

EU Referendum – Leave: What next for UK social science

On June 23rd, Britain voted to leave the European Union. This will result in uncertainty for the social science community, with implications for **research funding, international collaboration, freedom of movement, and capacity building**.

The Academy of Social Sciences and its Campaign for Social Science believe the UK Government will need to consider the implications for UK research in its post-referendum negotiations if UK research excellence is to be protected.

The current situation

I. **Social Science Funding and the EU**

I. The UK social science community has benefitted from EU research funding, and has outperformed social sciences in other EU member states, and in comparison to other disciplines in the UK, as detailed in Professor Linda Hantrais FAcSS' [Academy Professional Briefing](#) on the 'Implications of the EU Referendum for UK Social Science.'¹

a. *EU Research funding in general*

- Overall, between 2007 and 2013 the UK received an estimated €3.4 billion *more* than it paid into the EU in terms of funding for research, development and innovation activities, primarily through the EU's Framework programmes, and to a lesser extent through EU Structural Funds designated for research & development.²
- The UK received the second largest proportion of Framework Programme 7 funding in relation to the size of our economy as measured by GDP, 71% of which went to universities,³ and ranked second in terms of both the number of participants and budget share of signed grant agreements as of 2014.⁴
- The UK currently has the largest share of signed grant agreements among participating countries in the Horizon 2020 framework programme.⁵

b. *Research income for universities:*

- In general, EU sources of funding have risen steadily both in real terms and as a percentage of total research grants and contracts for UK HE institutions, and now account for over 14% of the latter. Funding to HEIs from the BIS Research Councils, the British Academy, the Royal Society, and the Royal Society of Edinburgh has declined in percentage terms (to just over 30%) in the past eight years, largely as a result of austerity following the financial crisis.⁶ In absolute terms, research funding for UK HEIs from EU sources (including research grants under Framework and other agreements and other EU sources as defined by HESA)⁷ rose from £331 million in 2007/08 to £836 million in 2014/15.⁸
- The Research Excellence Framework (REF) 2014 panel overview reports show that **EU funding of social science** research has risen

steadily since the financial crisis, and appears to be outpacing a similar rise in other disciplines.⁹

- This growth in EU government funding came at a time when the social sciences face not only a decline in research council funding, but also a decline in UK government departmental funding that is greater than in the other disciplines.¹⁰
- The UK social science community has been particularly successful in obtaining European Research Council funding, ranking first among EU member states for total ERC starting grants between 2007 and 2015, and first in total advanced awards between 2008 and 2014.¹¹
- A large proportion of agreed projects under Horizon 2020 are tagged as involving social science and the humanities (SSH), although not all of these are pure research projects or solely on SSH topics, and just 25% of 'projects funded under the SSH-flagged topics in the Societal Challenges and the LEIT [Leadership in Enabling and Industrial Technologies] parts of Horizon 2020 are coordinated by an SSH partner.'¹² The UK leads (or comes in second, or tied for second) in terms of the most represented country across all 7 societal challenge areas and the LEIT Information and Communication Technologies project.¹³

2. **International Collaboration**

International collaboration has had a positive effect on research impact.

- a. [A recent Digital Science report](#) found that, while UK research output has increased significantly over the past 35 years, a significant portion of this overall growth has been due to international collaborations, which now account for over half of UK research output. Interestingly, while the growth in volume of STEM research in the UK is primarily from international collaboration, the rise in volume of UK social science research is due to *both* increased domestic output and a rise in international collaboration.¹⁴
- b. The report also found that 'the UK's research collaboration with Europe has increased at a faster rate than with other partners and now covers more than half of all collaborative papers.'¹⁵
- c. In addition, the report found that research publications resulting from international collaborations had greater citation impacts relative to the world average; these were 42% higher in 2001, increasing to 52% higher in 2011.¹⁶
- d. This is a reminder of the importance of collaboration for the social sciences in particular. [A 2013 report prepared by Elsevier](#) for the UK's Department of Business, Innovation, and Skills (BIS) found that UK research had broadly seen an increase in its field-weighted citation impact over time, 'with the exception of Social Sciences, Business, and Humanities',¹⁷ where sole-authored papers have traditionally been the norm.

