ERA-NETs
SUSFOOD2 and FOSC

Joint Call 2021 Announcement
"Innovative solutions for resilient, climate-smart and sustainable food systems"

Version 4

First published 17 May 2021

Version 01: Initial release version (17 May 2021)
Version 02: National Regulations MMM (FI) updated (17 May 2021)
Version 03: National Regulations RCN (NO) updated (27 May 2021)
Version 04: National Regulations Mipaaf (IT) updated (8 July 2021)

These projects have received funding from the European Union's Horizon 2020 research and Innovation programme under grant agreement No. 727473 and No. 862555, respectively.

Contents

1 Introduction to the Joint Call "Innovative solutions for resilient, climate-smart and sustainable food systems"

The ERA-NET Cofund instrument under Horizon 2020 is designed to support public-public partnerships between Member States (and associated countries) for the implementation and coordination of networking activities in different fields of research.

The governing bodies for the SUSFOOD2 and FOSC ERA-NETs have agreed to launch a Joint Call to further strengthen Research and Development on innovative solutions for resilient, climate-smart and sustainable food systems, with a focus on approaches to improve resource efficiency and enhance the capability of food systems to withstand severe physical and economic shocks. **The joint network consists of 14 funding bodies from 13 countries committing 7,850,000 € for transnational research (Annex B)**.

1.1 About SUSFOOD2 and FOSC

The ERA-NET Cofund SUSFOOD2 "SUStainable FOOD production and consumption" started in January 2017, and is the continuation of the FP7 ERA-NET SUSFOOD (2011-2014). The strategic goal of SUSFOOD2 complements the EU bioeconomy and food policies, and aims to reinforce cooperation in research, development and innovation between EU members and associated states in order to maximize the contribution of research to the development of more sustainable food systems from production to consumption. The scope of SUSFOOD covers the entire food supply chain, with the main focus on food chain sustainability beyond the farm gate. The farm level is considered if it has direct impact on the sustainability of the other steps in the food chain.

SUSFOOD2 promotes a cross-sectoral and multi-disciplinary approach from biology to food engineering and social sciences. It addresses the following socio-economic and environmental goals: (i) to develop sustainable food systems from production to consumption, (ii) to increase food production sustainably whilst reducing waste in the food supply chain and limiting environmental impacts; (iii) to improve the quality of life by improving food quality in a sustainable way and to ensure the resilience of the food supply chain; (iv) to encourage sustainable consumer behaviours and food choices; (v) to improve competitiveness and economic growth in the European food industry with special attention to SMEs.
For more information, please consult: http://susfood-era.net

FOSC is the ERA-Net Cofund action on "Food Systems and Climate". FOSC is built upon and supported by the experience from FACCE-JPI and LEAP-Agri. FOSC was launched in October 2019 and will run for five years. The consortium consists of 28 partners from Europe, Africa and Latin America. FOSC addresses one of our world's major challenges: how to feed 10 billion people by 2050. The ambition of FOSC is to implement a range of joint activities to contribute to the creation of a strong and effective trans-national research and innovation network between Europe, Africa and Latin America.

The main challenge of FOSC is to contribute to the achievement of food and nutrition security within the context of sustainable food systems, considering the three dimensions of sustainability (social, environmental, and economic).

The main research themes of FOSC cover the following topics: i) Assessment of climate change-related risks for food value chains; ii) innovative technological solutions to build sustainable and resilient food value chains; iii) increased resilience and reduction of volatility in agri-food systems to sustainable improve food security in the context of climate change; iv) reduction of food losses under climate change, including the valorisation of side streams and reduction of food waste.

FOSC promotes a system approach that includes the addressing of scales: i) spatial scales – local, regional and global level, and ii) time scales, using the 2050 time horizon to include the expected climate risks and demographic changes. International and intercontinental collaboration within research projects and additional activities is an important aspect of FOSC. The global character of food chains asks for an international joint approach in the context of food system transformation. For more information, please consult: https://www.foscera.net

1.2 Background

The UN estimates the world population to reach 9.7 billion people by 2050 and for it to peak at 11 billion in 2100 (UN, 2019). Consequently, global demand for food is expected to increase significantly, intensifying the competition for natural resources and increasing environmental impacts such as greenhouse gas emissions, deforestation and land degradation from food production.

The food sector is by far responsible for the largest consumption of natural resource creating an enormous strain on the environment. An estimated 60% of global terrestrial biodiversity loss is related to food production; food systems account for around 24% of the global greenhouse gas emissions and an estimated 33% of soils are moderately to highly degraded due to erosion, nutrient depletion, acidification, salinization, compaction and chemical pollution.

In addition to the direct environmental impacts on natural resources of food production, 13.8% of food produced is lost “from the farm up to, but excluding, the retail stage”. A significant amount of raw commodities is wasted throughout harvesting, distribution, processing and manufacturing across the food supply chain. At low-income level countries, most waste occurs in the early stages of the supply chain, mostly due to inefficient harvesting systems, poor technology, or inefficient storage and transportation. At high-income level countries, as much as 50% of food wastage occurs at the household level. Food waste causes an unnecessary pressure on land, water and energy resources that in their turn generate 8–10% of all global greenhouse gas emissions. Moreover, loss of resources has related social and economic costs, with the yearly burden of wasted food estimated at €900 billion in economic costs and around €800 billion in social costs.

This situation stresses the need to increase the sustainability of our food systems to meet demand for food and support quality of life for present and future generations.

Sustainability of food systems is defined here as “a food system that supports food security, makes optimal use of natural and human resources, and respects biodiversity and ecosystems for present and future generations, which is culturally acceptable and accessible, environmentally sound and economically fair and viable, and provides the consumer with nutritionally adequate, safe, healthy and

affordable food".

However, food systems have become increasingly complex with interdependencies across distant geographical areas. Food systems functioning often depends on an intricate organisation of resources and activities in different parts of the world, as well as on a web of virtual and physical infrastructures and on multiple governance levels. Alongside positive outcomes, these interdependencies also generate system vulnerabilities to a wide range of factors and conditions, including system shocks.

Recent shocks, like the socioeconomic crisis provoked by the COVID-19 pandemic worldwide, and the desert locust plague in large parts of Africa and Asia, had dramatic and unexpected impacts on the life and livelihood of people, with important consequences for food systems functions and outcomes. This new interconnected world highlights the need for research directed to make food systems less vulnerable and more resilient to system shocks. In this context, resilience is defined as the ability to withstand, i.e. to better resist stresses and shocks and the capacity of this entity to bounce back rapidly from the impact. It entails the capability to cope with a shock, when it occurs, but also to be prepared to adapt better to a new situation.

Policy and research are increasingly concerned with the occurrence of major perturbations. The recent SCAR 5th Foresight Report "Resilience and transformation" highlights the importance of enhancing system resilience. It dedicates one section to lessons learned from the "COVID-19" pandemic and points out to "Coping with disaster" as one of the cross-cutting issues that must be addressed in future research on food systems.

Awareness of the highly diversified impacts that these shocks produce on different social groups is crucial to identify risks and solutions that affect different groups. In the words of the Foresight experts, "understanding how shocks hit some people and regions worse than others and how best to prepare for the unknown" is one of the main challenges we must face. Enhanced understanding of the trade-offs and synergies between food security, biodiversity, ecosystems and climate might support decision taking when system shocks occur.

The "European Union's Action Plan for Resilience" recommends increasing the effort to assess risk scenarios, reduce vulnerability and enhance the ability of individuals, communities and countries to absorb and recover from shocks. A logical option to meet this objective is the improvement of methodologies and tools to measure the risk of humanitarian crises and help to prevent, mitigate and prepare for them.
The European Commission's attention to these issues is made apparent in strategic documents like the EC COM "A clean Planet for all" and "From Farm to Fork", which highlight the importance of robust and resilient farming and food systems that function in all circumstances.

The development of more sustainable and resilient food systems is in line with the Sustainable Development Goals of the United nations and will bring opportunities for new technologies and business models that will concurrently improve environmental and human health outcomes, employment opportunities, prosperity, equity and the wellbeing of human communities.

Scope of the Call

This Joint Call initiative by SUSFOOD2/FOSC network originated under the premise that attaining resilient and sustainable food systems would require a transition from current linear food production systems, which are vulnerable to system shocks, to resilient circular systems that encompass efficiency, side-stream valorisation and avoidance of food loss and waste and consider the interdependencies within the systems and its stakeholders. Such a transition will have to be accompanied by substantial progress in the organisation and management of food systems and supported by the development of novel technologies, which will play a key role to support the transformation of food systems so that they operate within natural resource boundaries with minor climate change impact.

Food systems comprise food production activities, processing and packaging, distribution and retail, as well as consumption. Various factors, like environmental and socio-economic drivers, influence the systems and therefore, different approaches can affect the resilience and sustainability of such a complex network. Moreover, the diversity of food systems (local, high-tech, traditional, etc.) raise the need to find the right approach to increase their sustainability and resilience.

The aim of the Call is to foster scientifically excellent, multi-disciplinary and multi-actor research, development and innovation projects. We will support projects taking a food systems approach considering all relevant aspects that have potential to increase sustainability (Topic 1) and resilience (Topic 2). Spatial scales can be different, from local focus to projections at the regional or macro-regional levels.

2 Joint Call topics and cross-cutting issues

Interested project consortia should apply to one of the two topics:

- **Topic I: Innovations to improve food systems sustainability, with a focus on increasing resource efficiency and reducing waste**
- **Topic II: Food Systems adaptation and resilience to system shocks**

Please check the detailed topic description, national budgets and funding modalities for the different topics (Annexes A, B, D)!

Cross-cutting issues

We envisage that the transition towards sustainable and resilient food systems will need close consideration of the following cross-cutting issues. These issues should be considered and individually adapted to each project in order to increase the projects´ value and impact:

- **Multi-actor approach:** Involve different actors and stakeholders in your research project from the outset (by means of participation as well as transparent communication),
- **Multi-disciplinary approach:** Take account of different viewpoints and involve actors from the disciplines beyond your existing network. Bridging silos within food systems and across disciplines can strengthen a multi-disciplinary approach to sustainability and resilience.

- **Systems approach:** Consider interconnections, synergies or trade-offs between different aspects or actors that directly or indirectly affect your field of research on a systems level, considering all economic, environmental, social, legislative, geographical, behavioural, business and environment dimensions.

3 Funding modalities and who can apply

The following partner countries/regions will provide funds for the Call: **Algeria, Argentina, Belgium (F.R.S.-FNRS and VLAIO), Estonia, Finland, France, Ireland, Italy, Morocco, Norway, Romania, Turkey and the United Kingdom.** A list with the partners including the available funds per funder and topic can be found in Annex B.

The funding for transnational projects will be based on a virtual common pot instrument. This means that project partners who have been selected for funding will receive the grant directly from their national funding bodies according to their terms and conditions.

Institutions (legal entities) that are involved in research/innovation and operate in accordance with national rules, including companies and stakeholder organizations, are invited to apply.

