

The Joint Programming Initiative on Agriculture, Food Security and Climate Change

FACCE-JPI

FACCE-JPI and the role of universities

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Agriculture Food Security and Climate Change

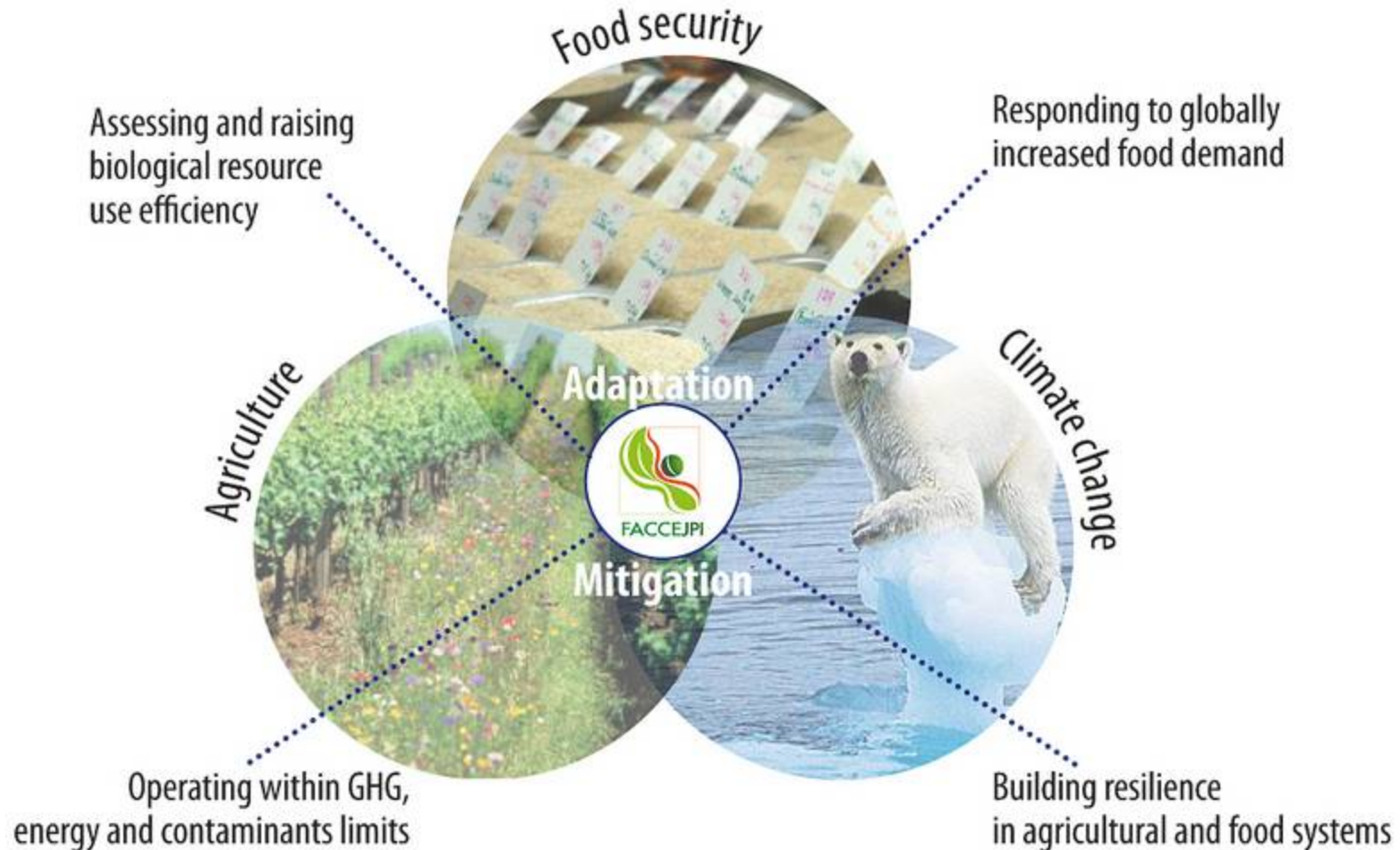


What does Joint Programming do?

