

Policy options to increase public engagement in science and innovation within the frame of Horizon2020

The current policy brief is the fourth in a series of six published during the Engage2020 project. It looks at policy options for stimulating public engagement in research and innovation processes (policy formation, programme development, project definition and research and innovation activities) through the lens of different dimensions of policy intervention, namely rules and regulation, infrastructures and institutions, funding and incentives, communication and promotion, capacity building, and research. It also discusses possible measures for promoting public engagement within the European Research Area (ERA).

In view of one of the main Engage2020 project objectives to spread awareness of the opportunities for promoting public engagement in research and innovation (R&I) amongst policy makers, researchers, CSOs and other interested parties, six dimensions of policy intervention in the field of R&I policy making were identified, which represent coherent clusters of possible policy measures. These include rules and regulation, infrastructure /institutions/networks, funding and incentives, training, communication and promotion, and research activity. The current policy brief is based on a policy paper developed as part of the project. The policy options have been derived at by means of thorough analyses of policies and methods currently employed in the EU and beyond.

PUBLIC ENGAGEMENT POLICY OPTIONS

Rules and regulations

It is a challenging task to integrate public engagement (PE) in policy formation and programme development in the field of R&I in a functional, democratic and robust way. Any initiative in this respect should draw on the experience with participatory processes aimed at policy making and policy advice of the Technology Assessment institutions from across Europe, and as discussed in the scientific literature.

Some approaches to set up a framework conducive for PE in **R&I policy making** at the EU and at the national level include:

- making PE a mandatory part of R&I policy formation
- establishing national institutions or infrastructures focusing on public engagement, e.g. TA institutions
- implementing codes of conduct to support PE in policy making processes
- taking account of results of PE in decision making, such as introducing agenda points in committees or special meetings on PE project outcomes, which

can ensure continuous follow up on the results of PE initiatives

What is needed are **flexible and open processes of public consultation on emerging issues in the R&I policy making agenda that are nevertheless strongly embedded in the policy making process itself.**



Graphics by: Edward Andersson

A typical barrier of involving the public in **programme development** is the lack of transparency of stakeholder involvement in policy processes. Stakeholder involvement appears to be restricted to strong pressure groups whereas public interest groups (such as environmental, consumer, and patient organisations) as well as local or regional perspectives play a minor role. At the EU level, the development of standard procedures of how to involve the public would support the systematic integration of PE in the process of formulating the future research agenda of the EU, which would allow for taking account of societal needs in the operationalisation of programmes and calls. This could also be supported by including “societal impact” as a criterion in the evaluation of research programmes. Another approach to better integrate PE

in programme development is including civil society representatives in programme boards and committees.

Providing the public at large with access to research data will improve their involvement in **R&I activities**. Furthermore, certain practices would further motivate researchers to consider PE as part of their professional activities, such as including PE in codes of conduct for good scientific practice and launching EU wide agreements on standards to support PE initiatives on the project definition level and on the level of R&I activities.

Infrastructures and institutions

Setting up PE infrastructures and institutions is relevant at the EU and at the national level, as well as at the organisational level. In order to counterbalance the existing structures of expert and stakeholder councils and boards in R&I policy making, civil society councils need to be established and have a say on research agendas in the EU and its member states. It is also important to monitor the “impact” of these bodies on R&I policy making.

Establishing platforms and competence centres for supporting PE networks, for connecting researchers and citizens and for supporting PE activities with practical expertise needs to be supported by relevant governmental agencies, research funding organisations as well as CSOs and single R&I institutions. For the latter it is important to open up (or at least complement) the existing disciplinary research structures by establishing structures enabling interdisciplinary, problem oriented and community related research. Contact points for citizens interested to actively take part in research or with a need for scientific advice or support could be attached to these structures.

Promoting PE in research and innovation in Europe would also require supporting the existing networks of engagement (e.g. by supporting conferences or training programmes) and widening their scope through supporting multi-actor and inter-disciplinary PE (e.g. by supporting pairing schemes for already established PE/TA institutions and institutions which are currently being developed).

Funding and Incentives

Setting aside a certain percentage of available budgets for funding PE-related activities would be a task for all actors within their respective field of competence - research programmes in the case of national and EU governmental agencies and funding organisations, as well as project funding and financial support for

researchers and students in the case of universities and research institutes.

CSOs often find it hard to reimburse the engagement of their members in PE activities and engage in projects or in the proposal stage of projects due to scarce organisational budgets. Some measures, which could address this issue, include financially supporting CSOs to enable them to prepare project proposals and providing incentives for CSOs to involve their members into citizen science. Furthermore, CSOs could use their position in R&I advisory boards to encourage setting aside budgets for PE activities in public institutions.

Besides increasing the availability of funds for PE, another effective measure would be providing funding structures and “incentives” that are supportive for PE activities. At the national and EU level open calls would be helpful to motivate actors such as CSOs to articulate their specific problems and perspectives in project proposals, as these cannot be easily related to research issues as addressed in academic calls. A fast funding route for PE-related activities would also help to accommodate funding structures with the needs of non-academic actors lacking the institutional backup for long-term application procedures. Making PE a mandatory part of calls for problem oriented research and including PE skills and achievements among the criteria for the evaluation of projects, resp. research staff, would be a measure to be taken by research organisations and institutions.

At the level of **policy formation** it is important to identify efficient funding measures which allow using knowledge from PE processes within policies of the European Commission in order to further support policy decisions.

At the level of **programme development**, funding is an important measure to shape research projects towards greater public engagement. Hereby it seems especially relevant to make the demand and need for PE explicit in the calls. A reflection process on the need and relevance of PE in all topics the European Commission raises would be essential for a broad and targeted inclusion of PE in EU research. A crucial aspect which should be explicitly addressed at the level of programme development is the participation of CSOs.