Before preparation of the project proposals applicants are strongly advised to contact their respective National Contact Points (NCP) (see Annex C).

Research consortia must be comprised of a minimum of 3 independent legal entities from a minimum of 3 different SUSFOOD2/FOSC partner countries/regions participating with funding in a specific topic.

Research consortia are encouraged to consider the cross-cutting issues (see Chapter 2) as well as good geographical coverage regarding the consortium composition and/or the content of a project proposal in order to strengthen the impact. Applicants should avoid redundancy with the open Calls in H2020, including PRIMA.

Applicants who are not eligible for funding by their national funding body or applicants from countries not participating in the Call are welcome to joint research consortia, but will have to provide in-kind contribution and will not receive any funding (associated partners). They will not be included in the required minimum number of partners in the consortium and they cannot be the coordinator of the project. Such partners should state in advance the source of funding for their participation in the project. A letter of commitment must be included in the proposal application confirming the source of funding.

The maximum budget that can be requested is 1.5M EUR per research proposal, but in-kind contributions may be added on top of this amount. Applicants cannot request more funds than allocated for each country by respective funding body on a specific topic (Annex B). National regulations

and priorities might set further limits (Annex D). Projects should tentatively start between December 2021 and April 2022, and the duration should not exceed 36 months[1].

A complete list of the eligibility criteria can be found in the Chapters "General eligibility check of proposals" and "National/regional eligibility check" (see Chapters 7.2, 7.3).

For further questions regarding the eligibility criteria, please contact the Call Office; for questions regarding national rules and priorities please contact the National Contact Points listed in Annex C.

4 Coordinator of the research consortium

Each project consortium needs to appoint a project coordinator. The project coordinator has the following role and responsibilities:

- Check the national regulations and funding modalities of all involved countries to ensure the eligibility of the project,
- Lead the consortium through the application procedure and be responsible for the correct submission of the proposal. The coordinator should create the account to submit the proposal in the online submission tool,
- Be responsible for the overall project coordination and act as the central contact point for the consortium during the full lifespan of the research project,
- Inform the Call Office about any event that might affect the implementation of the project,
- Ensure that all work is carried out to a high standard and meets contractually bound deliverables and milestones presented in the proposal and approved by the funding bodies,
- Be responsible for sharing all information with the consortium partners,
- Be responsible for timely delivery of monitoring data and project reports,
- Ensure that the project fulfils its obligations set up for selected and funded projects.

The project coordinator will not be responsible for the financial management of the project funding, which will be handled directly between the consortium members and their corresponding national funding bodies.

[1] Time extensions may later be granted to funded projects according to the applicable rules of the various funders involved.

5 Time schedule

The Joint Call will follow a 1-step procedure. A time schedule is provided below.

Action	Schedule
Launch of the Call	17 May 2021
Webinar for interested applicants	2 June 2021
Closing date for submission of proposals	**16 August 2021 - 3 p.m. CEST**
Expert evaluation and Selection of projects	Until November 2021
Notification letters sent to applicants	Begin of December 2021
Contract negotiations	December 2021 onwards
Start of projects	December 2021 – April 2022

Technical Helpdesk:

Frank Hensgen
Project Management Juelich (DE)
Tel. +49 2461 3403345
E-mail: f.hensgen@fz-juelich.de
http://www.fz-juelich.de/ptj

Call Office contacts:

Lucie Link Andeltova
Federal Office for Agriculture and Food (BLE, DE)
Tel. +49 228 68453907
E-mail: lucie.link-andeltova@ble.de
https://www.ble.de

Denise Gider
Federal Office for Agriculture and Food (BLE, DE)
Tel. +49 228 68453734
E-mail: denise.gider@ble.de
https://www.ble.de/

6 Submission, partnering tool and webinars for applicants

The Call will be implemented using an online submission tool. It consists of a platform, where applicants can find all information necessary for the preparation and submission of proposals. The submission tool is available following this link: www.submission-susfood-era.net/sf2-fosc-jointcall
In addition, a **partnering tool** is attached to the submission platform, where project partnerships can be offered or searched for.

On 2nd June 2021 a webinar for interested applicants will be organised, which will give an overview about all relevant aspects of the Call (i.e. topics, conditions, requirements, proposal submission, evaluation, etc.) and provides time to answer open questions.
Furthermore, **a webinar about the Food Systems approach** will be provided. Detailed information about the webinars will be released directly on the submission tool website in due time.

The Call will be promoted at national/regional level via the usual channels of communication.

7 Proposal submission and selection

7.1 Submission procedure

The application procedure will be carried out online using a Call submission tool www.submission-susfood-era.net/sf2-fosc-jointcall

No other methods or means of submissions will be accepted. It will be possible to update and save the proposal as many times as required before the submission deadline, but not after the deadline has expired. All parts can be saved, and revisions can be re-submitted until the deadline.
After the closing date, information given in the proposal, including each partner's budget, is binding.
Applicants should note that the online system may experience high traffic volumes in the last hours before the submission deadline and it is therefore highly recommended to submit the final version of the proposal well in advance of the deadline to avoid any last minute technical problems. Requests for extensions to the deadline due to last minute technical problems will not be considered.
Please follow the instructions on the website to submit the proposal.
The application should be submitted by the project coordinator on behalf of the project consortium.

The proposal must be written in English and consists of the following parts:
More detailed information, including the number of characters for each part, is available on the submission website (proposal template and directly in the tool). Please be aware that the submission tool outline and order can differ from the summary below.

Project information (filled in by the coordinator)

- Title, Acronym, Keywords and Duration
- Topic: 1 or 2
- Publishable project summary that can be also easily understood by non-experts (2000 characters)
- Optional: Pictures/Figures

Partner information (information about coordinator and every partner, to be filled in by each partner)

- Personal information (Title, name, professional address, telephone number, etc.)
- Information about organisation (Name, status, address, research group, etc.)
- References (up to 5) relevant to the proposal including links to the articles or abstracts

Project budget in k€ (filled in by coordinator for each partner)

- Personnel, travel, consumables/equipment, subcontracts, other costs (requested funding and own contribution for each budget item)
- Short narrative explanation for each budget item
- Besides own project meetings, all project consortia should calculate costs for the attendance of a project representative (coordinator or a substitute) to three mandatory joint-project seminars (kick-off-, midterm- and final meeting) in their project plan. The attendance of more than one representative per project is possible

Background and state-of-the-art (4000 characters)

- Description of the background and state-of-the-art in the field including a brief statement how the project will contribute to scientific development and address gaps in existing knowledge

Description of work (24.000 characters)

- Relevance of the research proposal:
  - Project objectives and main hypothesis
  - Relevance to the Call scope
- Research approach:
  - General approach and methodology
  - Brief description of the work plan (including provisional project structure, work packages, collaboration among partners and complementarity of partners and disciplines to reach the project objectives)
- Impact:
  - Expected impact (considering cross-cutting issues: multi-actor/ multi-disciplinary and system approach)
  - Innovation potential (ambition and novelty in relation to the state-of-the-art)
  - Added value of the transnational collaboration and geographical relevance

Plans for Communication, Dissemination and Exploitation and Data Management

- Communication, Dissemination and Exploitation Plan (including Stakeholder Engagement): A plan for communication, dissemination and exploitation of the results has to be provided and is considered in the evaluation procedure. In addition the plan should also give information on stakeholder engagement throughout the course of the project.
- Data Management Plan: Each proposal must include a one page Data Management Plan to ensure the availability of data generated by the research proposed.

Ethical issues

- Indication that the research project is carried out in accordance with the European Union and the respective national requirements (Chapter 8)

Proposals that do not include <u>all</u> the compulsory information or do not meet the formal requirements of the Call announcement will not be considered for funding.

The closing date for submission of proposals is **16 August 2021 - 3 p.m. CEST**.

7.2 General eligibility check of proposals

After the closing date for submission all proposals will be checked against the mandatory eligibility criteria:

- The application must be written in English,
- Research consortia must consist of at least three eligible independent legal entities from a minimum of three different partner countries participating with funding in a specific topic,

- Applicants who are not eligible for funding by their national funding body or applicants from countries not participating in the call are welcome to be partner in a research consortia on their own costs, they cannot be coordinator and are not counted for the required minimum number of partners,
- The maximum duration of a project is 36 months,
- The requested total funding cannot exceed 1.5 M€ per proposal,
- Total eligible budget per country/region must not exceed 70 % of the total eligible project budget in order to achieve balanced partnerships and ensure that responsibility and risks are shared.

7.3 National/regional eligibility check

The funding bodies will check the proposals against national eligibility criteria as described in the National Regulations (Annex D).
Each project partner involved in an application has to check if the respective national funding body requires the submission of a national application and to assure that requested costs and thematic areas (topics) are in line with the national eligibility, published in the Indicative Call budget and National Regulations (Annexes B, D). In case of uncertainties regarding the national funding criteria and regulations, please contact your National Contact Point (Annex C).

In case one partner of a project consortium is not eligible, the Call Board, which consists of all funding bodies, will reject the entire proposal.

Proposals which are eligible in terms of general and national/regional eligibility criteria will be part of the expert evaluation.

7.4 Expert evaluation of proposals

The evaluation of eligible proposals will be performed by a peer review expert panel. This panel is composed of international experts with acknowledged scientific excellence and high expertise of the underlying sectors. The members of the panel are proposed and selected by the Call Board considering the research areas covered by the submitted proposals. Appointed experts will need to strictly respect the Call Boards' standards and rules for impartiality and confidentiality.

Each proposal will be evaluated by (at least) three independent experts against the following criteria:

- **Excellence of the research proposal**: scientific quality of objectives; ambition in relation to the call scope and topic addressed; innovative progress beyond the state-of-the-art.
- **Relevance and potential impact:** coherence and pertinence of the objectives; contribution to the scope of the joint call and the selected topic; potential to reach expected impact and innovations, embracing of cross-cutting issues, added value of transnational cooperation and geographical coverage; communication and dissemination to stakeholders; extent to which the outputs of the project will be relevant for, or contribute to, impacts on: Economic aspects, Environmental aspects, and Societal aspects.
- **Quality and efficiency of the implementation:** appropriateness and soundness of the research approach and methodology; quality, feasibility and effectiveness of the work plan;

complementarity/competences/diversity of partners and disciplines; adequacy of the budget and balance between partners in terms of activities; appropriateness of the management structures and procedures including risk management; capacity building activities; soundness of the Communication, Dissemination and Exploitation Plan and valorisation and exploitation of the results; Data Management Plan; Ethics assessment.

The three criteria are equally weighted and will be scored independently, using scores from 0-5 for each criterion. A threshold of 3/5 for each criterion and an additional overall threshold for the sum of the three criteria of 10 (out of possible 15) will be applied, i.e. proposals with a mean score < 3 of 5 in any main criterion or with an overall sum <10 will not be recommended for funding. The evaluation by the peer review expert panel will result in a sum of the three assigned scores for each proposal, which will be used to establish one ranking list.
The outcome of the selection procedure will be communicated by the Call Office to the project coordinators, who are responsible to inform their project partners about the result.

