Climate-KIC

Request for Proposal

"Bridging the Gap between Modelling and New Policy Expectations"

Date– 7th December 2017

Introduction: Climate-KIC

Climate-KIC is the world's leading public-private partnership addressing climate change mitigation and adaptation through innovation. It is one of six Knowledge and Innovation Communities (KICs), supported by the European Institute of Innovation and Technology (EIT), that provide a unique model of innovation to address key societal challenges, benefit the economy, create new jobs and enhance the entrepreneurial culture of Europe. Climate-KIC's mission is to bring together, inspire and empower a dynamic community to build a zero-carbon economy and climate resilient society. Our vision is to enable Europe to lead the global transformation towards sustainability.

Climate-KIC catalyses and facilitates innovation to bring about the climate relevant economy. We primarily focus on systems and a systemic approach to innovation. Thus, we not only need new technologies, but also new business models, legal frameworks, social practices and cross-sectorial thinking. Key to our systemic approach to innovation is our partnership, which is a diverse set of first-rate knowledge institutions, leading corporations, SMEs and ambitious actors from the public sector. We bring this community together to create a strong supply of new ideas and transform the way we tackle climate change. We aim to crystalize complex demand-side needs and focus supply-side creativity on understanding and meeting these needs.

http://www.climate-kic.org/

http://eit.europa.eu/kics/climate-kic/

Climate-KIC works across 32 European countries and supports a range of programming designed to catalyse innovation as described. We have a matrix structure, combining thematic focus with an innovation investment framework and pan-European footprint. These elements are explained in more detail below.

1. Objectives of this work

The objective of this work is to draft a 'thought-starter paper' with input from leading thinkers from the different modelling communities – notably including socio-technical perspectives as well as more established techno-economic or natural scientific ones.

This paper should aim to identify key gaps between previous modelling approaches and the expectations and demands for new, improved approaches that better meet policy expectations consistent with Paris Agreement goals.

2. Target Audience

The paper is drafted by a leading expert in new approaches and with an input from a sufficiently diverse set of other experts. The audience of the paper are both technical and political policy-makers who deal with the development of mid-century climate strategies based on new modelling and roadmaps.

2.1. Key Target Audience

The key target audience are EU and national European policy makers, so that they can develop a better sense of what is possible now and what shall be done in future, especially at early stages of the policy formulation process. With a certain conservatism inherent in many modelling and climate policy-making communities, there is a need to develop an understanding of the need to 'disrupt the orthodoxy' and give policy makers confidence to take ambitious decisions.

3. Context

The Paper should provide input into both formal EC and national policy-making on long-term climate strategies (notably 2050 and beyond), as well as into external processes around these (such as Bruegel's activities to develop guidance for the Commission on its path to the 2050 roadmap.)

With initial thinking already underway, the paper should be developed quickly (by early 2018) to feed specific 2050 modelling processes that will run during 2018 and 2019. The paper is also a part of the evidence base regarding wider discussions on the Future of Europe and Summit discussions on the future of EU Climate and Energy policy or the Sustainable Development Goals, all foreseen during 2018.

Goals:

- Acknowledge inadequacies of past efforts, but fully draw on and recognise not just new approaches (socio-technical in nature), but also real-life evidence of rapid, non-linear changes taking place in markets (EVs, RES, etc.). Paper will not aim to provide all the answers but to build confidence among policy makers that more ambition is possible and can be credibly modelled.

- Establish the current 'state of the art' with respect to current relevant modelling: e.g. climate/ emissions/ meteorological, resource flows-usage, land-use and infrastructure, economics and event socio-human behaviour using agent-based techniques.

- Establish realistic anticipation for capabilities to come. Define where multiple domain capabilities are needed/ possible. Create an appetite for cross-disciplinary systems approaches/ thinking/ capacities.

- Accelerate the link between Europe's EO/ GIS (open) big data assets and stimulation of a 'market' in developing capabilities with closer end-user (demand side) articulation and focus on meeting current and predictable needs.

- Eventual aim would be to lead and contribute to a 'visioning piece' on what a net zero emissions economy and society in Europe might look like in 2050 – as well as how the transition to that could be achieved with these approaches to system level innovation.

4. Timetable

This opportunity will be advertised until the 20 December 2017. The indicative start date is for this project is the 4 January, dependent on provider availability.

The detailed project plan will be mutually agreed before the commencement of work, but expect the draft report to be submitted by 31 January 2018.

5. Contract Value & Payment Arrangements

The max. allocated budget is €10,000.

Payment will be made within 30 days of Climate-KIC approving the final project output.

6. Proposal Requirements

Applications should be in the form of a proposal stating your relevant expertise, methodology, fee (broken down by activity/time inputs) and CVs. Proposals should not exceed 2 pages of 12-point font with standard margins. CVs are not included within this page count.

Proposals will be assessed via a standardised scoring matrix used by Climate-KIC for all its external commissions.

7. Proposal

Please submit your application to Mike Cherrett, Director European Affairs mike.cherrett@climate-kic.org by 17:00 GMT on the 20th December 2017. We anticipate making a quick decision in order to achieve an early start to the project.

Background

7.1. Thematic focus

Our four core Themes focus on Urban Transitions, Sustainable Land Use, Sustainable Productions Systems and Decision Metrics & Finance. Education underpins all of what we do, working and supporting the Themes, building and developing both the short term and long-term human capital of our community and beyond.

Urban Transitions

Aim: Develop integrated, interoperable, scalable and replicable systemic solutions to underpin the carbon-negative, responsive, resilient cities of the future.

