

EU Framework Programme: Call for Evidence response form

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The closing date for this call for evidence is 4 January 2011

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Question1: What should the UK's high-level objectives be for FP8?

To ensure UK science is world-leading by gaining access to outstanding facilities and research expertise based in other EU countries and beyond.

To drive economic development and prosperity through developing new Intellectual Property.

To ensure that research excellence is a major criterion for the allocation of research funding in order to ensure that only the best research is funded, that collaboration amongst the best researchers in the EU is supported and that the mobility of the best reseachers in the EU, and worldwide into the EU, is promoted.

To maximise the FP8 budget, if necessary by reducing other areas of expenditure eg agriculture.

To influence the major research themes of the future Cooperation strand and the Grand Challenges in order to maximise relevance to the UK's industrial and research strengths and its future R&D agenda.

To ensure that FP8 fits both strategically and operationally with the agendas of the UK's national funding agencies, in particular the Research Councils and the Technolgy Strategy Board and the planned new Technology Innovation Centres.

To strongly support the continuation and expansion of the European Research Council and Marie Curie programmes in which the UK has traditionally done well in order to sustain the added value this funding brings to our research base.

To ensure that a strong network of well informed and experienced national contact points are in place to support potential applicants.

To obtain funds to support the R&D activities of UK organisations and companies for the benefit of the UK economy.

To focus on what can more effectively be done through collaboration at EU level than at a national level. The selection criteria to deliver this objective must be applied rigorously, there is far too much "leakage" into peripheral areas of activity.

Question 2: How can FP8 help deliver economic growth throughout the life of the programme and beyond?

The key is to deliver sustainable economic growth - research should not just focus on physical sciences but should address the economic and societal challenges the transition to a "sustainable" economy will entail. For example, research into new models of economic governance would be appropriate.

FP8 must address both the short- and long-term needs of the economy; for the short-term needs it should focus on creating world-leading centres of research in areas where the EU already has strengths, for example health and climate science; in the long-term FP8 should be flexible enough to be able to identify and support research in the next generation of research fields, for example "new and emerging issues confronting society."

Mechanisms need to be developed which promote the engagement of businesses, especially Small- and Medium-Sized Enterprises, with FP8. Such mechanisms will need to deal with the costs and uncertainties of involvement both for SMEs and their partners; for example, organisations taking on the costs of supporting SME involvement before an award is made should be compensated in some way - in order to maintain an element of risk, this might be done only if the project is successful.

Economic growth will arise if the results of FP8 R&D programmes progress beyond that stage into economic activity by companies - FP8 must therefore strongly encourage and support knowledge transfer from research organisations to business and industry. One positive step would be the creation of a 'follow-on' fund designed to prepare promising research outcomes for the market.

Question 3: How should FP8 support the wider European context including Europe 2020 and the European Research Area?

The Lisbon Strategy sets a target for the European Union to become the "most dynamic competitive knowledge-based economy in the world". The development of the 'knowledge triangle' - research, education and innovation - is a core factor in European efforts to meet the ambitious Lisbon goals. It is clear that achievement of the objective set by the Lisbon Strategy will require sustained investment over a significant period of time, and FP8 will be crucial to the success of this objective.

The Commission's plans to focus on 'Grand Challenges' are positive as are ideas to use other EU funds, for example Structural Funds and Procurement budgets, to contribute to the achievement of the Lisbon Strategy. However, care must be taken to ensure that areas not covered by the 'Grand Challenges' continue to be supported.

FP8 should have a number of objectives:

- a) The creation of a more efficient and effective research base in Europe. This will be achieved through the improvement in the underlying strength of the research base throughout the EU by direct investment in research and by the establishment of enduring research networks both within and beyond the EU
- b) It should continue to promote the mobility of European researchers by facilitating their ability to work with the leading experts in their field and at the best institutions and by supporting the re-integration of researchers into European institutions
- c) The better translation of knowledge into economic activity. FP8 should foster greater understanding of the priorities of both research institutions and business, as well as their ways of working, by positively supporting collaborations between both sectors
- d) The provision of advice to policymakers. FP8 should support research into the changing geopolitical, economic and social context in which the EU exists in order to promote closer collaboration between policymakers and researchers, better policy advice and better decision-making.