8 Ethics assessment

An ethics assessment is required for submission of each proposal. Work involving the use of animals or humans should be carried out under the appropriate authorization taking into account the European Union and national ethical requirements. Any proposal, which seems to contravene fundamental ethical principles, shall not be selected and may be excluded from the evaluation and selection procedure. Judgement of the significance of ethical issues will be made by using the criteria published by the Commission in its guidelines for the Horizon 2020 Framework Programme.

The guidelines address, in more detail, the following ethical issues: human embryos & foetuses, human beings, human cells or tissues, personal data, animals, non-EU countries, environment, health & safety, dual use, exclusive focus on civil applications. Potential misuse of research results, other ethics issues and if the proposal raises one of the issues listed, the applicant is required to complete the ethics self-assessment and provide a support documentation referred to in the ethics issues checklist. Please consult Horizon 2020 Programme Guidance How to complete your ethics self-assessment.

In addition applicants can consult on the EC Website the Guidance Note – Ethics and Food-Related Research on core issues of ethical concern in the field of food-related research including appendix that addresses broader concerns in the field of food ethics.

9 Confidentiality & Conflict of Interest

The proposals will be handled confidentially by the Call Office, by the national/ regional funding bodies and the mandated experts responsible for the peer review evaluation of the proposals.
Each expert will have to sign a Declaration of Conflict of Interest, Confidentiality Disclosure Agreement and Code of Conduct Agreement. The online evaluation tool will include a feature which will prevent access to the respective proposal in case a Conflict of Interest is declared by the expert or by the Call Office.

10 Obligations for funded projects

Terms of participation

The national/regional funding of this Call is provided under the coordination of the Cofund ERA-NETs SUSFOOD2 and FOSC. The partners of the research consortia are required to recognise the coordinating role of SUSFOOD2/FOSC throughout the duration of the funded research projects until the delivery and acceptance of the final project report.

Consortium Agreement

The consortia selected for funding are advised by the Call Board to enter into a Consortium Agreement, in order to manage the project activities, finances, intellectual property rights (IPR) and to avoid disputes which might be detrimental to the completion of the project. The Consortium Agreement must specify in particular (i) the sharing of the intellectual property rights of the project results; (ii) the conditions of publication / dissemination of the results; (iii) the technology transfer and the exploitation of the project results.

It will be the responsibility of the project coordinator to draw up a Consortium Agreement suitable to the respective consortium. The purpose of this document is to underpin the project partners' collaboration and provide the project partners with mutual assurance on project management structures and procedures, and their rights and obligations towards one another.

In some countries, such an agreement might be required for release of the funds. Applicants have to comply with Call Board indication and respective National Regulations regarding this issue.

Support for the preparation of a Consortium Agreement can be found on the DESCA webpage.

Start date of projects

The project coordinator is responsible for informing project partners about the selection result, for the implementation of possible conditions and recommendations and for synchronising the project start among the partners. A project can start when all national contracts have been concluded, exceptions from this rule must be agreed by the respective funders and the Call Office. Once the national contracts come into force, eligible national costs may be claimed according to the national procedures.

Projects should start between December 2021 and April 2022.

Publishable data

A list of the funded projects will be published after the proposal selection. Therefore applicants should be aware that the following information from the proposals may be published:

» Project title and project acronym,
» Duration of the project,
» Total funding of the project,

» Name of the project coordinator (including professional contact information e.g. email and telephone number),
» Name of each project partner,
» Country and organisation name of each partner
» The publishable summary of the project from the application.

Information on each funded project, including data on each participant and overview on the achieved results will be sent to the European Commission after the end of the project period.

With the submission of the proposal all project partners agree that the above mentioned information can be published. All personal data offered for project applications, reviewers and expert assessments, mailing lists, tracking websites, registration for activities and events will be collected, stored and processed in accordance with the General Data Protection Regulation (GDPR) (Regulation (EU) 2016/679). A data protection officer (DPO) is appointed to ensure compliance GDPR rules. For more information please consult the privacy policy on the submission website.

National/ regional contracts

The Joint Call is a collaboration between national/regional funding bodies with the aim of establishing transnational research collaboration. However, the contracts with project participants as well as funding procedures and regulations remain the full responsibility of the national funding bodies according to applicable national/regional funding rules. After the project has been selected, the project partners will be contacted by their national/regional contact points in order to start the grant negotiation and accomplish the remaining steps until the research project can start.

Financial issues and changes to the work plan or consortium

For the whole duration of the project, it is the responsibility of the project coordinator to inform the Call Board/Call Office about any changes in his project, i.e. modifications within the work plan, project consortium or contract. The changes will need to be approved by the respective funding bodies.

Project monitoring, meetings and reporting

Partners from each funded project are expected to organise regular project meetings. The costs for these meetings should be included in the project budgets. To enhance dissemination of the project results, additionally or in parallel to the own project meetings, all project coordinators should calculate costs for the attendance of **three mandatory joint network meetings (kick-off-, mid-term- and final meeting)** in their project plan.

An internal SUSFOOD2/FOSC monitoring group will follow up the work performed by the projects' consortia and may attend the project meetings. In order to promote coherence, project coordinators will be required to submit a mid-term and a final report to the funders about the results of their transnational project as a whole (in addition to reporting required by the national funding bodies).
Detailed information on the reporting and monitoring procedures as well as templates will be provided to the coordinators of the proposals selected for funding in due time.

Communication, dissemination and exploitation of results

Communication, dissemination and exploitation of project outputs is obligatory and in the responsibility of the funded project partners. A **Plan for communication, dissemination and exploitation of results including information on stakeholder engagement** has to be provided in the proposals and is considered in the evaluation procedure. This can be organized in form of various communication paths such as scientific papers, posters, stakeholder involvement, course or training material, web-based tools, workshops or direct intervention towards end users. For more information please read the "Guidance on Communication, Dissemination and Exploitation" (Annex E).

We strongly support the European Commission´s recommendation to make research results from public-funds more accessible and thereby strengthening the knowledge base for science and the society alike. For more information please refer to the Commission´s information on Open Science (Open Access) and Guidelines on FAIR Data Management in Horizon 2020.

It is the project partner's obligation prior to the submission of the full proposal to consult the national regulations for funding of open access fees or contact the respective NCPs.

Data Management Plan

Each full proposal must include a one page **Data Management Plan** to ensure the availability of data generated by the research proposed.

This plan should detail how the project partners will manage the research data generated and/or collected during the project.

A detailed description of the content and structure of a Data Management Plan can be found in **Annex F**.

Intellectual property rights, use and access to results

Intellectual Property Rights (IPR) will need to fulfil the legal requirements in the bilateral agreement between the research organisation and the national funding body as set out within the National Regulations. Further, results and new Intellectual Property Rights (IPR) arising from research projects funded through the Joint Call will be owned by the project partners according to the conditions stated in their Consortium Agreement

Researchers are encouraged to actively exploit the results of the research project and make them available for use, whether for commercial gain or not, for public benefit to be obtained from the knowledge created.

11 Definitions

Call Board: funding bodies of the Joint Call.

Call Office: responsible for administrative support regarding the Call, Call documents and procedures, submission tool and webinar.

Food system: "Food systems comprise food production activities, processing and packaging, distribution and retail, as well as consumption. At the same time the diversity of food systems (local, high-tech, traditional, etc.) raise the need to find the right approach to increase their sustainability and resilience. Various factors, like environmental and socio-economic drivers, influence the systems and therefore, different approaches can affect the resilience and sustainability of such a complex network" (definition outlined in Chapter 1.2).

SUSFOOD2/FOSC fully endorse the EU Food 2030 strategy and its approach to the concept of Food System. For further information:

- https://publications.europa.eu/en/publication-detail/-/publication/76d1b04c-aefa-11e7-837e-01aa75ed71a1
- https://www.youtube.com/watch?time_continue=126&v=gJaD2tvoQWE

Sustainability of food systems: "A food system that supports food security, makes optimal use of natural and human resources, and respects biodiversity and ecosystems for present and future generations, which is culturally acceptable and accessible, environmentally sound and economically fair and viable, and provides the consumer with nutritionally adequate, safe, healthy and affordable food" (definition outlined in Chapter 1.2).

Annex A: Call topics

Topic I: Innovations to improve food systems sustainability, with a focus on increasing resource efficiency and reducing waste

Background

Improving food systems sustainability is a challenging endeavour, because the complexity of food systems requires a holistic and coordinated approach to avoid undesired effects from actions in specific supply chain areas in other sections. All stakeholders and elements within food systems, as well as the relationships and related effects across the supply chain must be taken into account.

In order to be sustainable, food systems need to generate positive value along three dimensions at the same time: economic, social and environmental. Given the urgency of the climate crisis and the fact that current unsustainable food systems contribute to climate change in a profound way, sustainable food systems have to meet the environmental dimension of sustainability, which means climate smart and reduced contribution to climate change.

An additional challenge is to balance aspects of food production related to the social dimension of sustainability, more precisely public health, accessibility to food and consumer satisfaction such as preserving the product quality (including food safety, food security and nutritional value) and important characteristics (taste, affordability) required by the consumers. An option to improve the sustainability of food systems without compromising food security and quality is to increase efficiency and circularity of resource use throughout the whole food systems and to reduce food loss and waste. However, sustainable food systems are not only efficient but are also based on sufficiency, while enabling sustainable food production and processing, and are consistent with the carrying capacity of ecosystems, the ecological balance and the territorial, cultural and socio-economic context.

To further support the transition towards a sustainable, resilient, efficient, competitive and profitable food and drink sector as well as better planning and organisation of the value chain, in combination with a systemic approach, it is essential to consider all the steps involved in food production from farm to fork.

Research to develop these systematic changes will need a combination of expertise from various areas and dialogue with relevant stakeholders in the food systems to improve acceptability and practical uptake of results.

Research Themes

Towards this overall aim, an exemplary but not exhaustive list of possible research themes related to these objectives is presented below. The listing order does not reflect priorities.

- Identification of leverage and intervention points to improve food systems sustainability by reducing the use of non-renewable resources (water, energy, land);
- Reduction of food loss and waste in food systems;
- Consideration of the circular economy concept and redesign of the food value chain from farm to fork towards sustainability, (climate) resilience and diversity, with a focus on valorisation and use of side streams to retain resources in the system as long as possible, and implementation of sustainable materials and products;
- Assessing and/or developing methods to improve the sustainability of the packaging, transport and storage of food (smart logistics, improved storage or recycling technologies);
- Analysis of the effects and potential trade-offs of new products, services, businesses and marketing strategies that promote new sustainable ways for actors along the value chain;
- Identification of incentives and barriers to the uptake of existing strategies, solutions and tools (e.g. reusable shoppers and food containers, minimal packaging designs, last-minute marketing platforms and applications, other digital technologies), validation of the benefits of these strategies for users/consumers, and assessment of technical and economic performance at a system level;
- Analysis of the influence of socio-economic aspects and consumer behaviour on sustainability;
- Analysis of the impact of increased sustainability and sufficiency of food systems on the socio-cultural environment.