- Intergovernmental initiatives that address major societal challenges that cannot be solved solely on the national level, and voluntary participation of Member States in those joint initiatives where it seems useful for them
- Alleviate compartmentalisation, fragmentation of public research funding in the EU
- Align national programmes to minimise duplication, bring critical mass, make efficient use of limited financial resources
- Identify national priorities and provide coherence between Member States through joint programming
- New ways of working together



Agriculture, Food Security and Climate Change: A great societal challenge





21 Participating countries

- 
- | | | | |
|---|----------------|---|---------------------|
|  | Austria |  | Italy |
|  | Belgium |  | The Netherlands |
|  | Czech Republic |  | Norway |
|  | Denmark |  | Poland |
|  | Estonia |  | Romania |
|  | Finland |  | Spain |
|  | France |  | Sweden |
|  | Germany |  | Switzerland |
|  | Ireland |  | Turkey |
|  | Israel |  | UK |
| | |  | Cyprus |
| | |  | European Commission |
| | | | SCAR (observers) |



A three stage process

1. Development of a **Common Vision** with long term objectives
How cooperation and coordination of research at EU level can address the combined challenges of food security against the continuous threat represented by various scenarios of climate change, global population growth and food / non-food demand
2. Translate it into a **Strategic Research Agenda (SRA)**
Establishing medium to long-term research needs and objectives in the area of food security through adaptation to and mitigation of climate change in agriculture
3. **SRA implementation**
identifying and exchanging information; joint foresight and technology assessment; joint research activities/modalities; infrastructure; EU/global aspects; public-private partnerships; needs of consumers and industry



Strategic Research Agenda

Launched in December 2012

The five core themes for



Agriculture, Food Security and Climate Change
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2• Environmental and intensification

3• Assessing and food production, bio se

change adaptation

house gas mitigation

FACCE – JPI
Strategic Research Agenda

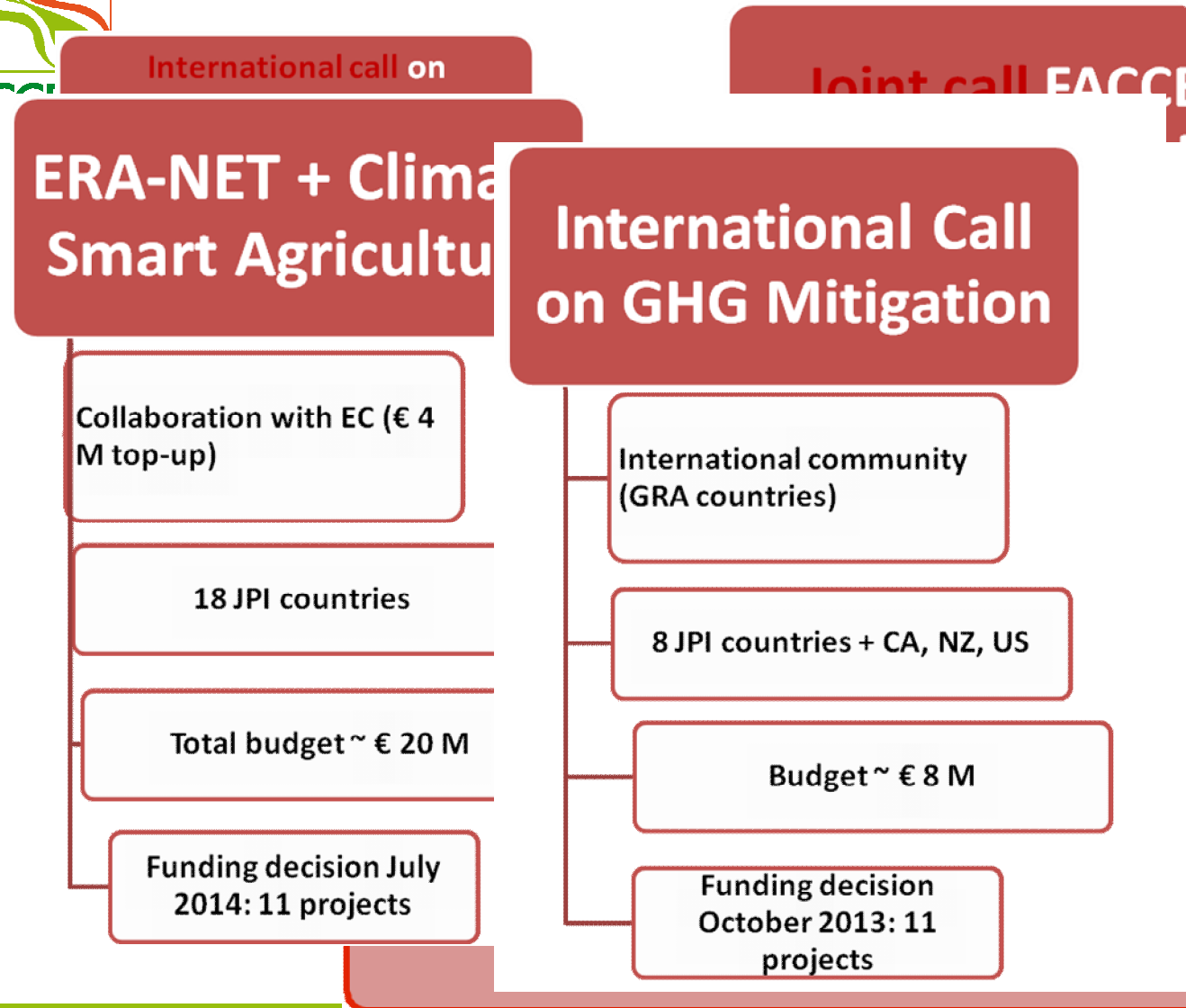
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Agriculture Food Security and Climate Change