3. Freedom of Movement

- I. UK higher education and research communities have benefitted from freedom of movement as a result of membership of the EU.
 - a. The UK has benefitted from access to a pool of international talent:
 - 15% of all academic staff at UK HE Institutions are non-UK EU-domiciled (in total 27% of academic staff are from outside the UK).¹⁸ In the social sciences, 16% of all teaching and research staff are from elsewhere in the European Union (in total, 28% of social sciences academic staff are non-UK).¹⁹ For the categories of ‘science and maths’ and ‘engineering and technology’ combined, the figures are 19% and 36% respectively.²⁰
 - Participation in EU Framework Programmes has enriched the talent pool for UK research, particularly through [Marie Skłodowska-Curie actions](#), which have attracted top talent to the UK and allowed UK researchers to engage in a larger interdisciplinary research community.²¹
 - b. Ease of travel has meant the opportunity to do field research within Europe, enabling UK postdoctoral researchers to find research and teaching jobs abroad, facilitating international collaboration.
 - c. UK higher education institutions have benefitted from the recruitment of EU students:
 - Foreign students ‘generate nearly £11 billion for the UK economy, and all UK regions benefit’ through student fees and spending in the local economy.²²
 - 6% of all students in UK higher education are from the European Union, and EU students make up 29% of all international students.²³
 - The number of EU students has decreased since 2012/13, and total non-EU (i.e., other international students) decreased in 2012/13 and 2013/14, with only slight rise in 2014/15 – even though more international students are now seeking higher education abroad.²⁴
 - d. UK students have benefitted from the Erasmus+ programme, which has been shown to improve their employability²⁵, while also providing more intangible benefits.²⁶ Although the number of students from other EU member states who travel abroad is far greater than the number of UK students, both categories have been trending upwards.²⁷

4. Capacity Building & Research Excellence

- I. UK social scientists have contributed to, and benefitted from, capacity building efforts within the European Union.
 - a. Overall, ‘the UK punches above its weight as a research nation’ in terms of its expenditure on research versus its impact globally,²⁸ and social science research is a particular source of excellence within this broader community.²⁹
 - b. UK social science has played an important role in contributing to the development and capacity building projects incorporated in the 7th Framework Programme, participating in 8 out of the 11 projects recently highlighted by the European Commission as examples of the ‘intense scientific collaboration [that] directly contributes to scientific capacity building in developing countries’.³⁰

Implications for the future:

In light of the UK referendum decision to leave the European Union, many of these benefits – in funding and research income, international collaboration, freedom of movement and capacity building – are at risk. Concerted action will be needed by both the UK Government and by members of our own community if UK social science research to address this risk.

I. **Research funding**

Continued access to EU sources of funding and the conditions under which UK social scientists may participate are now dependent on UK-EU negotiations.