Expected Outcomes

- Increased understanding of the effects and impacts of new and emerging technologies to support the shift towards sustainable food systems;
- Evaluated critical points and intervention points and recommended actions to improve the sustainability of food systems;
- Improved efficiency in the use and re-use of raw materials and resources (energy, water etc.) on the food system level, and hence reduced negative impacts on the environment;
- Better understanding of socio-economic drivers and leverage points to reduce food waste within whole supply chains and food systems;
- Intervention strategies to reduce waste in the food chain and re-use of valuable components to the benefit of industry, policy makers and end-users;
- Increased uptake of technological and social innovations, contributing to greater circularity and sustainability within food systems;
- Assessments of the relevance of socio-economic determinants on sustainable diets and behaviour.
- Improve the understanding of how to mainstream resource efficiency and sufficiency on consumer level.

Topic II: Food Systems adaptation and resilience to system shocks

Background

The need for food systems less vulnerable and more resilient to changing environments and shocks has been dramatically exacerbated by recent crises, like the COVID-19 pandemic and the desert locust plague. The COVID-19 pandemic is an unprecedented event in modern times and, among other devastating impacts on human lives and livelihoods it represents a huge challenge to existing practices in the global food systems. The origin of the pandemic seems to be related to food markets, and its direct and indirect effects on the food systems range from the disruption of food chains under lock-down regimes to the breakdown of some system activities due to population density in a location. Less debated in the media, but still dramatic in its effects, is the shock created by the 2019-2021 desert locust plague, which is threatening the food security of East Africa, the Arabian Peninsula and the Indian subcontinent.

More shocks are expected due to climate change. Climate change is not a shock in a strict sense, but rather a stressor that progressively modifies the conditions under which farming and other food systems functions interact. Tackling climate change is a challenge in itself, and the food systems are called to contribute towards climate change mitigation (as addressed in Topic 1), and to flexibly react to it.

Climate change is leading to the occurrence of more frequent “extreme weather events”, often geographically focused. We refer to well-known events like floods, droughts, wildfires, etc. Moreover, climate change influences other shocks like pests or diseases, or sudden biodiversity losses that weaken or endanger the delivery of ecosystem services.
In addition, the increasing complexity of our societies, alongside benefits and positive outcomes, leads to exposure to other kinds of shocks, like political shocks, technological breakdowns or market shocks and financial crises. Many of these shocks are inter-related, sometimes mutually reinforcing. Some are to a certain extent known, although not fully predictable, others are unknown and cannot be predicted, like natural disasters. However, each of them affects the food systems in specific ways and uncertainty shall not be an argument for inaction.

This topic focuses on the exploration of food systems vulnerability to shocks and the identification of solutions aimed at improving the capacity to adapt and to be resilient when single or multiple shocks occur. Projects must contribute to the identification and assessment of possible solutions for increasing food systems’ resilience to system shocks. This could also require the exploration of shocks and related challenges and mapping them.

Research Themes

Towards this overall aim, an exemplary but not exhaustive list of possible research themes related to these objectives is shown below. The listing order does not reflect priorities.

- Identifying and assessing the possible shocks that can impact food systems;
- Pin-pointing elements, activities and outcomes of the food systems that are most vulnerable to the various types of shocks. For example, the functioning of market channels and logistics are among the system activities that can be mainly impacted by a pandemic, whereas farming can be mainly impacted by extreme weather events;
- Understanding how and why shocks hit some regions or some social groups worse than others and which measures can be explored;
- Understanding the societal aspects of resilience-oriented innovation, analysing how social and cultural habits can either speed up or slow down change.
- Identifying and testing solutions to reduce the impact of possible system shocks, with particular regard to the loss of food security, and to enhance system resilience. Different shocks may require different solutions;
- Exploring and suggesting manageable solutions to be prepared for the unknown and minimising risks related to threats that are less predictable and less known than the ones we are already facing. These solutions include, but are not limited to, the development of prevention measures, and the valorisation of diversity at various levels: from agro-biodiversity to diversity in supply chains, business models, dietary habits, etc.;
- Identifying and analysing synergies and trade-offs, between solutions for resilience and efficiency, as well as possible trade-offs among solutions (organisational, technological, economic, and so on) tailored to face different types of shocks;
- Exploring solutions for a better interaction between policy, economy, research, education and society to strengthen food system resilience;
- Understanding positive effects of shocks.

Expected Outcomes

- Forecast and horizon scanning for possible shocks and of vulnerable activities and outcomes of food systems with a focus on specific regional or social groups;
- Description of the societal influence on resilience-oriented innovation, with attention to how social and cultural habits can either speed or block change;
- Solutions to reduce the impact of system shocks, with particular regard to the loss of food security, and to enhance system resilience;
- Recommendation of food policies from local to transnational level that foster sustainable food systems, including food system adaptation and resilience to system shocks.
- Solutions for preparedness for the unknown and for minimising risks related to less predictable threats;
- Identification of synergies and trade-offs between different solutions for the same shock or for different types of shocks.

Annex B: Indicative Call budget (in 1000 EUR)

Country	Institution	TOPIC 1	TOPIC 2	Total
Algeria	Directorate General For Scientific Research and Technological Development (DGRSDT)/ Ministry of Higher Education and Scientific Research (MESRS)	50	50	100
Argentina	National Institute of Agriculture Technology (INTA)	x	x	100
Belgium	Fonds de la Recherche Scientifique – (F.R.S.-FNRS)	x	x	200
Belgium	Flanders Innovation and Entrepreneurship (VLAIO)	x	x	1000
Estonia	Ministry of Rural Affairs (MEM)	x	x	100
Finland	Ministry of Agriculture and Forestry (MMM)	x	x	300
France	The French National Research Agency (ANR)		x	2000
Ireland	Department of Agriculture, Food and the Marine (DAFM)	x	x	650
Italy	Ministry of Agricultural Food and Forestry Policies (MIPAAF)	200	400	600
Morocco	Ministry of National Education, Vocational Training, Higher Education and Scientific Research (MENFPESRS)	x	x	400
Norway	The Research Council of Norway (RCN)		x	1000
Romania	The Executive Agency for Higher Education, Research, Development and Innovation Funding (UEFISCDI)	x	x	500
Turkey	The Scientific and Technological Research Council of Turkey (TÜBİTAK)	x	x	500
United Kingdom	Department for Environment, Food and Rural Affairs (DEFRA)	x	x	400[2]
Total Call Budget				7850

[2] DEFRA (UK) - The contribution of DEFRA (UK) is £350,000 (British pound sterling); the exchange rate from sterling to EUR will be applied at the time of SUSFOOD2/FOSC Call publication.

Annex C: National Contact Points (NCP)

Country	Funding body	Name	Telephone	E-mail
Algeria	**MESRS**	Hamza Merabet	+213 21278818	h.merabet@mesrs.dz h.merabet@dgrsdt.dz
Argentina	**INTA**	Alejandro Valeiro	+54 91134214156	Valeiro.alejandro@inta.gob.ar
Belgium	**F.R.S.-FNRS**	Joël Groeneveld	+32 25049270	joel.groeneveld@frs-fnrs.be international@frs-fnrs.be
Belgium	**VLAIO**	Marianne Claessens	+32 494494064	Marianne.claessens@vlaio.be
Estonia	**MEM**	Gret-Kristel Mällo	+372 6256553	gret-kristel.mallo@agri.ee
Finland	**MMM**	Suvi Ryynänen	+358 295162126	suvi.ryynanen@mmm.fi
France	**ANR**	Claude Yven	+33 173548287	claude.yven@agencerecherche.fr
Ireland	**DAFM**	Noeleen McDonald Aidan Holohan	+353 873826054 +353 873807504	Noeleen.mcdonald@agriculture.gov.ie Aidan.holohan@agriculture.gov.ie
Italy	**MIPAAF**	Serenella Puliga Elena Capolino Alice Albertini	+39 0552492220 +39 0646655076	s.puliga@politicheagricole.it e.capolino@politicheagricole.it alice.albertini.ext@politicheagricole.it
Morocco	**MENFPESRS**	Ahmed Hammouch Abdelouahid Ezzarfi Anas Chokairi Jihane Benarafa	+212 537217649 +212 672210327 +212 537217653/ +212 672210357 +212 662552446	ah.hammouch@gmail.com a.ezzarfi@yahoo.fr chokairi.anas@gmail.com jbenarafa.drsi@gmail.com
Norway	**RCN**	Thorbjørn Gilberg	+47 22037433	thgi@rcn.no
Romania	**UEFISCDI**	Adrian Asanica Luciana Bratu Andreea Popa	+40 744450011 +40 213071987 +40 21 3071991	adrian.asanica@uefiscdi.ro luciana.bratu@uefiscdi.ro andreea.popa@uefiscdi.ro
Turkey	**TÜBİTAK**	Mustafa Emre Sarı	+90 3122981265	emre.sari@tubitak.gov.tr
United Kingdom	**DEFRA**	Jessica Finch Victor Aguilera	+44 2087201395 +44 2080264253	jessica.finch@defra.gov.uk victor.aguilera@defra.gov.uk

Annex D: National regulations

Algeria

Country	Algeria	
Funding organisation	Directorate-General for Scientific Research and Technological Development (DGRSDT)	
National contact person	Mr Hamza Merabet Deputy Director – DGRSDT Tel/Fax:+213- 21 27 88 18 Mobile: +213 770 87 95 13 E-mail: h.merabet@mesrs.dz h.merabet@dgrsdt.dz	
Overall Funding commitment [€]	100,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: 50,000	Topic 2: 50,000
Maximum funding per grant awarded to a project [€]	50,000	
Eligibility of partners	This call is open to Algerian legal entities established and based in Algeria. The Algerian partner could be: a team/ a division/ a laboratory/ a research centre/ a research unit or a public or private research entity from socio economic sector. The partner responsible for the project should have the means and heavy facilities for a better implementation of the proposed project.	
Eligibility of costs, types and their caps	**List of eligible costs** **Reimbursement of expenses** -Travel costs of Algerian researchers in Algeria and abroad (7 days maximum). -Scientific events: organizational expenses, accommodation, catering and transport. -Investigators fees. -Guide fees. -Experts and consultants fees. -Study, work and services costs done for the research entity. **Equipment and furniture** -Materials, scientific and audiovisual instruments. -Renewing computing materials, purchasing accessories, software and consumables. -Maintenance and repair. **Supplies** -Chemicals. -Consumables. -Electronic, mechanical and audiovisual components. -Stationery and office furniture.	

