



Knowledge Network on Sustainable Intensification (KNSI)

Report of the kick off meeting

3rd June 2016, Friday
Wageningen UR, The Netherlands

Agriculture Food Security and Climate Change

The main aims of the Knowledge Network on Sustainable Intensification (KNSI) kick off meeting were to introduce one another and exchange information, discuss and adopt the terms of reference for the KNSI Committee and to establish a programme of work for 2016-2017.

Introductions

Welcome and tour de table

Huub Löffler, FACCE-JPI Governing Board (GB) member, Wageningen UR, NL

Huub opened the day by welcoming the participants to Wageningen University and Research centre. Within Wageningen UR, nine research institutes, both specialised and applied, have joined forces with Wageningen University to help answer the most important question in the domain of climate-resilient agriculture, healthy food and living environments. A tour de table was then conducted where participants gave their short introductions.

Introduction to FACCE-JPI

Annette Wijering, FACCE-JPI GB Vice-Chair, Ministry of Economic Affairs, NL

Annette gave a briefing on FACCE-JPI by revisiting the concept of Joint Programming, the scope of FACCE-JPI and its permanent governance. She also reiterated the vision and strategy of FACCE-JPI and the process of implementation of the long term objectives. She then presented the five Core Themes of FACCE-JPI Strategic Research Agenda¹ (SRA) and indicated the actions that have been carried out under each of the Core Themes. She noted that although the Knowledge Network on Sustainable Intensification (KNSI) has been established as a Core Theme 2 (Environmentally sustainable intensification of agricultural systems under current and future climate and resource availability) action, it covers important aspects of relevance to all Core Themes.

Introduction to KNSI, the KNSI Committee and expected outcomes of the Kick-off meeting

Lucy Foster, FACCE-JPI GB member, Defra, UK

Lucy introduced the Knowledge Network instrument, an instrument to foster cooperation and communication between funders/policy makers, research groups and other stakeholders and reiterated the main aims of KNSI. A Knowledge Network is a new instrument that aims for alignment at funder/policy level as well as research level. It is primarily focussed on making effective use of existing funding. This FACCE-JPI action is focussed on Core Theme 2 of the SRA and is very well reflected in the national priorities of participating countries.

The KNSI Committee is a dedicated group of National Research Leads (NRLs) and National Funder Representatives (NFRs) who network and exchange information and ideas, bring together researchers, policy makers from participating countries to align research, policy and funding and perform interventions in the interest of achieving the SI goals. The expected outcomes of the kick off meeting was to introduce the people in the network, to introduce each participating country and their ideas, aims, expectations and ambitions and to formulate an action plan for the coming years.

¹ FACCE-JPI Strategic Research Agenda (SRA): <https://www.faccejpi.com/Strategic-Research-Agenda>

Lucy then familiarised the participants about the structure of the meeting with morning session concentrating on introductions, examples on how a network could look like, discussing the terms of reference of the committee and presentations from participating countries. The presentations from participating countries would continue through to the afternoon session followed by formulation of an action plan through plenary as well as group discussions.

Vistas on how a Knowledge Network could look

The MACSUR example

André Bannink, co-Chair of Live M MACSUR

André gave a presentation on MACSUR², a Knowledge Hub (KH) of FACCE-JPI with an aim of providing an overview of the instrument and experiences in MACSUR so far. He presented the mission, aims and key activities in MACSUR. The MACSUR community consists of 300 members in 18 countries. It started in 2012 (first phase) and is currently funded until 2017 (second phase). It was noted that MACSUR, in its 4 years of existence, has had major impacts and resulted in 310 papers/chapters, 200 reports, 500 presentations, 31 workshops and conferences, 13 funded new projects and 24 PhD/MSc students and approximately 100 peer-reviewed articles acknowledging MACSUR in their publications.

A Knowledge Hub is an instrument building on the concept of ‘network of excellence’ and enables collaborations between research groups by bringing together researchers that already have national funding in a thematic area. The FACCE KH provides support with coordination costs, travel expenses and thematic workshops to support research and/or mobility.

The work in MACSUR is organised in three themes on modelling of crops (Crop M), livestock (Live M) and the socio-economics (Trade M). In addition, there are cross cutting activities to integrate knowledge across disciplines. The KH is led by Project Steering Committee and coordinated within three sub-themes by theme leaders. The task leaders within the work packages are responsible for cross-cutting activities.

KNSI can learn from MACSUR’s best practices and draw from their strengths and weaknesses. Below is the SWOT analysis of the KH presented by André.

