respect, the response to the zika virus outbreak through an urgent Call of Horizon 2020 launched in March 2016 is very relevant. It resulted in three projects (EU budget of €30.5 million) and recently started with the participation of 20 entities from Latin America and the Caribbean, from which 12 are Brazilian entities financed by the programme. Moreover, the establishment by the EC and other funding international organisations of the Global Research Collaboration for Infectious Disease Preparedness (GloPID-R) also offers a possibility to collaborate with the national network of experts in zika and related diseases (Renezika) of the Brazilian Ministry of Health.

Another good example of the successful collaboration between EU and Brazil occurs in the field of Information and Communications Technology (ICT), on its current 4th Joint Call. This call was recently closed and addresses three topics

of great relevance for the development and uptake of technologies in the area of future internet: 5G, Cloud computing and Internet of things. An equivalent budget has been provided by each party, the Brazilian participants being funded through the National Research and Education Network (RNP). The joint evaluation of the proposals by experts from Brazil and the EU is planned for May 2017, so that selected projects will start by the end of 2017.

Furthermore, the coordinated Call on Advanced Lignocellulosic Biofuels launched by the EC, MCTIC, CONFAP and FAPESP with an equivalent budget provided by each party, has led to two projects: the Brazilian BIOVALUE consortium, bringing together budgets and research groups from five states and six companies, and the corresponding European project with seven EU member states involved. This involves the whole innovation chain of both parties, from universities to research institutes and industries, and future prospects for continuation are already envisaged. Other topics of specific common interest refer to biodiversity and climate change, health (infectious or chronic diseases, bio-economy), aviation and transport, as well as the alignment to the goals of the U.N. Agenda 2030 Sustainable Development.

The implementation of all collaborative activities is encompassed under the legal framework of the "Agreement for S&T cooperation between the European Community and the Federative Republic of Brazil" (2007) and endorsed by the corresponding Joint Steering Committee. Its next meeting, planned to be held in Brussels within 2017, is very important in order to agree on the strategic priorities of both parties, in a moment timely appropriate in view of the definition of the main R&I lines of the work programmes 2018-2020 of the Horizon 2020 programme to be launched approximately in the last quarter of 2017. Under this legal framework, also a specific MCTIC-JRC Cooperation Arrangement was signed in 2013. Furthermore, a second active cooperation agreement in force is the "Agreement for cooperation between the European Atomic Energy Community (Euratom) and the Government of the Federative Republic of Brazil in the field of fusion energy research" (2013), which addresses specific collaborative activities in particular at the Joint European Torus (JET) and on the planned Brazilian National Fusion Laboratory (LNF).

The EU and Brazil are working together also under **multilateral frameworks**. In this respect, the strong Brazilian engagement in the development of the biregional EU-CELAC Common Research Area is much appreciated by the EU. The work done by Brazil on the mapping of their research infrastructures and prospects on further developments, the Brazilian involvement in global challenges like the zika virus and biofuels, and the diverse Brazilian policies in mobility, together with the relevant influence of Brazil in the region, makes this country a key partner of the EU-CELAC.

There are further activities with multilateral dimension in which Brazil and the EU are working together. Marine Research is an area in which both parties are looking forward to enhancing the cooperation, particularly in view of expanding the Trans-Atlantic Ocean Research Alliance (TORA) to the Southern Atlantic. with Brazil and South Africa playing a leadership role. The EU is also keen to cooperate with Brazil in other multilateral frameworks like the U.N. Mission Innovation, in particular on the Innovation Challenge 'Sustainable Biofuels Innovation Challenge. The latter is co-lead by Brazil with 17 countries and the EC as participants, and aims at developing processes to produce, at scale, widely affordable and sustainable advanced biofuels for transportation and industrial applications. Moreover, the International Bioeconomy Forum (IBF) was effectively launched by the EC in October 2016 with participation of MRE as observer. In related technical workshops, FAPESP was especially interested in the microbiome group. For the coming first IBF meeting a concrete proposal of engagement of Brazil in the initiative is expected. Progress in this field occurred under the framework of the Sector Dialogue Facility. From the 8th Call for proposals (2016) of the Sector Dialogue Facility, three joint actions between



MCTIC and JRC were established: The Establishment of the Observatory for Innovation in Biotechnology in Brazil and its interaction with the EU Bioeconomy Observatory; The consolidation of the Lifecycle National Bank Inventories; and the Technology Platform for agro-ecology, organic agriculture and food security.