It is unfortunate that Research Training Networks which were largely geared to the needs of young post-doctoral researchers were abandoned in FP7. They were an instrument that was particularly effective in achieving many of the aspirations of the ERA in areas not covered by the Cooperation strand. The demise of RTNs deprives young researchers of an excellent experience since these projects delivered high quality training in the context of doing high-level research – this is not something the current Initial Training Network scheme can achieve with the same degree of effectiveness.

The "wider European context" is well served through the current Marie Curie fellowship schemes (IEF, IIF) which we recommend should continue into FP8. The only significant change we would propose to the fellowship schemes is the introduction of a three-year option to allow for longer term planning and to reduce the tendency of MC fellows to start seeking new jobs as soon as (or sometimes even before) their fellowship starts.

Question 4: The study *Impact of the EU RTD Framework Programme on the UK* has indicated a number of broad benefits to the UK of the programme. Are these benefits identified appropriately and there other impacts that should be considered in addition?

The benefits are appropriately identified and we have no comment on the need for other impacts.

Question 5: How can FP8 make a positive contribution to the UK economy – and the low-carbon economy in particular?

In times of economic retrenchment FP8 will provide a valuable alternative source of funding for research in both public and private organisations. FP8 should encourage research that would not have taken place on the basis of purely UK funding and which leads to research innovations which are successfully implemented in terms of new UK business activity.

By promoting the engagement of UK research organisations and businesses with the best European and 'third country' partners with the objective of establishing the UK as a research- and business-friendly country. The importance of involving the best 'third-country' partners is crucial.

By raising the amount of research (both fundamental and applied) done by UK businesses.

FP8 must include a strand which focusses on high-risk, high-gain research where the benefits are not always predictable in advance.

By supporting research that transcends a narrow science perspective and that adopts broader methodologies combining environmental with social goals.

By encouraging and facilitating greater UK-based business participation.

These suggestions apply across the UK economy, including the low-carbon economy.

Question 6: How can FP8 support innovation in the UK?

By establishing a 'follow-on' fund for the translation of the best ideas into economic activity. We are not aware of EU funds which are targetted towards the further development of research outputs in the same way that current schemes - for example, the EPSRC Follow-On Fund - do and we believe that the establishment of such a fund would be a useful addition to the FPs.

By making it easier and more cost effective for businesses to participate.

By ensuring that successful research applications include a statement of how outcomes will benefit the economy. The statement should be fully incorporated into the collaboration agreement and be carried out as far as reasonably possible after the end of the R&D programme.

Question 7: What are your views on the split of the FP7 budget between these specific programmes? Should this change in FP8?

ERC: There should be an increase, both in absolute and relative terms, of the budget available to the ERC. In our view, the ERC is a success story that would benefit the ERA greatly by being substantially expanded at the expense of the Cooperation programme.

Marie Curie: The creation of a 'single' ERA will depend on researcher mobility and the various Marie Curie fellowship schemes offer a tried and tested way of promoting this. Accordingly, funding of these schemes should be set at a level which reflects the greater scope for mobility in the ERA as it will be in 2014 as compared to 2007, when FP7 began. As previously stated (Question 3), the MC programme should re-initiate the Research Training Network scheme with substantial funding, again at the expense of the Cooperation programme.

Similarly, the Research for the Benefit of SMEs programme (part of the Capacities strand) should be increased but care should be taken to ensure that appropriate support mechanisms are in place so that Small- and Medium-Sized Enterprises are able to take advantage of the research funding available.

Question 8: Which areas of Framework Programme funding provide the most EU added-value (see paragraph 6)? And which the least?

The FP is good at creating "networks and systems across businesses, universities and research centres across Europe" and "the development of a common evidence base across Europe to facilitate policy development".

The impact on economies of scale through enabling a 'critical mass' of technical/capital equipment or knowledge is extremely valuable.

There is less evidence that more 'EU public goods' are achieved and stronger efforts should be made in this respect.