FACCE where we are





FACCE – JPI Implementation Plan: Where we are going



Adopted 21 October 2013

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Agriculture Food Security and Climate Change



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FACCE-JPI: How we work

Based on common vision and Strategic Research Agenda, FACCE-JPI defines three types of joint actions

ALIGN: Much research/all or many countries → Alignment, e.g. through Knowledge Hubs or Knowledge Networks, Thematic Annual Programming (Geographic, thematic) or working with existing initiatives

Avoid duplication, create critical mass, data and model sharing

INVEST: Need for new research funding → New calls (H2020, ERA-NETs, new transnational calls)

Strengthen European research effort, create synergy

EXPLORE: Emerging research topics → Ideas lab, workshops

Enhance innovation and breakthrough technologies

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The Implementation Plan: 2014

Alignment of existing national research

- **1 Knowledge Hub** on plant disease epidemiology under climate change
- **1 Knowledge Network** on the development of options for sustainable intensification of European crop (both major and minor crops) and livestock systems

Co-funding:

- **1 ERA-NET** on Sustainable and resilient agriculture for food and non-food systems
- **1 FACCE** Coordination and Support Action

Explore:

- **2 Exploratory workshops:**
 - Animal health and diseases and GHG Mitigation
 - Food safety implications of climate change and climate variability



The Implementation Plan: 2015

Alignment of existing national research

- **1 Knowledge Hub** on experimental climate change studies on crop and grassland systems
- **1 Thematic Annual Programming Network** : gather national funders to discuss major national research programmes on improving agricultural soil quality, with the objective to align them

Co-funding:

- **1 ERA-NET** on Agricultural greenhouse gas research (proposed by FACCE)
- 2 additional ERA-NETs on Sust. Animal Production, Water

Explore:

3 Exploratory workshops :

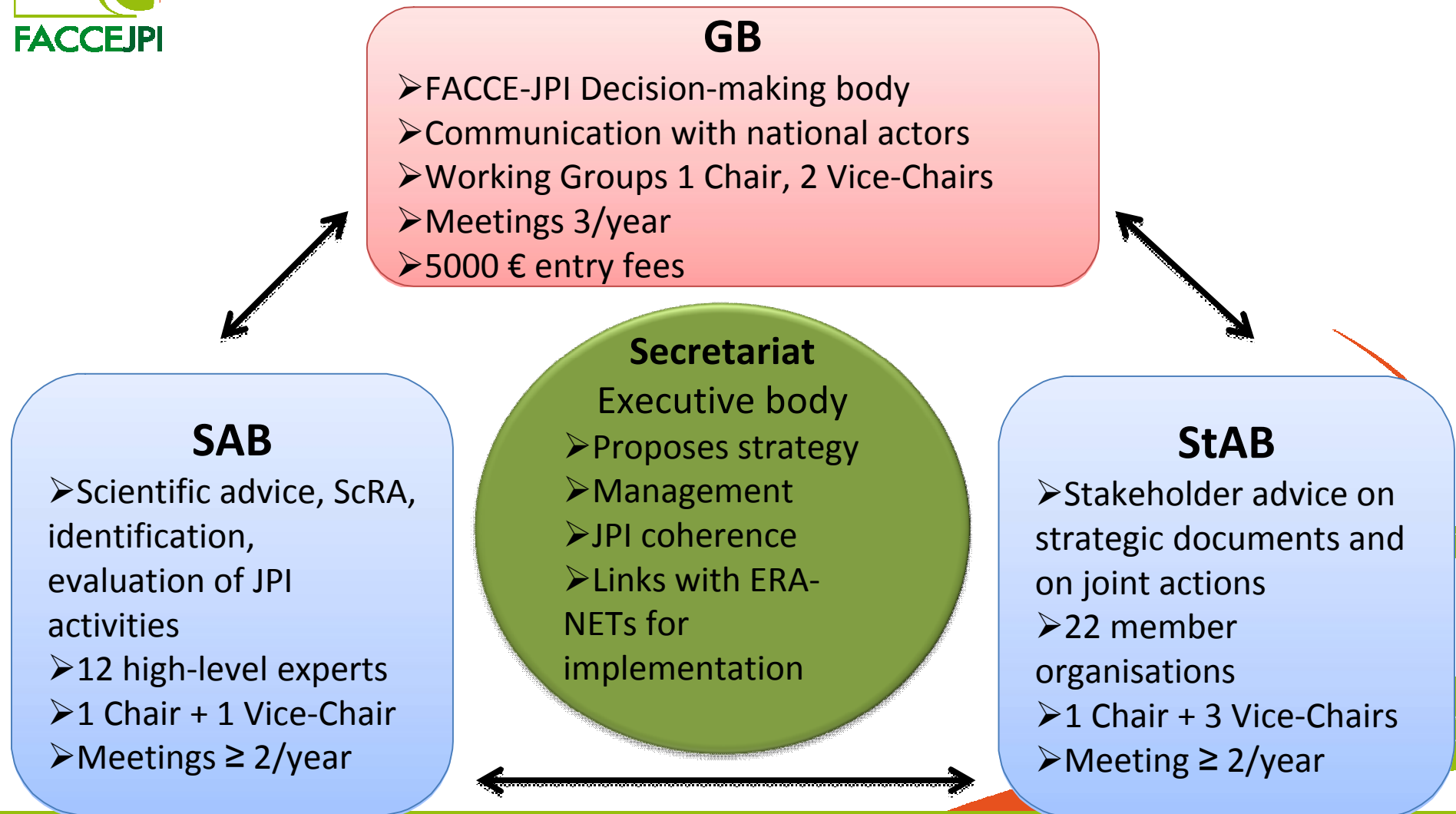
- Methods for better integrating research on food economics and climate change
- Better understanding of trade-offs across ecosystem services and their economic effects at farm level

- Overcoming socioeconomic and technological barriers to GHG mitigation in European agri-food chains



FACCE-JPI permanent governance

(adopted February 2012)





FACCE-JPI actors and their roles

- ❖ National Ministries, funding agencies → Governing Board – adoption of joint actions (top down approach to address societal challenge)
- ❖ Stakeholders – consumer organisations, farmers associations, European technology platforms representing private sector, NGOs, European and international research associations and/or initiatives. StAB provides input into actions by indicating what outcomes are desired
- ❖ The research community (incl. Scientific Advisory Board). SAB provides scientific expertise on areas where research is required. The scientific community carries out this research



Reaching the scientific community

- ❖ GB members are responsible for sharing information in their countries
 - ❖ For all calls, a pre-announcement is prepared for wide diffusion in the participating countries and through FACCE-JPI website
 - ❖ FACCE's next challenge is to improve the appropriation of FACCE's SRA at the national level → working group to be led by France
- National representatives need to systematically communicate with universities, research organisations, private sector actors. And research performing organisations need to act through their FACCE national representative

Welcome to FACCE JPI

Why Agriculture, Food Security and Climate Change?

Agriculture, food security and climate change pose key challenges for the world. The 2007-2008 world food crisis was a stark reminder that all countries need to build more resilient food systems in the light of expected (and unexpected) changes ahead. Research must play a leading role in bringing solutions. Europe has and continues to develop knowledge and technologies to underpin sustainable and competitive food production systems.