1. Continued participation in Horizon 2020, and at what level, will depend entirely on the settlement negotiated by the UK Government with the EU. The Norwegian and Swiss arrangements offer two possible models for engagement with the EU, and whether one of these – or another model entirely – is chosen, there will be implications for UK participation in the European Research Area (ERA).
2. Like FP7, Horizon 2020 has three primary categories of national participant relevant for this discussion: EU countries, associated countries, and other third country participants.
 - a. Having determined its shape and scope, **EU countries** in total have committed over €77 billion to H2020 (to be spread over its duration from 2014-2020), and obviously have full participation rights in all aspects of the programme.³¹
 - b. **Third countries** (i.e., non-EU countries) may become ‘**associated countries**’ – but to do so they must pay into H2020 by negotiated agreement in order to fully ‘participate in Horizon 2020 under the same conditions as EU Member States’.³² Associated countries have the same eligibility for funding as EU member states, their researchers can be principal investigators who lead projects, and their institutions may host principal investigators.³³ However, that even though they pay into the Framework, associated countries have no formal role in deciding (i.e., voting on) its content or direction, though they may attempt to influence this during the consultative phase. Associated countries can be those in the process of EU accession, EFTA countries, or states that had been previously associated with FP7 according to Article 7 of the H2020 regulations.³⁴ Fifteen countries held this status as of 29 April 2016.³⁵
 - c. **Other** third country participants must negotiate separate bi-lateral agreements with the EU, but are ‘*not* automatically eligible for funding’, and instead ‘have themselves to determine the sources of funding and find the resources for their part of the action’ of H2020 within which they wish to participate.³⁶ Nationals of this category of third country non-associated participants may, for example, apply to be principal investigators for European Research Council projects, but only if they are ‘engaged and hosted by a Host Institution based in an EU Member State or an Associated Country for the whole duration of the grant.’³⁷
3. As members of the European Free Trade Association (EFTA), both Norway and Switzerland have been able to participate in the European Research Area as ‘associated countries’ in the past. This means they have had to pay into the Framework Programmes in order to participate, without any *formal* input into the content and

direction of the FPs themselves, but they have been automatically eligible for funding, and could lead and host particular projects. Differences in their models of engagement with the EU have however had consequences for their participation in the ERA – leading to Norway’s continued participation as a fully associated member in H2020, while Switzerland’s changed political stance on freedom of movement means that it is now only partially associated with H2020, and may by next year be reduced to a third country participant. Why is this?

- a. Norway is not only a member of EFTA, but of the more closely bound European Economic Area (bringing it into the Single Market). As such, it adopts changes to EU law and directives as they occur.³⁸ Moreover, ‘the nature of the agreement signed between Norway and the EU means that terms do not need to be renegotiated with each new Framework Programme’,³⁹ because this is provided for in Part IV of the EEA Agreement,⁴⁰ and Protocol 31 of that Agreement.⁴¹ As associated members from the EEA, Norway and Iceland together contributed over €2 billion to Horizon 2020, and are full participants in all of its areas (with the exception of Euratom).⁴² Norwegian researchers, for example, have just been awarded €5.7 million to lead on a marine environment monitoring project under H2020.⁴³ Though unable to vote on decisions made regarding the direction of H2020, as an EEA EFTA country Norway has been able to participate in the Open Method of Coordination process, allowing it to help ‘shape decisions’ and ‘develop good practice.’⁴⁴
- b. The Swiss model is different. They are members of EFTA, but not the EEA, and thus do not participate in the EEA agreement that provides for association in the Framework programmes. They agree to adopt EU laws and directives only in batches, rather than adopting them as they are made.⁴⁵ When the Swiss voted to curb migration and declined to adopt freedom of movement for Croatian citizens in February 2014, the European Commission announced in that there would be ‘consequences for its participation into the internal market and more generally for EU-Swiss relations.’⁴⁶ The impact on Swiss participation in Horizon 2020 was swift. As a result of their actions to limit freedom of movement, they are currently only *partially* associated with H2020.
 - They are considered an associated country only for some aspects of Horizon 2020, namely, ‘in the Excellent Science pillar and Spreading Excellence programme - allowing Swiss partners to receive direct funding from the EU.’⁴⁷ For all other aspects of Horizon 2020 they are now considered a third country party, meaning that they are not automatically eligible for funding, cannot host projects, and it is far less likely (for practical and political reasons) that their researchers will be able to act as principal investigators.
- c. This is the situation until the end of 2016 – at which point the Swiss must choose either to become a fully associated member for Horizon 2020 as a whole or not, but this ‘choice’ is conditional on their decision regarding freedom of movement.⁴⁸ Meanwhile, the Swiss government has had to give an undertaking to fund fully the participation of Swiss researchers for those parts of Horizon 2020 for which they are no longer associated, to make good the shortfall.⁴⁹

4. Thus, the inability to be a full 'associate' of the framework programmes like Horizon2020, has implications not only for funding, but also for research leadership.