Question 9: Can efficiencies be found in the Framework Programme because of overlaps between different areas of funding?

Definitely. One example is that a number health technology-based research grants are available through, for example, the technology and ICT focus areas of funding. However there has been relatively little by way of interaction between these research efforts funded by EU and the applications including healthcare.

Question 10: What are the arguments for and against FP8 moving towards funding research and development which addresses grand challenges?

For

- a) Grand Challenges by definition require "grand" responses and the identification of such Grand Challenges will make it easier to focus and co-ordinate resources (both human, financial and infrastructural) on the problems, which will be complex and huge in scope
- b) The acknowledgement of a "Grand Challenge" signals intent to solve it and implies political will to do what it takes to achieve results

- c) The identification of Grand Challenges promotes greater focus within the overall research effort
- d) Large scale societal or economic challenges pull through technologies into direct applications in ways that purely research-orientated projects can seldom achieve. Common, EU-wide challenges such as low carbon, energy supply and security, and an ageing population are well suited to this approach. There are no obvious downsides provided the challenges are focused on genuine collective commitments by the collaborators/partners to delivery of the challenge objectives
- e) The idea of "Grand Challenges" will attract the best researchers to the quest to find solutions.

Against

- a) The list of "Grand Challenges" needs to be identified, agreed and then acted upon, which could be a difficult (political) process and also one which presumes the risk of "failure"
- b) There will be a need to ensure that "Grand Challenges" can be added, or removed, and the process will need to be flexible enough to allow this but robust enough to ensure that the list is not devalued by too much change
- c) Care must be taken to ensure that the essential part played by research in the Social Sciences and, indeed, the Humanities in addressing these challenges be recognised and valued; for example, the impact of research into inter-cultural communication and communities on the question of security
- d) Care must be taken to ensure that research in "novel" areas, and in areas within all disciplines which do not have clear relevance to the Grand Challenges, is supported
- e) If the instrument for addressing Grand Challenges is through large projects or networks, we feel success is unlikely. Smaller, focussed projects within an overall managed portfolio have more chance of being successful, more competitive and more cost-effective.

Question11: Which grand challenges (see above) are best tackled on an EU-wide rather than a national level? Within these areas which particular aspects would benefit from an interdisciplinary focus?

EU-wide: climate change, water or food supplies, banking finances, security, ageing population. All of these challenges are common to EU Member States, as well as to countries outside the EU. While national circumstances may differ to some degree, solutions will depend on the concentration of resources which can be derived from a pooling of national resources.

All areas will benefit from an interdisciplinary focus.

Question 12: How should FP8 engage with countries outside the EU or associated to the Framework Programme in addressing global challenges?¹

Enthusiastically, comprehensively and with greater understanding of the benefits of having extra-EU partners . None of the identified Grand Challenges are solely confined to the EU. The EU should seek agreements with other countries, for example USA, Russia, Canada, Australia, Brasil, China and India, for jointly funded programmes which should also support research and innovation in poorer countries. Collaboration should be promoted where it will bring obvious mutual benefit and where such collaboration is with high-ranking research institutions.

Question 13: Should FP8 still provide some thematic focus e.g. in areas such as space and transport? Should any of the current themes be re-visited over the course of FP8 – and if so, how?

There should be calls without the strong direction present in all of the Cooperation programmes. Our suggestion is to develop a scheme, perhaps similar to the ICT Future and Emerging Technologies Open Scheme, to act as a stimulus to creativity. There is scope to support "futures thinking" in areas which are not otherwise covered in the Cooperation strand. This might be done by an independent academic panel identifying areas of research which are not otherwise supported in FP8 and might benefit from a rapid infusion of research funding. The aim would be to position the EU as a world-leading research base for the particular areas. There would be no prescription as to the research areas to be funded and the scheme would be open to any researcher.

The advance made in FP7 in relation to the inclusion of Humanities must not be reversed. Apart from the cultural importance of this discipline, there is significant economic benefit to be accrued, for example in the creative industries and tourism from supporting this area. The conflation of Humanities and Social Sciences into the same "theme", and the allocation of a relatively small budget, makes funding of such a wide range of research, with wide potential for impact, difficult.