Finally, it should be noted that activities of **STI** are also supporting **EU** external policies. Indeed, the existing synergies with other cooperation programmes, in particular the Sector Dialogue Support Facility and the new Partnership Instrument, are likewise considered to support cooperation policies. These activities also increase the awareness and participation in Horizon 2020 activities and networks. Moreover, STI is one of the key elements recognised by the Agenda 2030 for Sustainable Development. Its integration with the cooperation for the development should be pursued, so that the knowledge generated by STI programmes can also contribute to increasing the impact of the cooperation instruments and to the welfare of the societies. In this respect, under the EU-Brazil Sector Dialogue Support Facility, STI covers some important priorities, MCTIC on the Brazilian side and JRC on the European side being the most active partners. This also aims at joining the two communities with events and visits, both in Europe and Brazil.

For the very close future, there is also a potential to be exploited to promote R&I actions under the new Partnership Instrument managed by the Foreign Policy Instrument, which helps the EU to achieve the objectives of its foreign and security policy. This instrument is designed to engage regional and interregional cooperation partnership strategies by promoting policy dialogue and reinforcement of cooperation on climate change, energy security and the protection of the environment.

The level of R&I cooperation between Brazil and the EU is reasonably developed, and there are prospects for further development in different interesting domains. Nonetheless, there is still margin to better exploit the full potential of the EU-Brazil R&I cooperation. To further develop the existing instruments and arrangements, the EU is working together with the member states, associated countries and EURAXESS to enable stronger Brazilian participation in activities of Horizon 2020. For this purpose, further actions concerning the development of new approaches aiming at improving Brazilian participations are considered, together with the optimisation of a wider dissemination of the variety of programmes, calls and opportunities offered by Horizon 2020. On the latter, the EU will further support the national contact points of the different countries in a more coordinated way. This will be done under the new instrument Service Facility, aiming at supporting the strategic development of international cooperation in R&I and ensuring coherent and stronger links with European partners.

"You cannot hope to build a better world without improving the individuals. To that end, each of us must work for our own improvement and, at the same time, share a general responsibility for all humanity, our particular duty being to aid those whom we think can be most useful"

MARIE CURIE

Definitions:

Member states (MS): the 28 countries which are part of the European Union

Associated Countries (AC):
16 countries associated to the
EU framework programme for
research and innovation,
Horizon 2020



Figure: EU Member States and associated countries.

Third Countries: any country that is not an EU Member State; within Horizon 2020, the concept of third country is more restrict: not an EU Member State and not an Associated Country to H2020

Proponent: Individual researchers from anywhere in the world may submit the proposal, in coordination with a host institution based in a MS/AC.

In the case of global fellowship, all details of the Brazilian host institution or "Partner Organisation" must be included in the proposal and its "Letter of Commitment" must be annexed

2 Hot topics – MSCA Individual Fellowships: New opportunities for Brazilian researchers and Brazilian host institutions

By Elisa Natola, MSCA National Contact Point for Brazil, Brazilian National Council of State Funding Agencies (CONFAP)

Within the Marie Sklodowska Curie Actions (MSCA), a new call for 2017 Individual Fellowships will soon be launched, thus offering a challenging opportunity for both Brazilian Researchers and Brazilian Host Institutions.

Individual Fellowships are divided in two main branches **European Fellowships** and **Global Fellowships**, both characterised by the goal of promoting excellent science, career development, international and intersectoral mobility, transfer and exchange of knowledge, focus on research and innovation.

This particular Action of MSCA is the most appealing to Brazilian researchers and Brazilian Institutions, due to the fact that its eligibility criteria allow Brazilian researchers to be active candidates, entitled to receive EU funding, and in the same dimension, Brazilian Host institutions are eligible to host researchers coming from the European Union and Associated countries (EU/AC).

A feature which characterises Individual Fellowships, as all MSCA, is that the programme is totally **bottom up**; therefore **open to all fields of knowledge**, thus offering a unique flexibility and variety of research topics for project proponents.

In the case of a European Fellowship, the researcher can move 1/ within Europe or 2/ from a third country (including Brazil) to any European member states or Associated Countries.