2. *International collaboration*

1. Irrespective of funding, the referendum result poses distinct challenges for the UK social science community's ability to maintain the current level of UK engagement with European research. The EU research frameworks, and other research programmes, have provided an accessible platform for international collaboration. UK social scientists helped construct research agendas and exercise research leadership as well as benefitting from funding and opportunities for collaboration.
2. Depending on the settlement agreed with regard to the conditions for any UK access to EU research funding, some of these opportunities may remain in place, though the UK research community will no longer have the same say over the direction of these platforms or their content, and may not have the same leadership opportunities on individual projects depending on their level of association.
3. No matter what the settlement looks like, UK academics and researchers will need to work hard to build new networks and pathways for international collaboration if we are to retain the impact we already enjoy, much less improve it. This will require capacity building of networking skills among UK academics, the building of outreach programmes at HE and other research institutions, and the funding of greater opportunities for field research and international conference attendance.

3. *Freedom of movement*

1. The decision to leave the European Union will have an effect on the freedom of movement of our academic, research, and student communities. There is a question of whether any negotiated settlement would, like Norway's, allow continued participation in programmes like Erasmus+ for our students to be able to study abroad, and to facilitate EU students to continue to study in the UK.
2. In a global labour market for science and research, UK HEIs will still want to hire the best talent to teach and work at our higher education and research institutions. Post-referendum immigration policy will need to consider safeguards to permit hiring of the strongest possible talent for UK positions, including for instance the exemption to the salary floor of £35,000 for Tier 2 visas for those working at HE institutions. Providing new and additional safeguards to protect a withdrawal of EU talent from the UK may also be needed, including a similar exemption for other skilled educators and highly-skilled scientific and social science researchers in other research institutions.

4. *What next?*

1. The **UK Government** will need to decide the terms on which it wishes to negotiate continued access to participation in EU-funded research.
 - a. A first issue will be the nature and structure of access to Horizon 2020 funding and beyond, including the conditions applying to UK research applicants. This will be affected by policy decisions on whether or not the UK becomes an EFTA EEA country, and how it approaches free movement, as with Switzerland.

- b. A second issue will be whether the UK government will (as Switzerland does) make good any shortfall in funding if the terms of access do not allow UK researchers access to EU funding, even if they are allowed to take part in projects as third party countries.
- c. The UK government will also need to consider how to mitigate the impact on the freedom of movement of international social science research talent into the UK, by ensuring that future immigration policies do not pose unreasonable barriers to entry to UK academic posts and to specialist social science research posts outside academe.
- d. The UK government will also need to consider whether EU students, at undergraduate, postgraduate and post-doctoral levels, will continue to have access to UK HEIs on the same terms as UK students.

2. The **UK social science community** will itself need to take steps to:

- a. Mend fences following the heated debate of recent months, and consider how to continue and develop fruitful research collaborations with European peers.
- b. Consider how to foster programmes that allow members of the international research and student communities, particularly those hailing from the EU, to study and work in the UK in order build the relationships that advance international collaboration.

¹ Linda Hantrais, FAcSS. 2016. 'The Implications of the EU Referendum for UK Social Science.' Professional Briefing #8, Academy of Social Sciences, <http://www.acss.org.uk/publication-category/professional-briefings/>.

² The Royal Society, *UK Research and the European Union: The Role of the EU in Funding UK Research* (London: The Royal Society, 2013), 12-13.

³ The Royal Society, *UK Research*, 15 & 18.

⁴ DG Research, *Seventh FP7 Monitoring Report, Monitoring Report 2013* (Brussels: Directorate-General for Research and Innovation – Evaluation Unit, 2015), Annex F.