¹ FP7 participants can in principle be based anywhere. There are different categories of country which may have varying eligibility for different specific and work programmes: the EU-27; associated countries– with science and technology cooperation agreements that involve contributing to the framework programme budget; EU accession candidate countries; and third countries whose participation is justified in terms of the enhanced contribution to the objectives of FP7.

Question 14: What should be the role of key enabling technologies e.g. ICT and nanotechnology in FP8?

We believe the distinction is artificial and more needs to be done to embed 'research on enabling technologies' in FP8 - such technologies should be used as and when the applicant needs them.

Question 15: Services form a crucial part of the UK economy. Should research into services be addressed specifically in the Framework Programme, and if so, how?

Research into the Financial Services sector could be useful to help bridge the gaps between users and academia and help users appreciate the consequences of their actions. For example, Finance could be a separate theme and it would certainly play to the UK's strengths.

The UK has very strong health services research that is quite well funded through the National Institute for Health Research, including its Health Technology Assessment programme. The UK is therefore well positioned to benefit from health services-based research funding from the EU and it would also add value to the broad objectives of the EU for FP8. Such a development would have substantial impact through the better delivery of healthcare.

Also, EPSRC has experience on how to handle services in the physical sciences.

Question 16: What are your views on how the Framework Programme allocation for collaborative research should be apportioned between themes; enabling technologies and underpinning areas of research e.g. social sciences and humanities?

The distinction between "enabling" and "underpinning" is artificial. The term "underpinning" implies a secondary role for Social Sciences and Humanities. Social sciences research is central to good and effective policymaking and the implementation of innovative (physical) science; for example before a sustainable economy is introduced we must understand what that means for society as a whole. Humanities has economic impact (creative industries, tourism) but is also central to cultural identity - what humanities research has to offer in terms of the scrutiny and understanding of cultural identities and their performance in private and public life, and of intercultural interactions and tensions, is at the core of certain identified themes and 'grand challenges'. It is also highly relevant to the role of the EU as a community of nations within a global/transnational context. The mechanisms and rationale adopted by the Commission in making these allocations should be completely transparent. Also the Commission should not allow itself to be swayed disproportionately by vocal and articulate, but narrowly focussed, interest groups when taking these decisions.

In broad terms, there should be greater encouragement and support for inter-disciplinary research; current problems include assessors unfamiliar with the 'cutting-edge' research being proposed and a lack of understanding or appreciation in the Commission of the possibilities of such research.

Question 17: To what extent should ERC funding focus on supporting frontier research? Are there other areas in which ERC could add value?

The ERC should be totally focussed on supporting frontier research in any (legal) discipline, just as it is at the moment.

ERC programmes complement the directed research of the Cooperation programmes and as such fulfil an important function both for the EU and for investigators. The ERC allows the Commission to identify new and potentially exciting research which may, at a later stage, inform European research policy or lead to a major innovation capable of economic exploitation. For investigators, it allows them the opportunity to carry out work in areas, and in ways, that are not prescribed by the Commission. It is much more akin to the tradition of funding in the UK and, therefore, is better understood here. Dilution of the ERC programmes could reduce the UK's success rates in these programmes and should be approached with the greatest care.

Through greater support for 'blue-skies' research - the allocation of a higher budget to the ERC would be positive. In particular, the introduction of new programmes open, for example, to mid-career researchers would greatly expand the production of new ideas, processes and impacts.

Question 18: Should ERC's current emphasis on funding a single investigator continue into FP8?

Yes. The strength of the ERC will be diluted by a move away from a focus on single investigators. If this were to happen, many of the 'political' and practical problems found in Cooperation projects would appear in the ERC, undermining its unique research benefits by increasing administrative and other complexities.

One question not addressed in this document is that of those extremely high quality proposals, acknowledged as such by the ERC, which just miss out on funding. Some will be recycled through other funding agencies, albeit with long delays in getting started and others will simply die. This is both an unfortunate waste of effort and a missed opportunity for ground-breaking science. Other countries have mechanisms in place for funding near-misses and the UK should do the same.