Strengths	Weaknesses
<ul style="list-style-type: none"> • Multidisciplinary topics • Interaction with other disciplines (exchange of knowledge, views, approaches) • Greater visibility, global collaboration • Collaboration with external stakeholders (food chain, decision makers) • Greater pool for new collaborations • Resource for capacity building 	<ul style="list-style-type: none"> • Heterogeneity in funding <ul style="list-style-type: none"> ○ 0-1 M€ per country in first phase, for different purposes ○ Funding contracts start late and at different dates ○ Adds layer of bureaucracy in reporting and administration • In-kind funding <ul style="list-style-type: none"> ○ Requires bottom-up planning, limits coherence of work ○ Limits identification with project and attribution ○ Limits available time and staff • Slow reaction to changes in stakeholder demands • Few staff for management/coordination • Preselected partners, limitation of collaboration
Opportunities	Threats
<ul style="list-style-type: none"> • Major societal issue (food, water, energy) • Funding for an interdisciplinary topic • Input from stakeholders, relevance 	<ul style="list-style-type: none"> • Greater attractiveness and precedence of global initiatives • Variable support of national governments

² Modelling European Agriculture with Climate Change for Food Security (MACSUR): <http://macsur.eu/index.php/about-macsur>

<ul style="list-style-type: none"> • Collaboration on emerging topic by subgroups 	<ul style="list-style-type: none"> • Great and many expectations – low input • Incoherence of external and internal goals, uncertain future
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André then concluded by stating that it is important to set SMART goals and priorities in line with the available resources, strengthen leadership and administration. The Committee strongly noted that it was important for KNSI to take this point from MACSUR and set SMART goals and priorities accordingly. It was also noted that the added value of KNSI was in bringing together the researcher and funders/policymakers which would ensure a broader view of the SI landscape to help identify synergies, gaps and complementarities.

The UK national SI networks

Michael Winter, University of Exeter

Michael provided an overview of networks and activities that support innovative research in SI in the UK.

Sustainable Intensification Research Platform (SIP)³, funded by Defra, is an active network of stakeholders and researchers looking at opportunities and risks for SI in England and Wales, and how SI can be put into practice. The platform comprises of three linked projects: at farm scale, landscape scale and a scoping study on supply chain. The SIP locations consist of 7 study areas and 5 study farms that are important to the research in the platform.

Sustainable Intensification Research Network (SIRN) is a BBSRC-NERC funded community network that is focussed on Sustainable Intensification and has a broader scope. The SIRN:

- Brings together new (and existing) combinations of researcher from different disciplinary communities with roles to play in addressing SI
- Facilitate collaboration and stimulate proposals for innovative, systems-oriented research relevant to SI at the interfaces between disciplines in the biological, environmental and social sciences
- Enable the integration of genetics (in its broadest sense), agronomy and environmental science in research to optimise agricultural systems (having regard also to their broader social and economic contexts)

Sustainable Agriculture Research and Innovation Club (SARIC) is a partnership between industry and funders (NERC and BBSRC) to support innovative projects that will provide solutions to key challenges affecting the efficiency, productivity and sustainability of the UK crop and livestock sectors, with a focus on water and nutrient related issues. It has identified two key challenges to be addressed through two funding calls: 1) Resilient and robust crop and livestock production systems and 2) Predictive capabilities for sustainable agriculture.

The Global Food Security (GFS)⁴ programme brings together funders of food related research with an aim to meet the challenges of providing the world’s growing population with a sustainable, secure supply of safe, nutritious and affordable high-quality food using less land, with lower inputs, and in the context of global climate change, other environmental changes and declining resources.

Session 1: Terms of Reference (ToR) for the KNSI Committee

Paul Wiley, FACCE-JPI Secretariat (BBSRC)

Paul presented the Terms of Reference of the KNSI Committee and noted that the Committee, comprising of National Research Leads (NRL) and National Funding Representatives (NFR), is the core of the Knowledge Network. He then outlined the objectives and scope of KNSI and the position of the

³ Sustainable Intensification Research Platform (SIP): <http://www.siplatform.org.uk/what-sip>
⁴ Global Food Security (GFS): <http://www.foodsecurity.ac.uk/index.html>

Committee within FACCE-JPI. The management structure of the KNSI Committee consists of NRLs and NFRs that link back to their national communities and is supported by FACCE-JPI GB, SAB, StAB and the Secretariat. The mandate of the Committee is advisory to the FACCE-JPI GB. Paul also gave an overview of functions, governance, duration and meetings and tasks of the Committee.