At the level of **project definition** and **research activities** the measures to strengthen public participation include making PE compulsory and introducing financial incentives for public engagement in research projects, such as requiring a fixed percentage of each project budget to be invested in PE activities.

With respect to the long-term perspective of PE in science, there should be funding targeted especially at universities providing them with incentives to set up cross-disciplinary infrastructures, e.g. institutes/offices for “problem oriented research”, which take up community issues (similar to science shops) and involve citizens in project work.

Training/Capacity Building

Actors at all levels need to build their capacities in PE-related skills and methods. Currently these are part of the curricula and practice neither at universities nor in vocational training courses. For governmental bodies, besides raising their in-house knowledge on PE and its possible roles in R&I policy making and research, it would be important to foster the inclusion of PE in the curricula of higher education institutions, as well as in those of secondary schools.

At the level of project definition as well as of R&I activities, it would be particularly pertinent to set up and develop tailor-made and adequate training models for scientists (e.g. on methods how to integrate the public into their research already at the level of project definition) as well as for the involved public actors. This would increase their understanding of the academic sector and the related policy fields and would empower them to take part in informed discussions.

Communication and Promotion

Besides material and educational support, public engagement in R&I needs to be fostered by awareness raising at all levels. Public engagement processes need public awareness in order to increase the potential of PE to foster the relations of science and society and in the long run establish a culture of PE in R&I systems. Single PE activities - be it on the policy making level or be it a citizen science platform - should be covered by mass media in order to make their objectives and achievements known beyond those groups and organisations involved in the process. An annual EU prize/award on PE and/or good science, technology and innovation governance would contribute to promoting PE in R&I further.

Research

PE is an established subject in the field of science and technology studies, and in particular the role of PE, its functions, related opportunities and achievements, as well as the barriers and pitfalls of the implementation and practice of PE procedures. This practice needs to be further supported by dedicated programmes which will increase the understanding and improve the design of PE practices in policy making and research. The

exchange of experience and ideas between researchers, practitioners as well as policy makers needs to be supported by PE journals and conferences. PE research could be included in a broad scope of research departments at universities - beyond the social sciences. Continuous evaluation of PE practice is currently lacking and could be effectively supported by setting up respective funding programmes and platforms for exchange of knowledge on evaluation standards and procedures. Research on methods, e.g. experimentation and experience-building on new strands of methods and the development of already existing methods with regard to scanning and foresight activities is needed as well. Furthermore, opening the access of the public to intermediate results needs to be made obligatory for certain types of projects in Horizon 2020.

Targeted integration of a variety of measures in all fields of practice of public engagement and involving actors from science and from civil society is needed in order to achieve effective results and allow for a better integration of science and societal needs. In a nutshell, the central challenges and actions to be taken up are the following:

- Provide formal rules for public engagement and make it obligatory on the EU level
- Strengthen infrastructures for the implementation of public engagement activities at all levels of the R&I process
- Provide resources for all involved actors and open up the academic system, e.g. through reward structures, removing organisational barriers
- Provide training measures for all actors
- Change the culture of engagement
- Support research on long-term evaluation of public engagement

THE EUROPEAN RESEARCH AREA AND PUBLIC ENGAGEMENT

Striving for renewed growth and raising the quality of public spending on research and innovation are the main targets of the European Research Area (ERA). This inevitably implies a better alignment of R&I with societal expectations. Thus, a central feature and a precondition for the success of ERA is its responsiveness to the needs and ambitions of European citizens. The approaches to foster the link between science and society currently applied in

Europe have to be regarded as an indispensable part of the further development of ERA. Opening up the R&I systems of member states with regard to the public by involving public representatives in priority and agenda setting would also contribute to achieving the specific ERA priority “Knowledge transfer and open innovation”.

Public consultations on R&I visions for Europe and for designing research clusters and programmes, therefore, should be part of the process. It would thus be useful to instigate the social responsiveness of ERA by including civil society organisations in the ERA stakeholder platform and in the European Technology Platforms if civil society is to benefit from open access policy. Including civil society representatives in the ERA platform and inviting them to contribute their perspectives on the challenges and needs for research and innovation would help taking into account societal needs in making up the guidelines for European R&I. Setting up a European platform for Public Engagement in R&I, inducing exchange on the role of the European citizenry in the ERA process, could contribute to preparing concrete steps towards opening the European Research Area to the European public. Such a platform can be a co-ownership of the EU, member states and civil society organisations.

ABOUT ENGAGE2020

Engage2020 is a project funded by the European Commission (DG Research) that looks at research, innovation and related activities, and explores how members of society are involved today and, perhaps more importantly, how they could be involved in the future. The project maps how, where and why members of the public, stakeholders, consumers and other groups are being engaged in the research process, from early policy development to the delivery of research activities.

The core ambition of Engage2020 is to increase the use of engagement methods and policies by mapping what is practiced and to spread awareness of the opportunities amongst researchers, policy makers and other interested parties.

To learn more about the project, its deliverables and partners involved, visit the website <http://www.engage2020.eu>. For further inquiries, please contact the project coordinator or any of the partners in the Engage2020 consortium.



Lars Klüver
Project Coordinator
lk@tekno.dk
Marie Louise Jørgensen
Project Leader
mlj@tekno.dk



Leonhard Hennen
leonhard.hennen@kit.edu



Edward Andersson
edward@involve.org.uk



Henk Mulder
h.a.j.mulder@rug.nl



Zoya Damianova
zoya.damianova@online.bg



Rainer Kuhn
kuhn@dialogik-expert.de