In the case of a Global Fellowship, the researcher moves from Europe to any Third Country, including Brazil, and then goes back to his/her host institution in Europe.

For Brazil in particular, this means mobility opportunities with any of the 28 countries which are part of the European Union, and the 16 associated countries, thus giving a wide range of options and possibilities to implement such exchanges.

Mobility flows need to follow several rules in order to match the eligibility criteria of the call.

Firstly, eligibility regards the <u>type of researchers</u> who can apply: **Experienced researchers** who, at the date of the call deadline, are in possession of a doctoral degree or have at least four years of full-time equivalent research experience. Detailed eligibility conditions should be checked in the guiding documents of the call, which detail different specific cases.

As for the <u>duration</u> of mobility flows, in European fellowships, the overall duration ranges from **12 to 24 months**, whereas for Global Fellowships, such timeframe has an obligatory **extension of 12 months**, in which the researcher has to return to his/her host institution in the EU/AC.

*Career Restart Panel: for researchers who wish to resume research in Europe after a career break (e.g. after parental leave, working outside research, etc.).

**Reintegration Panel is dedicated to researchers, nationals or long term residents of a MS/AC, who wish to return and reintegrate in a longer term research position in Europe.

*** contact the MSCA NCP for Brazil to publish on the Eol Net4Mobility webpage.

Contact MSCA National contact point (NCP) in Brazil

Ms. Elisa Natola, CONFAP

horizonte2020@confap.org.br

The forthcoming 2017 call shall open on the 11 April, closing on the 14 September, 17:00 Brussels time, with an overall budget of 248 million euros.

Individual **European** Fellowships offer a wide range of options which reflect different needs and demands of researchers, and are aimed in particular to support experienced researchers to undertake international and inter-sector mobility (through the European Fellowships - Society and Enterprise Panel), including career restart* and reintegration**.

Global fellowships are still underused to host EU researchers in Brazil

It can be observed that the majority of projects with Brazilian participation have been within the European Fellowships option, therefore with Brazilian researchers going to Europe and Associated countries, whereas the Global Fellowships have not been exploited adequately yet.

Such an opportunity could be widely promoted, so that Brazilian Research Institutions could take advantage of the upcoming IF call to attract excellent researchers from the EU/AC to their premises.

Brazilian research institutions (being them public or private universities, research centres or company) interested in hosting a MSCA individual (global) fellow should:

- Express their interest on <u>EURAXESS host tool</u>, or through the Net4Mobility Expressions of Interest webpage***
- Invite your partners, being host institutions or individuals, reminding them that the European Commission can fund their research stay in Brazil for up to two years.

Preparing a proposal

Some practical orientations can be kept in mind, in preparing a proposal for the forthcoming call:

- Proponents should start constructing the proposal as soon as possible, in order to focus the project on its conception and elaboration;
- Researchers should coordinate the proposal with the host Institution and with the supervisor, who agrees and whose details are included in the proposal:
- Proponents should previously study the guiding documents of the programme and the call, including the Policy background, in particular on the European side
- If the researcher has already submitted a proposal which has not been approved, the evaluation received by the EC can contain useful orientations on how to improve the proposal, i.e. which elements need to be strengthened, in order to be successful for a future application
- Proposals should be drafted keeping in mind the evaluation and award criteria, which orient the content of each section of the project. Each criterion has a different weight in evaluation, namely: Excellence 50%, Impact 30%, Implementation 20%. Such criteria are detailed in sub criteria which contain important elements which have to be addressed and highlighted in the project;
- Researchers can ask the NCP network or EURAXESS Brazil for support and guidance on technical issues or for networking and matchmaking purposes.
- Follow the orientations for project elaboration detailed in the IF "Guide for Applicants" and see practical tips in the Net4Mobility "Survivor's Guide to MSCA-IF"

Brazilian Researchers and Brazilian Institutions are strongly encouraged to apply to MSCA, as Brazil is a strategic cooperation country for the European Union, and Mobility schemes are a strong asset in this dimension.