	-Periodicals. -Documentation and research books. -Laboratory furniture (animals, plants, etc...). **Additional charges** -Printing and publishing. -Postage charges. -Telephone, Fax and Internet. -Other costs (taxes, custom duty, financial costs, insurance, storage costs, etc). -Data bank (acquisition and subscribing). **Car park** -Car rent for research in the field. **Costs of valorization and technological development** -Costs of training and support of project holders. **Costs of intellectual property** -Anteriority research. -Patent, brand and template deposit request. -Software deposit. -Protection of vegetable, animal abstentions and other. -Costs of representatives. -Costs of design and definition of the project to be developed. -Incubation costs. **Costs of valorization services** -Costs of design and developing prototypes, mock-ups, test series, pilot facilities and demonstrations. **Additional information** **Funding Institution:** Ministry of Higher Education and Scientific Research (MESRS). Directorate-General for Scientific Research and Technological Development (DGRSDT). Contact Person: Hamza Merabet, E-mail: h.merabet@mesrs.dz **Name of the Funding Party, address and country** Ministry of Higher Education and Scientific Research (MESRS). Directorate-General for Scientific Research and Technological Development (DGRSDT). 128 Chemin Mohamed Gacem, El Madania – Alger, Algérie. http://www.dgrsdt.dz **NB:** It should be noted that according to the provisions of the regulations in force, other costs under the international projects are subject to a request for the DGRSDT.
Submission of the proposal at national level before the submission deadline	Not necessary.

Submission of other information at national level before the submission deadline	Not necessary.
Further guidance	/

Argentina

Country	Argentina	
Funding organisation	National Institute of Agriculture Technology (INTA)	
National contact person	Alejandro Valeiro valeiro.alejandro@inta.gob.ar	
Overall Funding commitment [€]	100,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: not applicable	Topic 2: not applicable
Maximum funding per grant awarded to a project [€]	100,000	
Eligibility of partners	The call will be restricted to INTA researchers within the usual institutional planning system.	
Eligibility of costs, types and their caps	Funding eligibility includes travel and per diem, consumables and other agreed costs, but no investments or personnel expenses.	
Submission of the proposal at national level before the submission deadline	All applications requesting financing for Argentina under this call must include a letter of support from INTA.	
Submission of other information at national level before the submission deadline		
Further guidance	a. Proposals must meet the general eligibility criteria established by the Joint Call document and fit within the mission and strategic objectives of INTA. b. All applications requesting financing for Argentina under this call must include a letter of support from INTA. c. The call will be restricted to INTA researchers who work in the selected research areas. d. Proposals must include a plan for dissemination of information. e. All intellectual property that may arise from the projects supported by this call will be managed through an IP Plan. Proposals should generally indicate how IP will be managed, with a full IP Plan developed at the procurement phase. f. Proposals must not exceed 36 months of project duration. g. INTA will prioritize proposals that adopt a holistic approach to the problem.	

Belgium (F.R.S.-F.N.R.S)

Country	Belgium
Funding organisation	Fonds de la Recherche Scientifique – FNRS (F.R.S.-FNRS)
National contact person	Joël Groeneveld Tel.: +32 2504 9270 joel.groeneveld@frs-fnrs.be international@frs-fnrs.be
Overall Funding commitment [€]	200,000
Funding Distribution per Topic, if applicable [€]	N/A
Maximum funding per grant awarded to a project [€]	200,000
Eligibility of partners	All eligibility rules and criteria can be found in the PINT-MULTI regulations. **This call is NOT co-funded (See article III.6).**
Eligibility of costs, types and their caps	All eligibility rules and criteria can be found in the PINT-MULTI regulations. **This call is NOT co-funded (See article III.6).**
Submission of the proposal at national level before the submission deadline	Applicants to F.R.S.-FNRS funding must provide basic administrative data by submitting an administrative application E-SPACE within 5 working days after the general deadline of the SUSFOOD2/FOSC call to be eligible. Please select the "PINT-MULTI" funding instrument when creating the administrative application.
Submission of other information at national level before the submission deadline	It is advisable to contact the F.R.S.-FNRS before submission of the proposal.
Further guidance	https://www.ncp.frs-fnrs.be/appels/era-nets

Belgium (VLAIO)

Country	Flanders – Belgium	
Funding organisation	Agency for Innovation and Entrepreneurship (VLAIO)	
National contact person	Marianne Claessens	
Overall Funding commitment [€]	1,000,000 (can be increased if necessary)	
Funding Distribution per Topic, if applicable [€]	Topic 1: No distribution	Topic 2: No distribution
Maximum funding per grant awarded to a project [€]	< 500,000	
Eligibility of partners	Evaluated during extended eligibility period. Valorization in Flanders in terms of FTE and investment is required.	
Eligibility of costs, types and their caps	idem	
Submission of the proposal at national level before the submission deadline	Yes, during extended eligibility period	
Submission of other information at national level before the submission deadline	Yes, additional templates to be completed	
Further guidance	We do not fund projects that are related to war and arms.	

Estonia

Country	Estonia	
Funding organisation	Maaeluministeerium (MEM)	
National contact person	Gret-Kristel Mällo Tel.: +372 6256553 gret-kristel.mallo@agri.ee	
Overall Funding commitment [€]	100,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: 100,000	Topic 2: 100,000
Maximum funding per grant awarded to a project [€]	The total requested funding for all Estonian partners within one consortium may not exceed 100,000 € (VAT is included).	
Eligibility of partners	Ministry of Rural Affairs will fund research institutions, only.	
Eligibility of costs, types and their caps	There is a 5% of own contribution required upon total budget of the project.	
Submission of the proposal at national level before the submission deadline	It is not necessary to submit any additional national application forms to the Ministry; a transnational application to the central Call Office is sufficient. However, it is strongly recommended to contact the NCP to discuss eligibility criteria before submitting the proposal.	
Submission of other information at national level before the submission deadline	The application must meet requirements of eligibility determined by the national programme “Applied Research and Development in Agriculture 2015-2021”. Scientific results of the projects must be made publicly available.	
Further guidance	Estonian project partners with positively evaluated full proposals will be invited by the Estonian Ministry of Rural Affairs to agreement negotiation.	

Finland

Country	Finland	
Funding organisation	Ministry of Agriculture and Forestry, MMM	
National contact person	Suvi Ryynänen Tel.: +358 29516 2126 suvi.ryynanen@mmm.fi	
Overall Funding commitment [€]	300,000	
Funding Distribution per Topic, if applicable [€]	Topic 1:	Topic 2:
Maximum funding per grant awarded to a project [€]	170,000	
Eligibility of partners	Mainly research organizations and universities, but even other stakeholders and industry partners.	
Eligibility of costs, types and their caps	The main national criteria emphasizes that the research shall benefit the agri-food (excluding marine food system) livelihood. The work carried out must be pre-competitive research and/or prototype demonstration. **Product development supporting individual companies will not be supported.** Financial involvement must be clearly stated in the application. The application must contain a plan for communication of results. Costs that are necessary and reasonable in view of the project work and which can be allocated to the project in accounting are eligible (see Additional information: the general terms and instructions). Funding does not cover expenditures for activities before the project has been granted. Normally 70 % of the project's gross eligible costs can be covered by the MMM funding (e.g. research organizations and universities). Applicants must provide the necessary apparatus for the project themselves. If a special apparatus is needed an explanation and application for funding for apparatus must be included and accepted by MMM. If the applicant has not earlier given the explanation for indirect employee costs and overheads the applicant has to give an account to the ministry.	
Submission of the proposal at national level before the submission deadline	No	
Submission of other information at national level before the submission deadline	Check the eligibility of the project, budget and applicant with the National contact person before submission.	
Further guidance	Applicants are advised that this annex is for general guidance only. For more detailed rules and regulations, please contact the National Contact Point. See: https://mmm.fi/tutkimus-ja-kehittaminen/lomakkeet-ja-ohjeet	

	-> Maa- ja metsätalousministeriön rahoittaman T&K-toiminnan yleiset ehdot ja ohjeet (in Finnish) or: https://mmm.fi/en/research-and-development/funding-for-projects -> General terms and instructions for R&D activities funded by the Ministry of Agriculture and Forestry (in English)

France

Country	France	
Funding organisation	Agence Nationale de la Recherche (ANR)	
National contact person	Claude Yven claude.yven@agencerecherche.fr	
Overall Funding commitment [€]	2,000,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: **ANR does not support Topic 1**	Topic 2: 2,000,000
Maximum funding per grant awarded to a project [€]	The funding requested from ANR for a project must be between 15,000 € and 200,000 €. This is an eligibility criterion. If there are several partners requesting funding from ANR, the 200,000 € have to be shared. If a partner requesting funding from ANR is coordinator of a proposal, the maximum amount of funding requested can reach 300,000 €.	
Eligibility of partners	ANR may finance Partners that have their primary establishment in France and/or Partners established in the EU and that can prove that they have a secondary establishment in France. To be eligible, the consortium must include at least one French public research organization (EPA, EPSCP, EPST, EPIC). The involvement of an enterprise is encouraged but not mandatory. If a non-French enterprise is involved in a project, it is mandatory to involve a French enterprise; otherwise the French partners will be declared ineligible.	
Eligibility of costs, types and their caps	The ANR funding regulation are available on https://anr.fr/fr/rf/	
Submission of the proposal at national level before the submission deadline	Not applicable	
Submission of other information at national level before the submission deadline	Not applicable	
Further guidance	It is important to read carefully the call text, the present document in its entirety, the document "*Modalités de participation pour les partenaires solicitant une aide de l'ANR*" on the ANR website and the ANR funding regulation (https://anr.fr/fr/rf/) before contacting the NCP and submitting a research project. It is highly recommended to contact the NCP to check the eligibility before submitting a proposal. The project proposal must not be considered to infringe an intellectual property right characterizing a counterfeit within the meaning of intellectual property. The project proposal must not be similare with another proposal. The similarity between two Projects is established when these Projects (in their entirety or in part) describe identical main objectives or result from a simple adaptation. **Project partners' commitment:**	

	Access to genetic resources and traditional knowledge associated with genetic resources Pursuant to the Nagoya Protocol, ANR must obtain documentary evidence of Due Diligence Declarations (DDDs) for all research projects that it funds. Projects funded will be asked to make a declaration on potential utilisation of genetic resources during their projects. DDDs for research work can be submitted online using the special application on the MESRI website. Credentials to access the application can be obtained from the director of the host institution. For full details, go to: http://www.enseignementsup-recherche.gouv.fr/pid37627/utilisation-ressources-genetiques-associees.html **Open Science** As part of the contribution of the ANR to the promotion and implementation of an open science, and in connexion with the National plan for an open science, the applicants formally undertake, if they receive funding, to: (1) post the full texts of all scientific publications resulting from the research project in an open archive (either directly in HAL or via a local institutional archive); and (2) to provide a data management plan (DMP) within 6 months of the project start, as per the ANR Funding regulation (*Règlement financier*) and the arrangements communicated in the act allocating the grant. Besides, the ANR recommends that publications be made in reviews or books in native open access. **Terms and conditions and important recommendations for partners requesting funding from ANR will be published on ANR website.**