Question 19: Are there any options that could better link ERC activities with private sector interests?

We believe that the philosophy behind the ERC is robust - all fields of research are eligible and any researcher regardless of their institution, both "public" and "private", can apply. In these circumstances, the issue (if there is one) is to encourage "private sector" researchers to apply to the ERC (ie within the current rules) and not to change the rules of the programme. The linking of ERC activities to private sector interests runs the risk of undermining the ERC, which is rightly regarded as a great success of FP7. It should not be forgotten that research undertaken under the auspices of the ERC in the "public sector" will support the activities of the private sector, for example through policy advice, technical innovation or even by undertaking "blue-skies" research which the private sector has no interest in doing.

Question 20: What priority should researcher mobility and skills development have in FP8? What is the best way to address this?

The UK should support a continued high priority for researcher mobility - the UK will remain a magnet for top-class researchers and the developmental opportunities for UK-based researchers, both in terms of going overseas themselves or working in the UK with the brightest foreign-based researchers, should not be underestimated.

As previously stated (Question 3), FP8 should consider the re-introduction of the Research Training Network scheme.

Also FP8 should enhance the International Reintegration Grant scheme to make it really prestigious and worthwhile a) to write the long and involved proposal and b) to use it as an instrument to encourage high quality EU nationals to return to Europe from overseas. One option might be to devise a hybrid scheme lying somewhere between the Intra-European Fellowship and Incoming International Fellowship schemes? Consideration should be given to abandoning the International Outgoing Fellowship scheme, which is too complicated.

We are also concerned that the removal of the management of the Marie Curie programmes from DG Research to DG Education will potentially undermine the value of the programmes - there is already evidence in the way the Knowledge and Innovation Community programme is being run by DG Education that both its management style and rules fail address the needs and circumstances of the research community.

Question 21: The capacities specific programme currently covers several policy initiatives relating to capacity-building. Which of these are of most value? Are there other areas which would merit funding?

No comment

Question 22: What should the relative priority be for the Joint Research Centre under FP8? On which activities should it focus?

In our judgement, the Joint Research Centre should have a low priority as it would not benefit the UK.

Question 23: Please comment on the COST framework and its links with the Framework Programme

COST is excellent value for money - it encourages links between EU groups and the links involving young researchers last for many years in our experience.

We also believe that COST provides a useful framework for identifying and framing problems which can be the subject of subsequent research.

Question 24: Should FP8 directly support activities aimed at integrating the three sides of the knowledge triangle e.g. KICs?

No. The introduction of teaching into the research/innovation funding landscape will potentially harm both the R&D effort and the KICs. Until the success or otherwise of the KICs is better understood - they are only one year old and still being set up - no lessons (positive or negative) can or should be drawn. One concern would be that DG Education and DG Research have different remits and different ways of working and this would introduce extra bureaucratic complications at a time when then need is to reduce administrative complexity.

Question 25: Which instruments (e.g. JTIs, article 185 initiatives) should be retained for FP8? Are any new instruments required?

No comment

Question 26: Please comment on the Risk Sharing Finance Facility. Should a scheme of this kind be included within FP8?

No comment

Question 27: What should the balance be between funding large-scale programmes e.g. the article 185 *programmes* above and smaller *projects* individually administered by the Commission?

Large scale programmes would get overly complicated with current finance/reporting requirements. Projects need to be relatively small and/or simply structured to be readily managed.

Question 28: What should be the role of public-private partnerships in FP8?

We would prefer that PPPs have no role at all in FP8 because we believe that cross-border, private and public sector consortia would be extremely difficult to manage (both internally and in relation to the Commission) and would, as a result, be unlikely to carry out cutting-edge research.

Question 29: What lessons from evaluations of previous framework programmes can help with the development of FP8?

Every effort should be made to reduce the time from the announcement of the award to the start of work to 3 months. This would require substantial simplification and standardisation of costing and contractual processes.

Question 30: What steps could be taken to ensure that knowledge gained from FP8 is disseminated and exploited – and remains easily accessible over time?