Daniel Praeq is Swiss national and researcher in marine geoscience who was born in Canada and has worked in several countries. He first went to sea as an Undergraduate student and as pre-doctoral with the researcher Geological Survey of Canada, before taking a PhD (1997) in Scotland. This was followed by post-doctoral research in Ireland (University College Dublin). and a research position in Italy (Trieste). Since May 2016 he has been an MSCA global fellow in Porto Alegre, Brazil, detachment from a host institute in France (Géoazur, Nice). He has taken part in oceanographic campaigns in the Canadian Arctic, the North and South Atlantic Ocean and the Mediterranean

He speaks English, French and Italian, and is currently learning Portuguese.



Interview with Daniel PRAEG, Swiss researcher currently in Brazil with a Marie Sklodowska Curie Actions (MSCA) global fellowship

Could you tell us more about your research and research career so far? What made you come to Brazil? With which initiative or funding?

I am originally a glacial geologist, with an interest in the behaviour of ice sheets on continental margins, but I became interested in other offshore cryospheric processes. My current research focuses on gas hydrates, ice-like compounds that concentrate and trap greenhouse gases (mainly methane) in deep-sea sediments and are thought to form the largest carbon reserve on Earth. These often occur in association with seafloor features of fluid venting, such as mud volcanoes and pockmarks, the functioning of which are poorly understood. I studied such phenomena in the Mediterranean Sea as a researcher in Italy, in collaborations that included researchers from France (Géoazur, Nice) and Brazil (PUCRS, Porto Alegre). A desire to work more closely with these groups, who have complementary skill-sets (and enthusiasms), led me to propose an MSCA IF global fellowship, project SEAGAS. The project involves two years in Brazil (2016-2018) and an obligatory 'return' year in France (2018-2019). Administratively, I am at PUCRS on detachment from Géoazur; As I was previously in Italy, this is interesting as it means that I am technically a French researcher, who has yet to live in France!

Tell us a little bit more about the application process (MSCA/IF).

You have to think long-term in regard to a candidacy, as there is only one call per year, and evaluation takes about five months. In addition, it takes time to prepare a competitive proposal. The essential starting point is the Guide for Applicants for the call (available through the Participant Portal). Reading it for the first time is already part of the learning curve, as the guide embodies a basic concept: An MSCA project is not only about excellent research, but about its integration with skills training and career development for the researcher, in the context of the European Research Area (ERA). You are asked to speak about things beyond the research you wish to do, which can require its own form of skills development! It can be helpful to seek additional information and critical feedback, from European Commission or university support groups with experience in preparing proposals. It is also important to note that if a proposal is unsuccessful, comments on the Evaluation Summary Report can be helpful in preparing a resubmission, which is encouraged. My own project succeeded on its second submission.

What would you say to EU researchers and Brazilian research institutes to encourage them to apply for this grant?

First, I would point out that there are two types of MSCA IF grants, of which one is open to Brazilian researchers for mobility to Europe (IF-EF). I have come to Brazil with a global fellowship (IF-GF), which requires a 3-way partnership between an EU researcher and host institutions with complementary skills in Brazil and Europe.

I would tell researchers that the rewards are scientific independence for up to 3 years, while acquiring new skills both scientifically and culturally, and developing an international network of contacts that can promote further Euro-Brazilian collaborations. For research institutes in Brazil, there is the opportunity to attract externally-funded researchers and to build trans-Atlantic collaborations. It is also worth noting that Brazilian research institutes can invite EU researchers to apply for projects that they think may be of trans-Atlantic interest, in the context of existing or desired collaborations with EU partners.

What are the challenges of doing research in Brazil as a foreigner? Could you tell us more about your personal views on working in Brazil and with Brazilian researchers?

I think the experience of working in any country depends in part on the background of the visiting researcher. I have lived and worked in both northern and southern European countries, which differ in their cultures, including their outlooks and expectations regarding work. I enjoy the greater importance given to personal relationships in southern cultures, which may be why I find it fairly natural to work in Brazil. Also, it is in the nature of my MSCA GF project that I am in Brazil to work with my colleagues, in a research collaboration that is in our common interest. I think Brazil is quite open to equal partnerships.

In your opinion, what could be done to further enhance the mobility of international researchers?