⁵ 'Cordis, Community Research and Development Information Service,' European Commission, accessed May 31, 2016, http://cordis.europa.eu/projects/home_en.html.

⁶ See HESA Finance Plus Press Releases 2007/2008 through 2014/15, available at: <https://www.hesa.ac.uk/PR229>, <https://www.hesa.ac.uk/pr/3488-press-release-213>, <https://www.hesa.ac.uk/pr201>, <https://www.hesa.ac.uk/pr188>, www.hesa.ac.uk/pr174, <https://www.hesa.ac.uk/pr157>, <https://www.hesa.ac.uk/circulars/288-statistics/intros/1718-resintro0809>, <https://www.hesa.ac.uk/circulars/288-statistics/intros/1466-res0708>.

⁷ Within EU-sources, HESA identifies EU government bodies, EU based charities, EU industry, commerce, and public corporations, as well as other EU sources. Further details of how these elements are defined are available at: <https://www.hesa.ac.uk/component/content/article?id=2883#res>.

⁸ HESA Finance Plus press releases 2007/2008 through 2014/15.

⁹ 'REF 2014 Panel Overview Reports,' REF 2014, accessed May 31, 2016, <http://www.ref.ac.uk/panels/paneloverviewreports/>. See especially: *Research Excellence Framework 2014: Overview report by Main Panel C and Sub-panels 16 to 26* (REF 2014), 23-24.

¹⁰ 'REF 2014 Panel Overview Reports,' REF 2014, accessed May 31, 2016, <http://www.ref.ac.uk/panels/paneloverviewreports/>. See especially: *Research Excellence Framework 2014: Overview report by Main Panel C and Sub-panels 16 to 26* (REF 2014), 23-24.

¹¹ 'Basic statistics for ERC funding activities,' European Research Council, accessed May 31, 2016, <https://erc.europa.eu/projects-and-results/statistics>.

¹² DG Research, *Integration of Social Sciences and Humanities in Horizon 2020: Participants, Budget and Disciplines: Monitoring report on SSH-flagged projects funded in 2014 under the Societal Challenges and Industrial Leadership*. (Brussels: Directorate-General for Research and Innovation, 2015), 13.