This has been a weak point, particularly in relation to some Collaborative Projects. All too often, collaborative agreements have been ineffective in delivering successful exploitation of research outputs. In future, R&D funding should only be provided when a coherent and convincing exploitation plan, which is annually updated, has been included in the application.

Open access.

Availability of research results on special websites (like CORDIS) which are well-known and easily accessible through the Europa gateway.

Publication in international journals.

IP and patent rules should be facilitative.

Question 31: Would any proactive effort to alter the current balance of funding between universities, research organisations and businesses be appropriate or effective? If so, what might be involved?

There is little likelihood that any "proactive effort" would necessarily lead to greater business involvement. Currently, UK universities do very well when compared to universities in other countries while research organisations and businesses do less well than their comparators. In the UK, there are fewer "research organisations" than in the rest of the EU but the reasons for the relatively poor performance of UK business are more difficult to identify. What is clear, though, is that the lower level of engagement of UK business cannot be attributed to rules which bear down on UK companies more onerously than their European

competitors. It must also be remembered that FP7 programmes are competitive and it would not be reasonable to undermine that principle. While, some changes to rules, especially to support the involvement of Small- and Medium-Sized Enterprises, would be welcome, the main focus should be on better information, improved access to expert advice and a more positive approach towards Europe as a funding source, perhaps involving the CBI, IoD and Chambers of Commerce, might be valuable. Encouraging businesses to work with organisations that have extensive experience of involvement in the FPs, such as universities, would be a positive step.

Question 32: What could be done at EU level to encourage more businesses – especially SMEs - to apply?

Steps which might be taken to promote the involvement of SMEs, and thereby innovation might include:

- a) An expanded Research for the Benefit of SMEs programme
- b) Fully-funded R&D contracts for innovation procurement of R&D, as in the UK SBRI scheme
- c) Simplification of the proposal process and funding mechanisms; for example more use of lump sums, payment by deliverables
- d) The creation of, and support for, linked research clusters in non-contiguous regions as a method of economic development (perhaps co-funded by regional funds) around specific themes such as clean energy, low carbon transport
- e) Expansion of two-stage calls as a means of reducing the commitment of SMEs
- f) Reduced administrative burdens for start-ups, for example in relation to the need for two years' accounts
- g) Eliminating/reducing the uncertainties and risks of involvement; for example by providing advice and administrative support, or through an 'insurance policy' to relieve uncertainty such as exchange rate fluctuations
- h) Funding to pay for proposal writing on behalf of SMEs
- i) Supporting programmes which link academic/research organisations/ industrial groups with expertise in writing proposals with SMEs
- j) Exploring new models for SME involvement, for example a non-Contract model under which SMEs could be "attached" to a consortium.

In general, the lack of involvement of business is a UK phenomenon (as compared to the other major EU countries) and it is unlikely that the Commission would view the "problem" as one for it to resolve. Measures should be taken at UK government level.

Question 33: What could the Commission do to reduce bureaucracy of FP8 over and above the current simplification proposals (including changes to the Financial Regulations and Implementing Rules)?

Change needs to be major and radical. We would propose a number of measures:

a) **Timesheets:** the need to complete timesheets remains the single most important barrier to academic engagement with FPs. Whether real or not, the requirement to account for their time has become symbolic of the bureaucratic nature of FPs in the academy. In the UK, Research Councils do not require timesheets and a similar approach by Brussels would remove a significant barrier to participation. One potential solution might involve staff budgets being based on mutually agreed allocations of time, as done by UK Research Councils, thereby removing the need for timesheets.