I think it would be useful to have more schemes to fund the mobility of PhD students from Brazil to Europe, and vice versa. At post-doctoral level, it could be useful to have co-funded schemes in which the researcher applies directly to the Brazilian research institute, as opposed to the MSCA IF scheme in which all funds are controlled by the European host. There are also inherent challenges in the areas of taxes and pensions, which despite the existence of some international schemes still end up becoming issues for the individual researcher. For instance, I have worked in four countries to date, each of which will administer a portion of my pension; When I retire I risk spending all my time trying to understand what to do to obtain it!

In your opinion, how important is incoming mobility to internationalise Brazilian science?

I find Brazilian researchers to be quite international in their outlook, due to outgoing mobility funded through national programmes such as *Ciência sem Fronteiras*. Incoming mobility may be helpful to maintain that outlook and foster new collaborations, especially in a time of reduced national funding.





Estonia is a small North European country and it has been a member of the European Union since 2004.



Promotional page about Estonia: www.estonia.ee.



University of Tartu

Promotional page about Research in Estonia

Umbrella organisation uniting researchers, scholars and intellectuals: <u>Estonian</u>
<u>Academy of Sciences</u>

[1] http://www.stat.ee/science-technology-innovation [2] http://blog.ut.ee/how-successful-is-estonian-science/ [3] http://www.stat.ee/news-release-2016-132 [4] Estonian Research and Development and Innovation Strategy 2014-2020 "Knowledge-based Estonia"

3 EURAXESS members in focus: ESTONIA – a place for independent minds

Did you know that Skype was programmed in Estonia in 2003? Or that Estonia has used legally binding digital signatures since the year 2000? These facts illustrate the innovative attitude of the small North European country called Estonia perfectly. Estonia has an attractive environment for research, top-level infrastructure, a collaborative research community and excellent research achievements.

Research and Development in Estonia

Estonian researchers are good partners in international collaboration projects and the number of international co-publications is rising. Research in Estonia is becoming more international as the number of foreign researchers from 2005 to 2014 has increased **sevenfold**¹. The impact of papers authored by Estonian researchers is growing rapidly; average citations per paper exceed the Thomson Reuters' Essential Science Indicators (ESI) mean citation rate by 5%².

There are 20 R&D institutions in Estonia, including <u>6 public universities</u> where most research is performed. The leading scientific institution in Estonia is the <u>University of Tartu</u>.

The ratio of total R&D expenditure to GDP in 2015 was 1.5%, with nearly half of R&D expenditure in 2015 coming from the state budget³.

Research Excellence in Estonia

Biological sciences are at the forefront of Estonian research – 2/3 of the top researchers (among 1% most cited in their field worldwide) who are affiliated with an Estonian research institution are **biologists** and **ecologists** [2]. Each Estonian paper published in environment/ecology and plant and animal science receives about 40% more citations than papers in these fields in general. Additionally, clinical medicine, molecular biology and genetics, physics, pharmacology and toxicology, and psychiatry/psychology are also above global average [2].

There are 12 Research Centres of Excellence in Estonia, composed of internationally highly regarded research groups. Featured topics are: terrestrial ecosystems in the context of global change from molecular to biomelevel responses, genomics and translational medicine, information and communication technologies (ICT), molecular cell engineering, space studies.

Estonian R&D Strategy

The Estonian R&D strategy document **Knowledge-based Estonia 2014–2020** outlines four objectives: 1) Research in Estonia is of high level and diverse 2) RD functions in the interest of Estonian society and economy 3) RD makes the structure of economy more knowledge-intensive 4) Estonia is active and visible in international RDI cooperation. The strategy foresees that by 2020 investments in R&D will reach 3% of GDP⁴.



How Skype started in Estonia, read <u>The Story of Skype</u>

<u>e-Estonia – The Digital</u> Society

Enterprise Estonia supporting and advising businesses



The main funding body is the Estonian Research Council.



Information and support for incoming researchers on EURAXESS Estonia

EURAXESS - Researchers in Motion is an initiative of the European Research Area (ERA) that addresses barriers to the mobility of researchers and seeks to enhance their career development. This pan-European effort is currently supported by 40 countries, of which we will profile one in our quarterly enewsletter. In this edition, we zoom in on Estonia. Author: Hanna Raig. **EURAXESS** Estonia and Estonian Embassy to Japan

Entrepreneurship and Innovation

Innovation and the start-up ecosystem in Estonia are growing rapidly. Notable recent success stories backed by R&D in the IT field include Skype, TransferWise, Lingvist, Starship Technolgies and Guardtime.