Ireland

Country	Ireland	
Funding organisation	Department of Agriculture, Food and the Marine (DAFM)	
National contact person	Noeleen McDonald (SUSFOOD2) Tel.: +353 873826054 Noeleen.mcdonald@agriculture.gov.ie Aidan Holohan (FOSC) Tel.: +353 873807504 Aidan.holohan@agriculture.gov.ie	
Overall Funding commitment [€]	650,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: N/A	Topic 2: N/A
Maximum funding per grant awarded to a project [€]	325,000	
Eligibility of partners	Only Research Performing Organization eligible for grant-aid under DAFM's Research Programmes can make applications and submit funding requests, either as partners or coordinators, under the Joint Call. Public RPOs based in Northern Ireland are not eligible for national funding. Involvement of industry and other stakeholders is encouraged on in-kind/ self-financing basis. Please refer to sections 6 and 9 of the Guidelines for Irish Applicants for further details.	
Eligibility of costs, types and their caps	Funding The total indicative funding provided by DAFM in respect of this Call shall not exceed €325,000 per proposal. Eligible costs will be allowed in the categories of: (a) Staff Costs (b) Equipment (c) Travel and Subsistence (T&S) (d) Consumables (e) Overheads (f) Other agreed costs e.g. Sub-Contracting Please refer to section 7 of the Guidelines for Irish Applicants for further details.	
Submission of the proposal at national level before the submission deadline	Not required	
Submission of other information at national level before	Not required	

the submission deadline	
Further guidance	The Guidelines for Irish Applicants can be found under current open calls of the DAFM website gov.ie - European Research Area Networks (ERANETs) (www.gov.ie)

Italy

Country	Italy	
Funding organisation	Ministry of agricultural, food and forestry policies (Mipaaf)	
National contact person	Serenella Puliga Tel.: +39 055 2492220; +39 06 46655076 s.puliga@politicheagricole.it Elena Capolino Tel.: + 39 055 354457 (9 am to 1 pm) or Skype elena.capo63 e.capolino@politicheagricole.it	
Overall Funding commitment [€]	600,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: 200,000	Topic 2: 400,000
Reference to National programme	The topics are under the main scope of PSIR 2014-2020 https://www.politicheagricole.it/flex/cm/pages/ServeBLOB.php/L/IT/IDPagina/9065 For this call no financial support from Mipaaf - DISR4 can be admitted for fisheries and aquaculture.	
Maximum funding per grant awarded to a project [€]	Budget requested to Mipaaf cannot exceed: -200,000 € for each project (including coordination costs, if present) -120,000 € for a single research unit ("unità operativa - UO") (coordination costs excluded)	
Eligibility of partners	Eligible institutions: National public and private no profit research institutions and universities. See details in User's Manual at https://www.politicheagricole.it/flex/cm/pages/ServeBLOB.php/L/IT/IDPagina/10656 SMEs and organisations with other statutory nature are welcome to participate if an added value to the project is proven and if their costs are covered by their own or other external resources. Costs cannot be covered by Mipaaf. **Please note that for Italian applicants, the same person cannot apply to more than one proposal both as coordinator, participant or team member.**	
Eligibility of costs, types and their caps	In defining the eligibility for funding of project costs, national applicants must refer to the rules described in the standing User's Manual https://www.politicheagricole.it/flex/cm/pages/ServeBLOB.php/L/IT/IDPagina/10656 In case the project is selected for funding the Italian institutions will be financed up to 99% of the eligible requested costs ("costo richiesto" eligible for Mipaaf). The total eligible requested budget (100%) must be indicated in the project proposal financial section and corresponds to all eligibile costs to be declared in the financial reports.	

	Eligible costs A) **Personnel** *1) Salaries* – For public institutions/universities only non-permanent scientific staff; for private no-profit institutions also permanent scientific staff; administrative staff can be included only in the coordination activity, if the research unit is also coordinator. Cost of permanent personnel working in the project must be declared (as own contribution) even if it will not be reimbursed. *2) Travel expenses* – for permanent and non permanent staff working in the project. The amount for this item (excluded coordination) should not exceed 6% of the total partner requested budget. In exceptional cases the request can be higher, if duly motivated in relation to the specificity of the project. Travels related to the coordination activity are included in the coordination costs and separately indicated (see point F) B) **Consumables** C) **External activity costs** – advisory/consultant services, specialistic services supply (scientific, logistics for meetings, open access publication fee, devices and machine rent, etc.) The costs at point C) must be indicated and detailed as "Other " in the financial plan of the call application form (online submission). These costs cannot exceed 30% of the sum of the other eligible costs (A+B+D). D) **Equipments** – Only use cost (related to the project duration) for scientific equipment will be reimbursed. E) **Overheads** – no more than 12% of the eligible above mentioned costs (A+B+C+D). In the submission tool overheads are splitted in the different items; in the national system (in case of financing) only the sum will be considered. F) **Coordination** - if the Italian institution is also playing the role of coordinator the eligible costs are those indicated in the User's manual. The maximum allowed coordination costs request is to be calculated on the „total requested funding" of the whole project (including the amount not paid with national resources). No cost for project monitoring by an expert is foreseen, this budget cannot be requested. Costs related to the coordination activity have to be included in the section „Other" in the online submission system and duly justified in the dedicated space.
Submission of the proposal at national level before the submission deadline	**<u>National documents to be presented</u>** By the application deadline applicants from public institutions shall not have to submit an application or other documents to Mipaaf, other than the application through the online call submission platform. No-profit private research bodies participating in a project proposal must send to Mipaaf, by the application deadline, copy of the documents stating their research mission (statute and/or articles of incorporation or memorandum of association, etc.) to the following PEC address: aoo.cosvir@pec.politicheagricole.gov.it specifying in the object "*SUSFOOD2/FOSC Joint Call 2021* documenti bando – ente privato".

	Only after the final funding decision, and the official communication by the Call Office to the winning project coordinators, expected in December 2021, Mipaaf DISR IV will request to each Italian research unit of the selected projects to fill in a *specific national template* which will be sent along with the invitation needed to apply for the national grant. The national template must be filled in in Italian and follow the standing User's Manual rules.
Submission of other information at national level before the submission deadline	N/A
Further guidance	N/A

Morocco

Country	Morocco	
Funding organisation	Ministry of National Education, Professional Training, Higher Education and Scientific Research - Department of Higher Education and Scientific Research (DHESR)	
National contact person	**Ahmed HAMMOUCH** Tel.: +212 5 37 21 76 49 hammouch_a@yahoo.fr / ah.hammouch@gmail.com **Abdelouahid EZZARFI** Tel.: +212 6 72 21 03 27 a.ezzarfi@yahoo.fr **Anas CHOKAIRI** Tel.: +212 5 37 21 76 53 / +212 6 72 21 03 57 chokairi.anas@gmail.com **Jihane BENARAFA** +212 6 62 55 24 46 jbenarafa.drsi@gmail.com	
Overall Funding commitment [€]	400,000	
Funding Distribution per Topic, if applicable [€]	Topic 1:	Topic 2:
Maximum funding per grant awarded to a project [€]	The maximum budget granted for each Moroccan partner is **65,000 €** with a ceiling of **130,000 €** per project.	
Eligibility of partners	- Public universities; - Universities from the Public-private partnership in collaboration with public universities; - Non-university institutions in partnership with public universities; - Public research institutions in partnership with public universities.	
Eligibility of costs, types and their caps	- No levy by research institutions is allowed from the budget allocated to the research projects; - Permanent staff cannot receive research allowances. The remuneration of the non-statutory staff (PhD students, post-docs and CDD) participating in the project can be financed (Comply with the joint decision of 14 January 2016 concerning the management of the own resources of public institutions of higher education and scientific research); - Costs requested for Research allowances, travel and mission expenses cannot exceed 60% of the total budget allocated to the Moroccan team; - The budget requested for the first payment cannot exceed 60% of the total budget allocated to the Moroccan team; - The second payment will be made only after validation of the mid-term report.	
Submission of the proposal at national level before the submission deadline	No	

Submission of other information at national level before the submission deadline	No
Further guidance	

Eligible expenses Morocco

Rubriques	Budget demandé (DH)	Premier versement (DH)	Deuxième versement (DH)
Dépenses du personnel			
Indemnités liées aux travaux de recherche et de prestation de service (Bourses des doctorants, CDD, …)			
Taxes postales et frais d'affranchissement			
Taxes et redevances pour l'utilisation des lignes de réseaux spécifiques			
Taxes et redevances de télécommunications			
Matériel, Mobilier de bureau et fournitures			
Achat de fournitures de bureau, de papeterie et d'imprimés			
Achat de fournitures informatiques			
Achat de matériels informatiques			
Achat de matériels scientifiques			
Achat de matériels et mobilier de bureau			
Achat de réactifs, kits et produits chimiques			
Entretien et réparation			
Entretien et réparation de matériels scientifiques et informatiques			
Transport et Déplacement			
Indemnités de déplacement à l'intérieur du Royaume			
Indemnités Kilométriques			
Frais de transport au Maroc et à			

Rubriques	Budget demandé (DH)	Premier versement (DH)	Deuxième versement (DH)
l'étranger			
Frais de transport des missionnaires et chercheurs étrangers			
Frais de mission à l'étranger			
Frais de séjour des missionnaires étrangers au Maroc			
Autres Dépenses			
Frais de documentation, d'impression et de publication			
Achat de matières premières et de petit outillage			
Frais de réalisation de maquettes et de prototype			
Frais de démonstration et de publicité			
Frais d'étude, d'analyse et de sous-traitance			
Frais de participation aux séminaires			
Frais d'organisation de séminaires			
Frais de dépôt et de gestion des brevets, de licence et/ou de droit auteur			
Total			

Norway

Country	Norway	
Funding organisation	The Research Council of Norway (RCN)	
National contact person	Thorbjørn Gilberg Tel.: +47 22037433 thgi@rcn.no	
Overall Funding commitment [€]	1,000,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: -	Topic 2: 1,000,000
Maximum funding per grant awarded to a project [€]	400,000	
Eligibility of partners	Eligible partners are research institutions, list of institutions. Eligible are also industry partners in accordance with the conditions for awarding state aid.	
Eligibility of costs, types and their caps	Funding is provided within the remit of the portfolio Land-based food, the environment and bioresources (Norwegian only).	
Submission of the proposal at national level before the submission deadline	N/A	
Submission of other information at national level before the submission deadline	N/A	
Further guidance	Selected projects for funding will be required to register the project with the RCN in the standard format for research projects under the general guidelines for research institutions.	