b) **Audit:** The audit requirements place a significant burden on university administration of FP awards, especially in relation to time and to a lesser extent in respect of cost. At a time when the Commission is seeking to improve administrative standards amongst research institutions across Europe, there seems to be little recognition that many institutions achieve high standards of financial management of projects but still face the one-size-fits-all audit requirements. The introduction of 'smart' audit regimes which take account of the track record of research institutions in managing projects – in which, for example, institutions with a record of good management receive recognition for past good management of projects – would be less of a problem. Such 'smart' regimes might also include a move to institution-, rather than project-based, controls which mean that a sample of projects at each institution are audited rather than every one. One other potential advance would be to remove relatively small amounts of indirect taxes from project budgets, thereby reducing the need for audit and saving considerable amounts of time and money. The proposed Strands 2 and 3 go some way to doing this and are to be welcomed

c) As the UK allocation is relatively large and stable, making awards in £ Sterling would avoid exchange rate exposure

d) Internal charges are currently forbidden, but often represent better value than buying in an external service

e) On some occasions, it has felt that Annex 1 project scope is being used too prescriptively, and that some flexibility within the overall goals of the project would be beneficial to the ultimate project outcomes

f) We also suggest that monitoring of reporting should be devolved to Member States.

Question 34: Is there a role for a two-stage applications process analogous to that used by the Technology Strategy Board²?

We have suggested that a two-stage application process would be an encouragement to the involvement of Small- and Medium-Sized Enterprises (Question 32) and we would also welcome a more general use of the process. However, we are concerned that a more general use of a two-stage application process could lengthen the period between initial application and the beginning of the project, which is already too long. While the two-stage approach would undoubtedly save much wasted effort this should not lead to a general worsening of the situation for successful applicants.

² For details of Technology Strategy Board processes see www.innovateuk.org

Question 35: Should the programme move away from a cost/input-based funding model to one based more on results/outcomes/performance?

Warwick is not clear on how this would work. Research is by definition a step into the unknown so potential problems would revolve around what happens if the research undertaken does not produce the expected (contracted) results. There could be interminable arguments about whether contracted results had been achieved since this would come down to academic and maybe eventually legal opinion. Also it would result in a watering down of the language used in the proposal/contract on what will actually be achieved and would also discourage risk-taking. There would be uncertainty about the extent to which changes to the outputs/results would be negotiable and whether such a process would be difficult; for example, to what extent would the Commission be open to persuasion that changes to the contract are required? There would also be a tendency to set outputs/results which are known to be achievable leading to greater conservatism in research proposals. Additionally, it must be borne in mind that results and outcomes often take several years to appear.

Question 36: Should the rules on intellectual property in FP7 be changed for FP8?

Yes. The FP7 rules for IP are often a serious impediment to subsequent exploitation. The R&D programme rarely results in a finished product, so further investment must be made in development. Often this requires venture investment. This will never be forthcoming if the foreground IP is shared between all participants, and/or if they all have a right to a royalty-free licence. It would be much better if all foreground IP belonged to one of the partners (chosen collectively by all the partners), and the others had the right to some modest share of any proceeds.

Question 37: Is the proportion of overheads funded by FP7 appropriate? Should this be adapted in FP8 to create more consistency with other sources of funding?

The principle of paying the full economic cost across all EU programmes should be established, rather than a harmonisation of overhead rates to a low arbitrary percentage. EU overhead calculations can be complex and time-consuming and , therefore, a simple approach to overhead calculations across all EU programmes (which should not reduce below 60%) would be a positive move.

Question 38: Within the current UK public expenditure constraints³, could the UK do more on a cost-neutral basis to encourage participation in FP generally?

Promotion by Ministers in speeches/articles to university and business audiences (perhaps couched in terms of the positives of EU membership) - a "good news" story.

Strengthen the ability of the Technology Strategy Board to promote Europe - in its new role as a future focus of UK innovation policy it will need to expand its knowledge of the FPs significantly and quickly.

More case studies to be published on websites owned by UKG with business organisations (eg CBI, IoD, BCC) being lobbied to do the same.

Consideration should be given to enhancing the prestige and value of the ERA-NET scheme which promotes funding of Europe-wide projects through national funding agencies. Many of the benefits of transnational research accrue without the need for all of the Commission's administrative hassle. Alternatively this could be made a strand of FP8 with money sub-contracted to participating countries to administer.

Question 39: How effective are the current UK support services?

National Contact Points provide a valuable service but perhaps could get out more, publicising their skills and service with more roadshows perhaps jointly with UKRO and other funding bodies.