Among Estonian priorities, the ICT sector --including cybersecurity-- is by far most the prominent. Estonia is standing out as a **digital society**. We have developed highly innovative and practical solutions for digital **public services** including online tax-declarations (in use since 2000), digital signatures (2000), online voting (2005), digital recipes (2010), and most recently the e-residency (2016) for anyone in the world (you can become an <u>e-resident</u> of Estonia in order to register your business in Estonia, thus gaining full rights to do business in Estonia and in most European Union countries). More than 17,000 individuals from 130 countries registered for e-residency, and the number keeps growing fast. This enables Estonia to foster entrepreneurship and innovation.

<u>Competence Centres (8)</u> are designed to improve the competitiveness of enterprises through strategic cooperation between Estonian science, industry and the public sectors. Main topics are health and food technologies and ICT services.

<u>Enterprise Estonia</u> promotes business and provides financial assistance, counselling, cooperation opportunities and training for entrepreneurs, research institutions and the public and non-profit sectors.

Funding and Recruitment Opportunities

Research in Estonia is primarily financed on the basis of **quality competition**. Financing comes from the state budget, foreign funds (mostly EU H2020 and other means) and companies. The <u>Estonian Research Council</u> is the principal funding body of R&D in Estonia, consolidating different grants and types of funding and giving research more visibility within society. There are also several **mobility grants**. Click here for the funding calls.

As most research is performed in the public universities, most research jobs are also available in public universities. PhD students are regarded as students and receive a monthly scholarship.

Important Information for Incoming Researchers

<u>EURAXESS Estonia</u> provides information and support to international researchers for free. We provide information about **entry conditions**, visas and **residence permits**, Estonia in general, the Estonian research landscape, **job & funding offers**, events for researchers and much more!

Brazilian citizens can stay in Estonia visa free for 90 days but for working and long-term stays they require a hosting agreement and a residence permit. See all Estonian embassies and representations around the world.

EU Council presidency

Estonia will be holding the EU Council presidency in the second half of 2017. In STI field it would mean more Digital Europe and the concept of free flow of data (in addition to 4 classical EU freedoms). EU must exploit the benefits of technological progress that is bringing continuous change to citizens, businesses and governments. For this purpose, we will need to focus more on developing cross-border e-commerce and e-services for the benefit of consumers, producers and businesses and ensuring modern and secure electronic communications available everywhere across Europe as well as creating a favourable environment for new innovative services.



Winter in Estonia

Nemailla Bonturi

Researcher in Microbial Cell Factories, University of Tartu



At my workplace in the Botanical Garden in Tartu

Jhonny Capichoni Massante

PhD student of Plant Ecology and Ecophysiology, University of Tartu

Interview with Brazilian researchers in Estonia

How did you hear about Estonia and why did you decide to work in Estonia?

Nemailla Bonturi: To be honest, I didn't know much about Estonia or had this country in my plans while I was looking for a job last year. In May 2016 on the EURAXESS portal I saw an open position as a Researcher in Microbial Cell Factories at the University of Tartu in Estonia. The job description matched perfectly my field of activity and interests, which led me to look further into Estonia. By doing so I was amazed by its old and rich history, by how fast this country has developed in the last decades, the quality of life here, and by the prestige of this university (top 3% of the world best universities). After that it was easy to accept the position here when it was offered to me.

Jhonny Capichoni Massante: Honestly, I heard about Estonia when I was 12 years old in my school. I have an professional account on Twitter where I saw an opportunity to do a PhD at the University of Tartu. I had never heard about this university; however the topic was very interesting. I researched about the university and was very surprised to find out about its reputation: One of the best universities in the world! Then, I thought: Why not? Everything went okay and here I am now!

Name three characteristics about research work in Estonia or about Estonia in general.

NB: In my opinion the main characteristics of doing research in Estonia are: investments, ambitious goals and the recognition of the importance of a scientist's work.

JCM: As for my experience, here things are super organised. And work well. Estonian people are extremely efficient! Working here is enjoyable! I think that this results from those aspects mentioned above.

A message to anyone who is considering research work with Estonian partners or moving to Estonia for work?