Climate-KIC's Urban Transitions theme develops integrated, scalable and replicable systemic solutions that serve as catalysts, driving the transformation towards liveable, zero-carbon and resilient cities. To this end, we bring together innovators and key stakeholders in urban systems to overcome barriers and drive systems innovation, demonstrating that ambitious innovation with high socio-economic and climate benefits is possible. We then support the scale up of these innovations within Europe and beyond, unlocking the market potential for climate benefit worldwide.

Sustainable Land Use Systems

Aim: Produce innovative scalable solutions to generate value for actors using land resources while reducing emissions, increasing carbon sequestration and societal resilience.

Land is both an emitter and sink of carbon, it provides food for consumption and feedstock for industry and of course, it provides a habitat for those living on it. In this complex environment, Climate-KIC should address changing land use in the context of the value chains that it supports, to ensure we avoid zero-sum diversions. More specifically, this Theme sees most innovation potential in agriculture and forestry activities, which are addressed through integrated landscape approaches.

Decision Metrics and Finance

Aim: Create innovative, transformative tools and systems to monitor and model climate impact and risk, unlock investment and change behaviour.

From carbon management to environmental auditing, we address data and evaluation so that sectors, companies, cities and investors understand where they are now and where they need to go to thrive in the long term, save costs, and deliver on climate targets. Our risk management and adaptation services determine the cost and impact of climate change currently not visible across sectors, supply chains and investments, while offering ways to build in resilience. We support investors in identifying and accessing bankable, green projects by articulating new models of value, benefits and returns. We inspire change by innovating in ways to make the business case for sustainability.

As all our Themes illustrate, addressing climate change is a complex endeavour and this complexity can often hinder confident action. This Theme aims to make the process of planning and decision-making more straightforward and thereby unlock investment to where it can make the biggest difference. The very same tools and systems also bring clarity to where human action can make a difference – behavioural change from a personal or collective perspective.

We build integrated competences, models, tools and mechanisms to provide the evidence informing systemic decision-making and to realise the full potential of stakeholders to act against emissions and increase resilience.

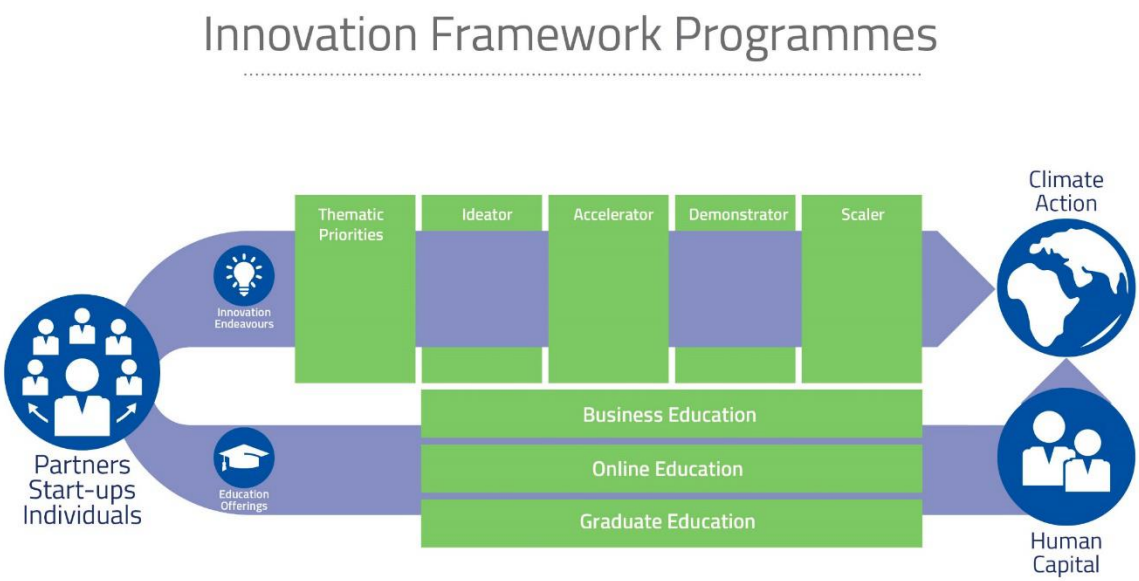
7.2. Education

Aim: Inspiring and empowering innovators to catalyse climate action.

Education is at the heart of Climate-KIC and continues in its broader remit of inspiring and building human capital. In addition to that role, Education now more directly supports the Themes, addressing knowledge and competency gaps that were previously performed within other pillars. Education continues to evolve its highly developed formats from targeted learning-by-doing through to broad reaching online education.

7.3. Innovation Framework

Innovation is the heart of Climate-KIC. The figure below summarises our approach to integrating and supporting an innovation framework.



7.4. Geographical structure

Climate-KIC primarily engages directly with its community through an organizational structure based around six Geographic units – Benelux, DACH (Germany, Austria and Switzerland), Mediterranean (France, Spain, Italy), Nordic (Denmark, Sweden, Finland, Norway) and UK&I. Offices in these locations act as the hubs of our pan-European presence. They are the multinational clusters on which we build our community, stimulate interactions and increase impact within and across national boundaries.

The Climate-KIC group consists of a Dutch Association which is governed by an Assembly, with representation of all Core partners. The Association is the sole shareholder in a Dutch Holding company (Climate-KIC Holding B.V.) which is responsible for management of the Climate-KIC group. The Assembly appoints a Governing Board that represents the Association.

The Governing Board appoints the Executive Board of the Climate-KIC Holding B.V. comprising the CEO, CFO, COO and 2 further members. Subsidiaries of Climate-KIC Holding B.V. have been established in all the major geographies for employment of staff. A total of 164 staff are currently employed by these Climate-KIC subsidiaries for core functions, while many other individuals with the partner community contribute to Climate-KIC activities.