Romania

Country	Romania	
Funding organisation	The Executive Agency for Financing Higher Education, Research, Development and Innovation (UEFISCDI)	
National contact person	Adrian Asanica Tel.: +40 744 45 00 11 adrian.asanica@uefiscdi.ro Luciana Bratu Tel.: +40 21307 19 87 luciana.bratu@uefiscdi.ro Andreea Popa Tel.: +40 21 307 19 91 andreea.popa@uefiscdi.ro	
Overall Funding commitment [€]	500,000	
Funding Distribution per Topic, if applicable [€]	Topic 1: N/A	Topic 2: N/A
Maximum funding per grant awarded to a project [€]	The maximum funding for one project from the public budget is 250,000 Euro if Romania is the coordinator of the transnational project. The maximum funding for one project from the public budget is 200,000 Euro if Romania is partner in the transnational project.	
Eligibility of partners	Legal entities established in Romania are eligible to get funding, i.e. public and private accredited universities, national R&D institutes, other research organizations, SMEs, large industrial enterprises with R&D activity within their domains. We can fund only Romanian research teams. For universities, public institutions, R&D national institutions funding is 100%, and for SMEs and Large companies, financing is under the permit NASR Decision no 9281/8.13.2015 approving the scheme of State aid for Program 3: European and international cooperation.	
Eligibility of costs, types and their caps	A. Staff costs (researchers, technicians and support staff, including all corresponding state and social contributions; these contributions are subject to national regulations in force); B. Consumables (materials, supplies or similar); C. Equipments (in full compliance with state aid regulations), no more than 30% of the total funding from the public budget; D. Subcontracting (max. 25% of the total funding from the public budget); The subcontracted parts should not be core/substantial parts of the project work; E. Travel expenses (in Romania or abroad, only for project teams' members); F. Overheads (calculated as a percentage of direct costs: staff costs, travel expenses and logistics costs - excluding capital costs). Indirect costs will not exceed 20% of direct costs, excluding subcontracting. Expenses are eligible if incurred after signature of the contract.	

Submission of the proposal at national level before the submission deadline	Not Applicable
Submission of other information at national level before the submission deadline	Not Applicable
Further guidance	The Principal Investigator of Romanian team must hold a Ph.D. degree. This condition does not apply if the Romanian host institution is an enterprise according with the specific European and national laws. One research team leader will participate only one time in a proposal within the transnational call as responsible or coordinator. No simultaneous funding is possible for more than one application under the same call. The Principal Investigator of Romanian team is full time employed within the host institution with permanent position, with fixed term contract covering at least the duration of the project or has an agreement with the host institution for his/her employment at least for the duration of the contract; It is forbidden to submit a proposal which seeks to fund activities already funded by other public sources; The host institution does not have a seizure on its accounts; it has not been declared bankrupt or wound up; it has not made false declarations concerning its economic and legal statute; it has not broken other contract previously signed with a public contracting authority; The host institution agrees to ensure the necessary administrative support, to provide access to all necessary resources/infrastructures, to support the project implementation in good conditions and to employ the members of the Romanian team, in respect of all legal provisions in force, if the project is selected for funding. Maximum project duration: proposed participations may last up to 36 months. The guideline according to the National Plan for Research, Development and Innovation 2015- 2020, for ERA-NET Cofund projects has to be consulted and respected by applicants.

Turkey

Country	Turkey
Funding organisation	The Scientific and Technological Research Council of Turkey
National contact person	Mustafa Emre SARI Tel.: +90 3122981265 emre.sari@tubitak.gov.tr
Overall Funding commitment [€]	500,000
Funding Distribution per Topic, if applicable [€]	**Total 500.000 € for Topic 1 and Topic 2**
Maximum funding per grant awarded to a project [€]	Maximum **1.500.000 Turkish Lira (TL)** per project (excluding Project Incentive Bonus (PTI) and overhead costs) if there is more than one Turkish partner; • The maximum funding is **720.000 TL** per project for a Turkish partner from universities (public and private), research institutes, and public institutions (excluding Project Incentive Bonus (PTI) and overhead costs.) • The maximum funding is **1.000.000 TL** per project for a Turkish partner from private corporations.
Eligibility of partners	Universities (public and private), research institutes and public institutions are eligible. For principal investigators (PI) of organisations; • University personnel should have a PhD degree, • Public institution personnel should have an undergraduate diploma, Please check national rules in TÜBİTAK web page for partnership requirements and other details. PI from private corporation should have an undergraduate diploma and must have been working in the relevant private institution for **at least six months** before the national deadline. Please check national rules in TÜBİTAK web pages. (https://www.tubitak.gov.tr) (https://uidb-pbs.tubitak.gov.tr/) *University presidents and vice presidents, surgeon generals, vice surgeon generals, hospital presidents, institution/company presidents, and institution/company vice presidents are not allowed to be partner.*
Eligibility of costs, types and their caps	**Percentage of Funding:** **Universities (public and private), research institutes and public institutions:** %100 of budget will be funded by TÜBİTAK. **Large-size Enterprises:** %60 of budget will be funded by TÜBİTAK.

	Small and Medium-size Enterprises: %75 of budget will be funded by TÜBİTAK. For detailed information and requirements**, applicants should follow the announcements regarding this call under the official website of TÜBİTAK** (https://www.tubitak.gov.tr) and also project application system of TÜBİTAK (https://uidb-pbs.tubitak.gov.tr/).
Submission of the proposal at national level before the submission deadline	At the same time with international application, project coordinator of Turkish team in the consortium must apply **project application system of TÜBİTAK** (https://uidb-pbs.tubitak.gov.tr/). If there is more than one partner from Turkey in the same international project, single joint application should be submitted to national application system.
Submission of other information at national level before the submission deadline	For detailed information and requirements**, applicants should follow the announcements regarding this call under the official website of TÜBİTAK** (https://www.tubitak.gov.tr) and also project application system of TÜBİTAK (https://uidb-pbs.tubitak.gov.tr/).
Further guidance	For further information, applicants should follow the announcements regarding this call under the official website of TÜBİTAK. (https://www.tubitak.gov.tr)

United Kingdom

Country	United Kingdom	
Funding organisation	Department for Environment, Food and Rural Affairs (Defra)	
National contact person	Victor Aguilera Tel.: +44 2080 264253 victor.aguilera@defra.gov.uk Jessica Finch Tel.: +44 2087 201395 Jessica.finch@defra.gov.uk	
Overall Funding commitment [€]	Approximately 400,000 Euro (£350,000)	
Funding Distribution per Topic, if applicable [€]	Topic 1: N/A	Topic 2: N/A
Maximum funding per grant awarded to a project [€]	We anticipate Defra's contribution towards each project to be in the region of 150-200k Euros. This figure is indicative, and bidders will have to provide a strong rationale for the project's funding needs and a detailed breakdown of its costs.	
Eligibility of partners	• The UK part of the project must be developed within the UK and must not duplicate research funded elsewhere. • Defra is unable to fund UK partners to undertake research that involves assessment of health benefits or clinical trial research as this is outside of the Departments' remit. • We welcome proposals that involve industry partnerships to add value and ensure 'real world' relevance. Funding will be provided in line with the UK's obligations and commitments to Subsidy Control. Further information about the UK Subsidy Control requirements can be found within the EU-UK Trade and Cooperation agreement and the subsequent guidance from the department of Business, Energy and Industrial Strategy (BEIS). You must apply under European Commission State aid rules if you are an applicant who is conducting activities that will affect trade of goods and/or electricity between Northern Ireland and the EU as envisaged by Article 10 of the Protocol on Ireland/Northern Ireland in the EU Withdrawal Agreement. For further information, please see section 7 of the BEIS technical guidance. • Applicants **will be required to** comply with Defra's standard Terms & Conditions for Research and Development (see Further Guidance below)	
Eligibility of costs, types and their caps	General eligibility criteria / scope: Defra requires research proposals to have application and benefit to the UK food system by supporting resilience, promote innovation, or enhance productivity and sustainability. The UK is interested in research proposals that will investigate approaches for increasing productivity and competitiveness (including through use of innovation), increase resource efficiency, build resilience, and lessening the environmental impact of food production and consumption within a	

systems approach. Multi- and interdisciplinary research expertise is encouraged.

Defra funding is directed only to support R&D that addresses policy priorities including contributing to meet the UK Net Zero target to reduce GHG emissions, increasing food systems resilience and promoting high quality standards for food. Research areas of interest to Defra towards meeting these goals include, although not exclusively, increasing productivity sustainably, increasing uptake of innovation and favouring production and consumption approaches which will have a positive environmental impact. In framing research to help address a sustainable (Topic 1) and safe, secure and resilient (Topic 2) food system, applicants will need to consider the wider policy context in terms of productivity, sustainability and climate change goals, including Defra's 25 year environment plan, the UK Government's Net-Zero GHG emissions 2050 target and commitments within its strategy to build back greener. Research with exclusive focus on agricultural aspects of the supply chain is out of scope, however projects taking a whole food systems approach and taking a food supply chain perspective (e.g. food production, processing, manufacture, retail, and consumption) is in scope. Research on human/clinical health impacts of food consumption, or education, is out of scope.

Research topics must include consideration of the UK food system, within the broader global context. Proposals should take a food supply chain view (e.g. spanning primary production, food manufacture, processing, retail, and consumers), and provide insights into trade-offs, synergies and unintended consequences within the system from a supply and demand perspective. Proposals must build on, and not duplicate, existing research.

<u>Additional criteria for Topic 1</u>
A key priority for Defra is to investigate technological, environmental, social and economic opportunities to reduce environmental impacts across the food chain (including GHG emissions, impacts on land-use, water, pollution, biodiversity loss and waste). Research needs to be focussed around understanding impacts and their inter-relationship across the agri-food supply chain.

<u>Areas of interest are:</u>
Research and technological innovation into new approaches to increase food systems productivity sustainably, i.e. by increasing supply chain resource efficiency (energy, water, reducing waste) while diminishing environmental impacts (spanning production and consumption)

Consideration of hot spots, risks, levers, opportunities, trade-offs and unintended consequences posed by new production methods or the promotion of alternative consumption approaches is relevant (where appropriate supported by Scenario analysis to inform research).