- ¹³ DG Research, *Integration of Social Sciences and Humanities in Horizon 2020*, 21-40.
- ¹⁴ Data source: Thomson Reuters Web of Science; analysis courtesy of Digital Science.
- ¹⁵ Digital Science, *The Implications of International Research Collaboration for UK Universities*, (London: Digital Science – Digital Research Reports, 2016), 2-3, accessed May 31, 2016, <https://www.digital-science.com/resources/digital-research-reports/digital-research-report-the-implications-of-international-research-collaboration-for-uk-universities/>.
- ¹⁶ Digital Science. *The Implications of International Research Collaboration*, 3.
- ¹⁷ Elsevier. *The International Comparative Performance of the UK Research Base: a report prepared for the UK's Department of Business, Innovation and Skills (BIS)* (London: Elsevier, 2013), accessed May 31, 2016, https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/263729/bis-13-1297-international-comparative-performance-of-the-UK-research-base-2013.pdf.
- ¹⁸ HESA, *Staff in Higher Education* (Cheltenham: HESA 2015). (Numbers compiled by Universities UK).
- ¹⁹ HESA. *Staff in Higher Education*. (Numbers compiled by Universities UK).
- ²⁰ HESA. *Staff in Higher Education*. (Numbers compiled by Universities UK).
- ²¹ *Government Review of the Balance of Competences between the United Kingdom and the European Union* (Joint National Academies Submission to the Department of Business, Innovation & Skills Call for Evidence on Research and Development, 2013), 2.
- ²² International Unit, *International Higher Education in Facts and Figures* (London: Higher Education International Unit, 2015), 28.
- ²³ 'Free Online Statistics - Students & qualifiers', accessed May 31, 2016, <https://www.hesa.ac.uk/stats>. (See: Student Publication, Table B).
- ²⁴ Universities UK, *The Funding Environment for Universities 2014: International Students in Higher Education: The UK and Its Competition* (London: Universities UK, 2014), 11; and 'Free Online Statistics - Students & qualifiers', accessed May 31, 2016, <https://www.hesa.ac.uk/stats>. (See: 'Region of domicile of non-UK domicile students').
- ²⁵ European Commission, *The Erasmus Impact Study: Effects of mobility on the skills and employability of students and the internationalisation of higher education institutions* (Luxembourg: Publications Office of the European Union, 2014), http://ec.europa.eu/education/library/study/2014/erasmus-impact_en.pdf. See also: International Unit, *Gone International: the value of mobility; Report on the 2013/14 graduating cohort* (London: UK Higher Education International Unit, 2016), accessed May 31, 2016, <http://go.international.ac.uk/gone-international-2016-value-mobility>.
- ²⁶ 'The Guardian view on cultural ties and Europe: in praise of shared values and ideals,' *The Guardian*, May 30, 2016.
- ²⁷ International Unit. *International Higher Education in Facts and Figures* (London: Higher Education International Unit, 2015), 16.
- ²⁸ Elsevier. *The International Comparative Performance*.
- ²⁹ Elsevier. *The International Comparative Performance*.
- ³⁰ DG Research, *Open the Door: Social Science Research for Development and a Sustainable Future* (Brussels: Directorate-General for Research and Innovation, 2015), accessed May 31, 2016, https://ec.europa.eu/research/social-sciences/pdf/project_synopses/ki-na-27-321-en.pdf.
- ³¹ 'EU Programmes with EEA EFTA Participation,' European Free Trade Association, accessed May 31, 2016, <http://www.efta.int/eea/eu-programmes>.
- ³² 'Participant Portal H2020 Online Manual, International Cooperation,' DG Research & Innovation, European Commission, accessed May 31, 2016, http://ec.europa.eu/research/participants/docs/h2020-funding-guide/cross-cutting-issues/international-cooperation_en.htm.
- ³³ The participant portal of the European Commission's Research & Innovation website, defines a 'Host institution' as 'the applicant legal entity that engages and hosts the Principal Investigator', which 'is established in a Member State or an Associated Country.' ('Participant Portal, Support,' DG Research & Innovation, European Commission, accessed May 31, 2016, http://ec.europa.eu/research/participants/portal/desktop/en/support/reference_terms.html.)
- ³⁴ Article 7 also states that 'Specific terms and conditions regarding the participation of associated countries in Horizon 2020, including the financial contribution based on the GDP of the associated country, shall be determined by international agreements between the Union and the associated countries. The terms and conditions regarding the association of the EFTA States that are party to the Agreement on the European Economic Area (EEA) shall be in accordance with the provisions of that Agreement.' (Regulation (EU) No 1291/2013 of the European Parliament and of the Council of 11 December 2013 establishing Horizon 2020 - the Framework Programme for Research and Innovation (2014-2020) and repealing Decision No 1982/2006/EC, available from: http://ec.europa.eu/research/participants/data/ref/h2020/legal_basis/fp/h2020-eu-establact_en.pdf.)
- ³⁵ 'Participant Portal H2020 Online Manual, International Cooperation,' DG Research & Innovation, European Commission, accessed May 31, 2016, http://ec.europa.eu/research/participants/docs/h2020-funding-guide/cross-cutting-issues/international-cooperation_en.htm.
- ³⁶ Emphasis added. 'Participant Portal H2020 Online Manual, International Cooperation,' DG Research & Innovation, European Commission, accessed May 31, 2016, http://ec.europa.eu/research/participants/docs/h2020-funding-guide/cross-cutting-issues/international-cooperation_en.htm.
- ³⁷ 'Participant Portal, Frequently Asked Questions, FAQ ID: 2918,' DG Research & Innovation, European Commission, accessed May 31, 2016, <https://ec.europa.eu/research/participants/portal/desktop/en/support/faqs/faq-2918.html>

³⁸ In other words, ‘as EU rules are made, they’re passed through a committee, and in significant cases considered by Norway’s parliament, to put into its own laws.’ (‘Norway, Switzerland and EU laws,’ Full Fact, accessed May 31, 2016, <https://fullfact.org/europe/norway-switzerland-eu-laws/>.)