Agriculture (including forestry and aquaculture) are highly exposed to climate change – the variability of crop yields has already increased as a consequence of extreme climate events, such as the summer heat of 2003 and the spring drought of 2007 in Europe. However the agriculture and forestry sectors also offer the potential of mitigation of nitrous oxide (N₂O) and methane (CH₄) emissions, while reducing greenhouse gas (GHG) emissions associated with indirect land use change and the development of verifiable GHG mitigation and carbon sequestration measures. Agriculture has to meet a demand for food which is estimated to rise globally by 50% by 2030 and to double by 2050, due to population growth, urbanisation and increased affluence in many societies.

[Read more](#)

FACCE JPI News

Biodiversity and Food Security – From Trade-offs to Synergies, 29-31 October 2014



3rd International Conference on Biodiversity and the UN Millennium Development Goals - October 29-31, 2014, Aix-en-Provence, France

[Read more](#)

International Innovation interview with Marion Guillou now online

FACCE - JPI Governing Board Chair, Marion Guillou, speaks about the JPI in the journal International Innovation.

[Read more](#)

European agriculture and food security: FACCE – JPI and Teagasc host "The Great Debate – on the Battle to Feed a Changing Planet"



The European joint programming initiative on Agriculture, Food Security and Climate Change (FACCE – JPI) and its Irish partner TEAGASC co-organised a series of events at the ESOF conference includi...

[Read more](#)

Bucharest, Romania - 24 - 25 September 2014

Food Safety Implications of Climate Change and Climate Variability workshop

Food Safety Implications of Climate Change and Climate Variability

This workshop will be the second exploratory workshop within the 2014-2015 Implementation Plan of the FACCE-JPI Strategic Research Agenda.



[Read more](#)

Calendar

Oct 2014						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

[view all events](#)

Joint Programming

- ▶ What is Joint Programming?

Links to other initiatives

- ▶ KIC Climate
- ▶ Challenge Program on Climate Change, Agriculture and Food Security (CCAFS)
- ▶ Global research alliance on agricultural greenhouse gases
- ▶ JPI Climate
- ▶ JPI HDHL
- ▶ List of other initiatives



How FACCE-JPI can bring added value

- ❖ With some exceptions, joint programming is not about funding new research. It is about getting the most out of research that is being funded at the national level and avoiding duplication
 - ❖ More for less
- ❖ Bringing together researchers working in the same area creates European (and international) networks and critical mass needed to address societal challenges
- ❖ FACCE actions may also provide capacity building in countries with less research expertise



MACSUR

MACSUR Knowledge Hub as an example:

KH = Research + networking + capacity building

- Brings together 265 people in 71 institutions of 18 countries, Provided important inputs into IPCC AR5,
- Has made a survey of 86 crop, 10 grassland, 8 farm and 26 economics models
- 170 peer reviewed publications, 16 contributions to books, 13 other publications, 301 external presentations, 1 international congress
- 260 additional person months (over 3 years), 8 M€ fresh money
- 14 supervised theses
- 36 training and specialist workshops



Other ideas to be developed « learning by doing »

- Knowledge Networks
- Thematic Annual Programming networks
- Education, training and mobility
- Centres of excellence
- Networks of experimental/ demonstration sites (e.g. farms)
- Coordination of nationally funded research (COST)
- Research infrastructures
- Smart specialisation
- Ideas labs
- Venture challenges...

Thank you for your attention!

Email: SecretariatJPI@paris.inra.fr

Visit: www.faccejpi.com



Agriculture Food Security and Climate Change



5 core-themes:

- 1• **Sustainable food security under climate change**, based on an integrated food systems perspective: modelling, benchmarking and policy research perspective
- 2• Environmentally **sustainable growth and intensification of agricultural systems** under current and future climate and resource availability
- 3• Assessing and reducing **trade-offs between food production, biodiversity and ecosystem services**
- 4• **Adaptation to climate change** throughout the whole food chain, including market repercussions
- 5• **Greenhouse gas mitigation**: nitrous oxide and methane mitigation in the agriculture and forestry sector, carbon sequestration, fossil fuel substitution and mitigating GHG emissions induced by indirect land use change