Agri-Tech SME Opportunities in Horizon 2020

3rd June 2014
Rothamsted Centre for Research & Enterprise Breakfast Seminar

Roger Hetherington
Enterprise Europe Network East of England
Context
Welcome!

COSME
and
Horizon 2020
New EU Programmes for Business, Research & Innovation

Horizon 2020
- *EU Research & Innovation programme with a budget of €79bn over 2014-2020*

COSME
- *Programme for the Competitiveness of Enterprises & SMEs.*
- €2.3bn budget
- 4 areas: Access to Finance, Support for Entrepreneurs, More Favourable Conditions and Access to Markets (EEN)
Horizon 2020 stated aims

- Greater emphasis on “innovation”
- “Bottom-up” approach
- Greater engagement with SMEs
**Horizon 2020**

### Excellent Science
- European Research Council
- Frontier research by individual teams
- Future & Emerging Technologies
- Collaborative research / innovation
- Marie Skłodowska-Curie
- Training and career development
- Research Infrastructures
- Facilities

### Industrial Leadership
- Leadership in Enabling and Industrial Technologies
  - ICT, nanotechnologies, biotechnology,
  - manufacturing, space
- Access to Risk Finance
- Leveraging private finance and venture capital for research & innovation
- Research and Innovation in SME’s

### Societal Challenges
1. Health, Demographic Change and Wellbeing
2. Food security, Sustainable Agriculture and the Bio-economy
3. Secure, Clean and Efficient Energy Excluding ITER and Euratom
4. Smart, Green and Integrated Transport
5. Climate Action, Resource Efficiency and Raw Materials
6. Europe in a changing world - inclusive, innovative and reflective Societies
7. Secure societies - Protecting freedom and security of Europe and its citizens

### SME Instrument
Horizon 2020

**Excellent Science**
- European Research Council
- Frontier research by individual teams
- Future & Emerging Technologies
- Collaborative research / innovation
- Marie Skłodowska-Curie
- Training and career development
- Research Infrastructures
- Facilities

**Industrial Leadership**
- Leadership in Enabling and Industrial Technologies
- ICT, nanotechnologies, biotechnology, manufacturing, space
- Access to Risk Finance
- Leveraging private finance and venture capital for research & innovation
- Research and Innovation in SME’s

**Societal Challenges**
1 Health, Demographic Change and Wellbeing
2 Food security, Sustainable Agriculture and the Bio-economy
3 Secure, Clean and Efficient Energy Excluding ITER and Euratom
4 Smart, Green and Integrated Transport
5 Climate Action, Resource Efficiency and Raw Materials
6 Europe in a changing world - inclusive, innovative and reflective Societies
7 Secure societies - Protecting freedom and security of Europe and its citizens

**SME Instrument**
“Mainstream H2020” – points to note

- Applications have to be against specific calls (see Participant Portal)
- Collaboration essential
  - Consortia must reflect at least 3 different nation states
  - Consortia must include a mix of academia and industry
- Consortia roles:
  - Coordinator
  - Participant
- SME participation “welcomed”
Sustainable Food Security Collaborative

Calls 1:

- SFS-06-2014 Sustainable intensification pathways of agro-food systems in Africa
- SFS-02b-2015: Assessing soil-improving cropping systems
- SFS-05-2015: Strategies for crop productivity, stability and quality
- SFS-10b-2015: Scientific basis and tools for preventing and mitigating farmed mollusc diseases
- SFS-13-2015: Biological contamination of crops and the food chain
- SFS-16-2015: Tackling malnutrition in the elderly
Sustainable Food Security Collaborative Calls 2:

- SFS-20-2015: Sustainable food chains through public policies: the cases of the EU quality policy and of public sector food procurement
- SFS-01c-2015: Assessing sustainability of terrestrial livestock production
- SFS-07b-2015: Management and sustainable use of genetic resources
- SFS-11b-2015: Consolidating the environmental sustainability of European aquaculture
- SFS-18-2015: Small farms but global markets: the role of small and family farms in food and nutrition security
- SFS-14b-2015: Authentication of food products
Some Other Relevant(?) Collaborative Calls:

- LCE-12-2014: Demonstrating advanced biofuel technologies
- LCE-13-2015: Partnering with Brazil on advanced biofuels
- LCE-14-2015: Market uptake of existing and emerging sustainable bioenergy
- WASTE-7-2015: Ensuring sustainable use of agricultural waste, co-products and by-products
Horizon 2020 SME Instrument

“Your highway to Innovation”
Horizon 2020 SME Instrument

Designed to help fill a financing gap for business innovators with international ambitions.
Horizon 2020 SME Instrument

The Offer

- Funding to find out whether your innovative idea can translate into market success

- Access to financial support for the development of your innovative ideas at an early, high-risk stage

- Concrete and easy business support and coaching from design to market, on the basis of a business (innovation) plan

- Guidance on how to identify and attract private investors
Horizon 2020 SME Instrument

Main Features

- Targeted at all types of innovative SMEs
- Only SMEs can apply
- Collaboration not a pre-requisite
- Competitive
- Market-oriented (EU dimension)
- “Bottom-up” approach but addressing specific challenges and/or key technologies
- Grant-based staged funding.
- Coaching and Mentoring support through EEN.
Horizon 2020 SME Instrument

PHASE I

Proof of Concept
Typically 6 – 12 months

Activities supported
• Prove Technical and Commercial Viability
• Explore IP Regime
• Design Study
• Develop Pilot Application
• Risk Assessment
• Business Planning
Horizon 2020 SME Instrument

PHASE II

Demonstration of Commercial Potential

Typically 12 – 24 months

Activities Supported:

- Prototyping
- Testing
- Piloting
- Miniaturisation
- Scaling-up
- Application Development
- Business Planning
Horizon 2020 SME Instrument

PHASE III

Go-to-Market

No direct funding

Support for:

- **EU Quality Label** (Promotion & Networking with Financiers/Clients)
- **Investment Readiness Training**
- **Facilitating access to private finance**
- **Training, coaching, IP management, Knowledge Transfer**
Horizon 2020 SME Instrument

Timetable

- **Opened:** 1\textsuperscript{st} March 2014 for phase 1 & 2
- **Deadlines for evaluation:**

<table>
<thead>
<tr>
<th>Phase 1</th>
<th>Phase 2</th>
<th>Phase 1</th>
<th>Phase 2</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>16 Dec 2015</td>
<td>16 Dec 2015</td>
</tr>
</tbody>
</table>
Horizon 2020 SME Instrument

Sustainable Food Security call:

• **SFS-08-2014-1 Resource-efficient eco-innovative food production and processing:**
• **Specific Challenge:**
  - Development of more resource-efficient and sustainable food production and processing, throughout the food system.
  - Competitive and innovative approaches.
  - Revision and optimisation of current food production and processing systems, especially in the SME sector.
  - Achieving significant reductions in water and energy use, greenhouse gas emissions and waste generation.
  - Improving the efficiency in the use of raw materials, increasing climate resilience and ensuring or improving shelf life, food safety and quality.
Horizon 2020 SME Instrument

Eco-innovation & Sustainable Raw Materials Supply call:

- SC5-20-2014-1 Boosting the potential of small businesses for eco-innovation and a sustainable supply of raw materials
- For:
  - “all types of eco-innovative SMEs in all areas addressing the climate action, environment, resource efficiency and raw materials challenge”

Biotechnology-based Industrial Processes call:

- BIOTEC-5a-2014-1 SME boosting biotechnology-based industrial processes driving competitiveness and sustainability
Horizon 2020, How to apply?

1. Find a relevant call for your project/research area:

   • Go to the “Participants’ Portal:
Horizon 2020, How to apply?
Horizon 2020, How to apply?
Horizon 2020, How to apply?
Horizon 2020 How to apply?

In addition, see all the open calls of Marie Skłodowska-Curie actions (MSCA) and European Research Council (ERC) grants for individual researchers of any nationality and research teams. The MSCA grants include opportunities for companies and SMEs. The MSCA and ERC grants are not restricted to specific topics.