³⁹ The Royal Society, *UK Research*, 10.

⁴⁰ Agreement on the European Economic Area (updated October 14, 2014), available from: <http://www.efta.int/media/documents/legal-texts/eea/the-eea-agreement/Main%20Text%20of%20the%20Agreement/EEAagreement.pdf>

⁴¹ EEA Agreement, Protocol 31 on Cooperation in Specific Fields Outside the Four Freedoms, available from: <http://www.efta.int/media/documents/legal-texts/eea/the-eea-agreement/Protocols%20to%20the%20Agreement/protocol31.pdf>.

⁴² ‘EU Programmes with EEA EFTA Participation,’ European Free Trade Association, accessed May 31, 2016, <http://www.efta.int/eea/eu-programmes>.

⁴³ ‘EU Research: Norwegian researchers to lead EU technology development for marine monitoring,’ The Research Council of Norway, accessed May 31, 2016, http://www.forskningsradet.no/en/Newsarticle/Norwegian_researchers_to_lead_EU_technology_development_for_marine_monitoring/1254006307993/p1177315753918.

⁴⁴ Report on Research and Education Programmes: The EEA and the EFTA States, Ref. 1087195, I Annex (Brussels: European Economic Area Joint Parliamentary Committee, November 4, 2008) available from: <http://www.efta.int/sites/default/files/documents/advisory-bodies/parliamentary-committee/jpc-reports/report-2008-11-04.pdf>.

⁴⁵ ‘Norway, Switzerland and EU laws,’ accessed May 31, 2016, <https://fullfact.org/europe/norway-switzerland-eu-laws/>.

⁴⁶ ‘Parliamentary Questions, 11 April 2014: Answer given by High Representative/Vice-President Ashton on behalf of the Commission,’ accessed May 31, 2016, <http://www.europarl.europa.eu/sides/getAllAnswers.do?reference=E-2014-002038&language=PL>.

⁴⁷ ‘Swiss participation in H2020,’ CERN EU Projects Office, accessed May 31, 2016, <http://cerneu.web.cern.ch/swiss-participation-h2020>. This includes, for example, ERC grants and Marie Skłodowska-Curie Actions (‘Research Infrastructures,’ EU Research: Swiss Guide to European Research and Innovation, accessed May 31, 2016, <https://www.euresearch.ch/en/european-programmes/horizon-2020/excellent-science/research-infrastructures/>.)

⁴⁸ ‘Adoption of the Initiative Against Mass Immigration and its Impact on Swiss Participation in Horizon 2020, Information as of 20 January 2016,’ Swiss Federal Department of Economic Affairs, Education and Research, State Secretariat for Education, Research and Innovation Communication, accessed May 31, 2016, https://www.euresearch.ch/fileadmin/redacteur/SERI/2016-01-20_H2020_Fact-sheet_engl-1.pdf?platform=hootsuite

⁴⁹ ‘Adoption of the Initiative Against Mass Immigration and its Impact on Swiss Participation in Horizon 2020; Information as of 26 February 2014,’ Swiss Federal Department of Economic Affairs, Education and Research, State Secretariat for Education, Research and Innovation Communication, accessed May 31, 2016, https://www.euresearch.ch/fileadmin/redacteur/SERI/2016-01-20_H2020_Fact-sheet_engl-1.pdf?platform=hootsuite.