NB: First of all, it is not that cold! Second, I think Estonia is putting a lot of effort into internationalisation and welcoming foreigners, which is much better than building walls. I hope you can join me in this delightful challenge of living and working here.

JCM: Do it! If you have no trouble with the weather and if you like different cultures, then here is a good place to work and live. Also, if you do not intend to move here, I would recommend working with Estonians. You certainly will like the exchange and work experience with them!

4 EURAXESS Brazil activities

4.1 <u>EURAXESS Brazil commemorates ERC 10th</u> anniversary, Rio de Janeiro, 6 April 2017

Celebrate the European Research Council's 10th anniversary with EURAXESS Brazil and discover research opportunities in Europe!

ERC grant schemes will be presented, as well as opportunities offered by the Brazilian Council for the State Funding Agencies (CONFAP) under the European Commission - Confap implementing arrangement.

The event will be hosted by the Brazilian Academy of Sciences in Rio. It will feature presentations and exclusive testimonials by Brazilian researchers who were awarded ERC grants or who are ERC team members.

4.2 Tour of Brazil event at FAUBAI Conference 2017

EURAXESS Brazil coordinates a **Tour of Brazil event at the FAUBAI Conference 2017.** The aim is to present European collaboration opportunities for Brazilians HEIs, researchers and students and to introduce these to international managers of Brazilian Higher Education institutions (HEIs),

The Tour of Brazil event will include two sessions:

 How Brazilian institutions can host a Marie Skłodowska-Curie research Fellow, Monday, 10 April 2017, 14:00 - 15:30

This session will focus on cooperation and mobility opportunities under European Commission programmes, complemented by a training session on How to host Marie Sklodowska Curie research fellows for up to two years. The possibility is given through the Marie Sklodowska-Curie action individual fellowship / global fellowship. The call will open on 11 April 2017.

■ <u>EU-Brazil HEIs cooperation: results and concrete opportunities</u>-Discussion with EU Member states, Tuesday, 11 April 2017, 11:00 - 12:30

This session will consist of a roundtable discussion with participation of representatives of Belgium, Denmark, France, Germany, Italy and Spain.

4.3 Workshop on Funding opportunities for Brazil-Europe mobility and cooperation, FAPESP, 8 March 2017

EURAXESS Brazil and Fapesp organised a workshop to highlighted funding possibilities by FAPESP within the framework of Horizon 2020 cooperation and by the European Commission (Horizon 2020, ERC and MSCA, as well as EURAXESS) to undertake doctoral, postdoctoral or research projects in Europe.

A special emphasis was given to MSCA Rise call, with the MSCA National contact point for Brazil sharing practical tips on how to prepare a proposal and a Brazilian researchers sharing his experience as part of a RISE project.



FAUBAI Conference 2017

takes place in Porto Alegre, Rio Grande do Sul, from 8 to 12 April 2017.





All presentations available at: http://bit.ly/FAPESP Workshop 080317.

Watch the videos of the event on <u>EURAXESS Brazil</u> channel on Youtube.

4.4 <u>Looking for funding opportunities?</u> EURAXESS can help you!

<u>EURAXESS Brazil list of open calls</u>: our compilation of grants & fellowships funded by the European Commission, EU Member States or Brazilian authorities to fund researchers' mobility and cooperation with European teams. The latest edition is available here: Funding opportunities - March / April 2017

EURAXESS Funding database

Individual researchers: search for the funding programme you need for your mobility or research cooperation project.

Funding organisations: publish your funding opportunities and scholarships to increase your visibility and reach the best candidates worldwide.

4.5 In case you missed our Flashnotes

WEBINAR - How to build a MSCA / RISE proposal to exchange research and innovation staff with EU partners ? (recording available)

Calls open to Brazilians in Italy

Call open in Spain: Fundación Carolina incoming fellowships for Ibero-American students

<u>Call open: Coimbra Group Scholarship Programme for Young Professors and Researchers from Latin American Universities (short term, incoming)</u>

International Women's day- interviews of women researchers in Brazil and beyond

Interview with Marcela Uliano da Silva, Brazilian computational biologist, TED fellow and MSCA grantee

Interview with **Ana Paula Bortoleto**, researcher at the University of Campinas and former MSCA Fellow

EURAXESS Brazil becomes CELAC

MSCA RISE Call factsheet