	Proposals addressing how to transition towards sustainable food systems from farm to fork that supply sustainable, healthy and affordable food for consumers are of interest including insights into levers, barriers, opportunities e.g. for growth as well as understanding consumer attitudes, behaviours and trends, and sustainability metrics. Additional criteria for topic 2 The Programme would welcome multi-disciplinary research proposals which provide insight into new and emerging vulnerabilities, risks and threats impacting on the resilience of the UK food system within a global context. This should be from both a supply and demand perspective, coupled with mitigation and adaptation strategies. Where appropriate, proposals should include scenario analysis to inform research outcomes. Proposals must address the role of innovation in driving change and improving resilience of the UK food system to shocks and stressors. Eligibility of costs Defra's interest is on development of primary and applied R&D; proposals to support access to market of products and/or services are out of scope.
Submission of the proposal at national level before the submission deadline	Not required
Submission of other information at national level before the submission deadline	**Bidders must contact the Defra FOSC-SUSFOOD2 representatives (Victor Aguilera and Jessica Finch) prior to submitting bids for funding** (contact details above).
Further guidance	Before submitting proposals, applicants are strongly advised to consult the national contacts to ensure bids are eligible and meet the national criteria. Applicants should also consult Defra's standard Terms and Conditions for funding research available from network.procurement@defra.gov.uk UK contractors will be paid by Defra in pounds sterling. The exchange rate from Sterling to Euros applied will be that at the time of FOSC-SUSFOOD2 call publication. **Links of Interest:** 25 Year Environment Plan https://www.gov.uk/government/publications/25-year-environment-plan Resources and waste strategy for England: https://www.gov.uk/government/publications/resources-and-waste-strategy-for-england Developing a national food strategy: independent review 2019 – terms of reference (July 2020): https://www.gov.uk/government/publications/developing-a-national-food-strategy-independent-review-2019/developing-a-national-food-strategy-independent-review-2019-terms-of-reference

Annex E: Guidance on Communication, Dissemination and Exploitation (revised and based on information by CommBeBiz)

A plan for communication, dissemination and exploitation of the results has to be provided in the proposals and is considered in the evaluation procedure. This can be organized in form of various communication paths such as scientific papers, presentations, posters, course or training material, web-based tools, workshops etc. Proper reference must be given to SUSFOOD2 and FOSC in all related outputs. Additionally, each project should go beyond dissemination and envision how to communicate, reach out and engage a more general public and relevant stakeholders. Each project has to submit a two A4 page plan for communication, dissemination and exploitation, specifying how the planned activities will valorize results for maximum benefit and contribute to the overall impact of the project. To fulfil the plan for communication and exploitation, projects must dedicate appropriate resources for those activities.

Dissemination and Communication – why is this important in planning, developing, delivering and evaluating a successful research project?

Communication is defined here as the work you do and the effort you put in informing and engaging with the wider public so they are aware of the issue your research is addressing, the question you are posing, the methods you are using to answer that question and the anticipated outcomes. Communication is in addition to '**dissemination**', the latter being focused on the production of scientific papers, posters and presentations at closed scientific congresses, and work with specialist stakeholder groups. Please include both communication and dissemination activities for the entire project duration in your plan

Communication activities may include activities, such as development of a website and/or app, media communications programme, social media programme, videos/podcasts, infographics/project literature, creative artwork/exhibition stands, quizzes / games / serious gaming, science fairs/open houses intended for wider audiences, meetings of targeted stakeholders, training for Consortium on aspects of communication. Please consult the national annexes of your respected funding agency for potential limitations to funding certain communication activities.

Exploitation means effectively using the research results. This can be achieved through scientific, economic, political or societal exploitation routes aiming to turn R&I actions into concrete value and impact for society. Target audiences are people/organisations including
project partners themselves that make concrete use of the project results, as well as user groups outside the project (see also https://op.europa.eu/s/oXbT).

There are four clear reasons **why effective communication** is an essential element of any SUSFOOD-FOSC joint call funded research project:

- European tax-payers are providing the funding for your research and are interested in knowing where their money goes and that they are receiving 'value for money'.
- Communicating about the relevance of your research work and its potential outcomes to society and the everyday life of citizens will help ensure that your innovations – products, knowledge, thinking – are accepted and utilised by society – not ignored, nor opposed.
- Everyone is a citizen whether President, MEP, policy-player, teacher, student, entrepreneur or industrialist who watches TV, reads the news, accesses online sources and has interests beyond their immediate network. Effective communication raises awareness of your research project

and of the professionals working on it to mutual advantage, potentially laying the ground for more funding or support.

- SUSFOOD2 and FOSC wish to ensure that the projects they select to fund make the best use they can of the 'results' each of them generate – that means ensuring that as many groups in society know about the excellent work that is being conducted and their potential results so they will be taken up by decision-makers in policy, industry or science itself creating impact. Strategic communications programmes utilising creative but accessible actions with measurable outcomes are required to deliver this.

What is a Communication and Dissemination Plan?

It is a document that demonstrates that a Consortium has clearly thought through the rationale, target stakeholders, activities, timescales, budgets and measures including their key performance indicators (KPIs) of success behind the communications / dissemination activities it will implement as an integral part of its project plan.

Whilst each Communication and Dissemination Plan will be different, it is likely to consist of:

- a narrative (the rationale/ approach)
- a table which draws together information on priority target stakeholder groups and methods to reach them
- a timetable/GANTT chart
- a budget table with enough detail on each action/activity/product and its delivery
- a table pulling together the agreed key performance indicators or measures of success against each planned for activity.

The elements of a Communication Plan that will demonstrate clarity of thought and planning are likely to be:

- Evidence that the whole Consortium are 'on board' with the plan and that all partners will support the actions
- Focus on purpose/objective of each selected dissemination/communication action – Who is it for? What do we want to happen as a result?
- Clarity on the messages that the project wishes to communicate overall and to specific groups
- Clear understanding of what success looks like for each action
- Description of the method to be used for delivery
- Utilisation of resources and talents within the consortium
- Realistic assessment of the potential impact of each action
- Built-in time points for review and adjustment
- Appropriate focus on internal communications within the Consortium
- Appropriate utilisation of the services and channels provided by the EC

The Plan should be able to answer the following questions clearly:

- What are the objectives of our Communication Plan?
- Who are our priority audiences and why?
- When is the most appropriate time to engage with each audience and why?
- How does our Communication Plan create synergy with the rest of the project plan?
- How do we justify the budget allocated to each of our proposed communications actions?
- How are we splitting responsibility for the resources and actions across the Consortium?

For SUSFOOD-FOSC joint call applications the expected minimum requirements of the Communication Plan are:

- A maximum two A4 page document + one page table (to be uploaded)
- A narrative on approach/rationale/contribution to the project
- A list of priority stakeholders, messages, actions & timetable
- Key performance Indicators / measures of success

A Sample Approach to a Stakeholder Table (key part of any communication plan)

The issue: we need to ensure that more young people know how to code
Why: to improve their personal employment prospects
Impact: overall economic benefit

	Communication Plan – Priority Stakeholders & Actions			
Priority Stakeholder Group	*What message/info*	*How to communicate?*	*When?*	*Success measures*
Priority 1: Policy players in Education & Business	Resources required for upper schools to deliver next generation of IT stars	-Create Consensus White Paper to present to Ministers and special Committees - Secure political Ambassadors - One on one briefing meetings -Articles in business press	From Day One – complete by end of Year One	Number of one on one meetings Questions in Parliament Media coverage
Priority 2: Head-teachers/ Governors/ Proprietors of colleges	Need trained teachers to deliver the training required plus 'Train the Trainers facilities'	-Articles in the specialist education media -Identify and contribute to LinkedIn groups -Attend/speak at specialist meetings -Create database of interested parties & send occasional	Years One & Two	Number of active enquirers (no on database) New courses set up Evidence of internal cascade of issue/action Active recruitment & allocation of resources Capture of success stories for use in newsletter Media coverage
Priority 3: Teachers of students 14 -18	Become active in a new area of teaching –	-Articles in teacher press -Social media activity: IN, twitter etc	Years Two & Three	Pick up of places on training courses

	professional opportunity Training available			Appointments in schools/ colleges
Priority 4: Students 14-18	Coding is cool See what you can do with it – it's fun but it can be profitable too Demand that you are given resources and guidance to help yourself	-Recruit student ambassadors who can code -Let them loose to use social media/channels as they choose (provide resources if needed) -Support with an event – Coding Convention template (to be taken up in many places) with col coding paraphernalia -Create matching events for students with business to demo relevance to lives/future prospects	Years Three/Four	Number of active ambassadors with 'followers' Number of new students learning code Number of successful Conventions & matching events

Guidelines for preparing a Communication Plan prepared by: Rhonda Smith, CommBeBiz

Annex F: Data Management Plan

Data Management is an essential component of the success of transnational research. Representatives from academia, industry, funding agencies, and scholarly publishers designed and jointly endorsed a concise and measurable set of principles referred to as FAIR Data Principles[3] with the intention to provide a guideline for reusability of data holdings. Four foundational principles – Findability, Accessibility, Interoperability and Reusability– are a necessity of data management. The EC published Guidelines on FAIR Data Management in Horizon 2020.

Fulfilling the FAIR principles needs the use of software platforms that enable capturing, cataloguing, and annotating data, associated with well documented standard operating procedures (SOPs), and supports interlinking data from specialized, as well as local collections. Moreover, in a systems approach, well-annotated models (including parameters) must be catalogued and interlinked with relevant data. Each project should have one single starting point at which one can find out everything about the project.

Participation in this call requires fulfilling the FAIR principles, including the use of a cataloguing platform as described above. Therefore, research data and non-data assets like algorithms, tools and workflows or metadata produced in the projects funded under this call must be i) machine-readable ii) citable iii) must be published in a registered repository and iv) interlinked with other project outcomes in a cataloguing platform. Privacy sensitive data that cannot be published needs to be catalogued, such that the creator of the data can be easily found for possible questions and collaboration. Data that is subject to Intellectual Property for Patents needs to be recorded and published in due course.

The repository must be registered as a "trustworthy repository" in e.g. Fairsharing[4] or re3data[5]. Resources of existing community knowledge and data management platforms in Europe shall be preferably used.

The projects should consider the cost of Data Management in their proposals.

The Guidelines on FAIR Data Management in Horizon 2020 provides a Data Management Plan Template which addresses: 1) Data Summary, 2) FAIR Data, 3) Allocation of resources, 4) Data Security, 5) Ethical aspects, 6) Other issues.

Answering the questions, applicants will identify and resolve key questions about their data, models, SOPs and associated metadata. The Data Management plan will outline how data flows and the requirements on data, metadata, storage and data transfer throughout the project and beyond the project.

The costs associated to the Data Management plan (*e.g.* travel expenditures of staff to Data Management training; salary costs of staff curators; costs of servers, storage, archiving and backup) must be derived from this and clearly presented.

Guiding questions include the following:

Generate and Store

- Who will generate the data/model/SOP?
- Who will receive the data/model/SOP?
- What does the user need from the generator?
- Where will you store data/model/SOP?

[3] http://www.nature.com/articles/sdata201618
[4] https://fairsharing.org//
[5] https://www.re3data.org/

- How much storage capacity will you need short term?
- How will you transfer it?
- How much storage capacity will you keep for longer? Who is responsible for this step?
- How will the data be made available for processing?

Curate

- Who will curate the data/model/SOP?
- How will the data/model/SOP be interlinked?
- How is data tracked through processes?
- How are versions of models and SOPs tracked?

Access

- Are you allowed to share data?
- Where, when and how will you make the data/model/SOP available?
- Which public archives will you deposit your data/model/SOPs in?
- How will you make the project's data/model/SOPs available in a unified way through a one-stop single starting point starting at which one can find out everything about the project?

Please note that Data Management is an ongoing activity of improvement and adaptation rather than something that can be finished in one short effort. The Data Management plan must reflect this.