Quick finder for topics linked to H2020 cross-cutting priorities:
- Cross-cutting Key-Enabling Technologies (KETs)
- ERA-NET
- Gender
- Innovative Medicine Initiative (IMI)
- SME Instrument
Horizon 2020, How to apply?

The dedicated SME instrument encourages for-profit SMEs to put forward their most innovative ideas with an EU dimension. The instrument aims to fill gaps in funding for high-risk innovation and close-to-market activities to give a strong boost to breakthrough innovation. It targets highly innovative SMEs with a strong ambition to develop, grow and internationalize. It covers the whole innovation cycle, the focus being on delivery of new products, services or processes on the market.

Only SMEs are eligible for funding, and can decide how best to organise a project or with whom to collaborate, including through subcontracting of tasks if they lack in-house capabilities. In order to boost market relevance and foster commercialisation of project results, also single SMEs can apply for support. More...

Topic: SME Instrument (Space: SME-2014-1)
Specific challenge: To engage small and medium enterprises in space research and development.

Call title: Horizon 2020 - dedicated SME Instrument - Phase 1 2014
Status: Open
Deadline: 31-03-2014

Topic: Open Innovative Innovation Scheme (implemented through the SME instrument) ICT
Specific Challenge: The challenge is to provide support to a large set of early-stage high
Horizon 2020, How to apply?

1. Find a relevant call for your project/research area

2. Find consortium partners (if joining a collaborative call)
   - EEN can help!

3. Draft proposal
   - Use template
Title, List of Participants, Table of Contents

1. Excellence - Objectives, relation to the work programme, concept & approach, ambition

2. Impact - Users/market, company, dissemination & exploitation of results, intellectual property & regulatory issues

3. Implementation - Work plan (work package & deliverable), management structure, resources

4. Members of the “consortium” - CVs & responsibilities, relevant publications etc.

5. Ethics & Security
Horizon 2020, How to apply?

1. Find a relevant call for your project/research area

2. Find consortium partners (if joining a collaborative call)
   - EEN can help!

3. Draft proposal
   - Use template

4. Register and complete on-line application
Other funding sources for technology

• **Eurostars**
  - Funding for collaborative (2 nation states), market-oriented research and development led by “R&D-performing” SMEs
  - Funding available: up to €360k per UK partner, 60% of eligible costs (75% for SMEs)
  - Currently closed, next call in September 2014 - Date TBC

• **Smart**
  - Proof of Market
  - Proof of Concept
  - Development of Prototype

• **TSB Collaborative R&D and Feasibility Programmes**

• **See:** [www.innovateuk.org](http://www.innovateuk.org)
Sources of help

• Individual advice
• Help to identify relevant Horizon 2020 (and other) calls
• Help to find collaborative, international partners (business or academic)
• Coaching and mentoring support within the Horizon 2020 SME Instrument
• “Innovation Management Capacity” Programme
  • Coaching/mentoring support for Innovation Focussed SMEs who are not SME Instrument beneficiaries
Sources of help

National Contact Points
https://www.h2020uk.org/national-contact-points

• **Food Security, Sustainable Agriculture and Forestry, Marine and Maritime and Inland Water Research and the Bioeconomy**
  - Ian Holmes
  - Tel: **07795 605 723**
  - Email: [ian.holmes@tsb.gov.uk](mailto:ian.holmes@tsb.gov.uk)

• **Small and Medium Enterprises (SMEs)**
  - Steve Bradley
  - Tel: **0750 146 3314**
  - Email: [Steve.Bradley@tsb.gov.uk](mailto:Steve.Bradley@tsb.gov.uk)
Sources of help

Knowledge Transfer Networks

- **Biosciences**
  
  https://connect.innovateuk.org/web/biosciencesktn

- **Resource Efficiency & Environmental Services**
  
  https://connect.innovateuk.org/web/sustainabilityktn

- **Health Tech & Medicines**
  
  https://connect.innovateuk.org/web/healthktn
Roger Hetherington – Technology Adviser

Tel: 01707 398735
Mobile: 07860 753081
Email: r.hetherington@eeneast.org.uk