In relation to universities, UKRO provides an excellent service.

UK Research Council websites only provide generic information about FP7 and appear to provide no specific links to FP7 programmes – for example, the EPSRC's Energy webpage does not include any reference to FP7 as a "Related Internet Link". A simple way to improve support would be for UK Research Councils to make them explicit on their websites. Research Councils might also show how FP7 programmes/schemes can be used either as alternatives or as complements to their own schemes.

Question 40: What could be done at UK level to encourage more businesses – especially SMEs - to apply?

We believe that the following ideas would all help address the issue of low rates of participation by UK businesses in the FPs:

- A significant improvement the awareness of, and access to, information about the FPs**
- Greater collaboration with universities, which would be able to help business navigate the FPs and the application/award process**

³ See http://www.hm-treasury.gov.uk/spend_index.htm

- Greater strategic focus in the FPs would help and the Technology Strategy Board should focus more on UK research strengths
- Greater co-ordination between the various UK agencies involved in providing support
- Industry's strategic agendas should be promoted in Europe and assistance should be given in the building of consortia
- More assistance to industry wishing to influence the EU research agenda, for example through European Technology Platforms, possibly with UKG backing
- Make existing networks more accessible eg CBI, Knowledge Transfer Networks and join existing university networks
- In order to successfully participate, businesses need to make use of their existing European contacts or develop them, for example clients, trade associations
- The role of UK representatives on ETPs should be considered – do they represent their own organisations or the UK as a whole? As a first step, the TSB should identify 'UK' representation on ETPs
- The TSB should consider university involvement with industry and the value of university networks should be realised
- BIS and TSB need to be more granular when assessing the needs of different kinds of business
- 50% cost reimbursement to Small- and Medium-Sized Enterprises is a barrier to their participation. Some additional incentive from UKG to SMEs that have won EC grants would encourage greater participation.

Question 41: Are there any lessons from other countries that could help raise UK participation?

No comment

Question 42: Please add additional comments here in relation to UK interests in the Framework Programme.

While it is tempting to seek a greater focus on the involvement of industry in FP8 it should not be forgotten that there is a large area of research, which lies near the fundamental research end of the spectrum - as opposed to the applied end of the spectrum - which is essential to the process of innovation and economic development and which business has no interest in doing. Universities are good at doing this type of research and business is not - and near-market research depends on good fundamental research being done first. The FP, and especially the ERC, are vital to fundamental research - and UK universities are very successful in the ERC.

Academics report that participation in the various FP and non-FP programmes has given their research a much enhanced international aspect, something that UK funding alone cannot provide. Having said that, it should always be borne in mind that for most institutions they

get between 5% and 10% of their research funding from FPs which means they get between 85% and 95% from elsewhere. That said, the amount of time spent on administering and auditing grants is totally disproportionate in relation to the funds that these grants bring in and provides a major constraint on the enthusiasm for both individual academics to get involved and for university management to unreservedly embrace and recognise the benefits which research at the European level can bring.

We are also concerned that, while the UK takes a lead in this area, there seems to be little general involvement of the public at a strategic level in decisions about, and the priorities of, the FP.

One possible additional measure for FP8 would be the allocation of funding to PhD fellowships. Improved funding, for example by offering competitive fellowships that for three years pay all of a PhD students' HEI fees and provide a small stipend would both (1) significantly improve UK (and EU) research capability and (2) improve the overall quality of the UK (and EU) research environment. The number of European students who regularly train for PhDs in the US and stay on for their first job (and sometimes their whole career) is an under-mentioned aspect of "brain drain".

Do you have any other comments that might aid the consultation process as a whole?

None

Please use this space for any general comments that you may have, comments on the layout of this consultation would also be welcomed.

Thank you for your views on this consultation.

Thank you for taking the time to let us have your views. We do not intend to acknowledge receipt of individual responses unless you tick the box below.

Please acknowledge this reply

At BIS we carry out our research on many different topics and consultations. As your views are valuable to us, would it be okay if we were to contact you again from time to time either for research or to send through consultation documents?

Yes

No