The ToR was then discussed and adopted following clarification and agreement on few issues:

- Flexibility to accommodate the meetings according to the Committee's request;
- Standardising to 'country' or 'member country' when referring to participating countries;
- Statement about new memberships (country) in the KNSI to be separated from the paragraph on 'duration of Committee membership';
- Reiterating that the exchange of information between the participating country and the NRLs and NFRs should occur.

Session 2: Scope of the network – state of play from participating countries

During this session, the NFRs and NRLs or their representatives from 9 participating countries (CH, DK, ES, FI, FR, IE, NL, NO and UK) gave presentations on their current national state of play in the SI domain.

Below is an overview of presentations from each of the countries:

Denmark

Torsten Rødel Berg, Aarhus University

NRL: Torsten Rødel Berg, Aarhus University

NFR: Erik Steen Kristensen, Aarhus University

There is no formal national SI network in Denmark. The Bioeconomy reference group is a network that drives activities related to SI and the two projects on future cropping and on agroecological approach contribute to the area. The thinking of 'more for less' already exists with lots of activities in the SI area. The cooperation between research, farming, authorities and regulation is strong across the spectrum of SI research.

The 2016 'Agricultural Package' is a new Danish regulatory framework that outlines the following research priorities: platform technologies, aggregate data, Nitrogen turnover data, crops, IPM strategies, nutrient movements, drainage measurements, intelligent irrigation systems, soil nutrient reserve optimisation and wetlands etc. By being involved in the KNSI, the alignment of DK initiatives and synergies is expected. DK is keen to learn from and contribute to peers who face similar framework and farming conditions. The KNSI should focus on spatially differentiated approaches at EU level and conceptually develop the highly contrasted notion of SI.

Finland

Pirjo Peltonen Sainio, Natural Resources Institute, Luke

NRL: Pirjo Peltonen Sainio, Natural Resources Institute, Luke

NFR: Elina Nikkola, Ministry of Agriculture and Forestry, MMM

There are three national SI networks: 1) PeltoOptimi-network: Sustainable Intensification of Agriculture through Land Use Changes; 2) OPAL-Life-network: Optimising Agricultural Land Use to Mitigate Climate Change and 3) NorfaSys-network: Integrated Modelling of Nordic Farming Systems for Sustainable intensification under Climate Change.

The national strategies indicate focal points for SI research and there is national funding for piloting at national, regional and farm scale level to facilitate international networking. The priorities lie in high

quality long term datasets open for research and follow-up data and studies on impacts of EU agricultural policies. The KNSI network is a useful platform to foster collaborations, new contacts and new ideas. The network could lead to future opportunities to have joint projects and thereby to expand the activities currently carried out at national scale. At the European level, KNSI network could cover the farm-region-country-EU decision making nexus. It could also influence EU policies to better support and enable implementation of sustainable intensification actions.

France

Guy Richard, INRA

NRL+NFL: Guy Richard, INRA

There are eight inter-disciplinary metaprogrammes covering the landscape of research in sustainable intensification:

- ACCAF: Adaptation of Agriculture and Forests to Climate Change
- DIDIT: Diet Impacts and Determinants: Interactions and Transitions
- EcoServ: Agriculture and forest ecosystem services
- GISA: Integrated Management of Animal Health
- GloFoods: Transitions to Global Food Security
- MEM: Meta-omics and microbial ecosystems
- SelGen: Genomic Selection
- SMaCH: Sustainable Management of Crop Health

Main challenge for agriculture is a complex, holistic and multi-level challenge in the context of global changes – from climate change to market and price fluctuations. SI is not only a question of food production but other aspects should also be considered including climate change regulation, open landscape, reduction of negative impacts on soil, water, air, biodiversity and reduction of natural resources mobilisation. Regional and international trade, waste and loss and eating patterns should also be included in the research concerning sustainability.

Main research and actions in agriculture includes genetics and breeding, plant and animal health, practices and systems, agroecology, bioeconomy and precision farming, and actor decisions and public policies. There are also multicriteria and multiscale assessment and research strategy combining interdisciplinary programmes, infrastructures for experimentation and modelling, non-academic partnership and foresight analysis. It is important to study network of farms and map SI related activities with key sites. A French partnership organisation is a network of technical and basic research that addresses areas of SI and has connections with EIP Agri. An 'Agriculture Innovation 2025' is being elaborated in France under the request of the Ministers for Research and Agriculture. It is formulated across 30 projects in three different areas namely 1) system approaches and soil, climate; 2) technology based innovations and 3) open innovation. It was noted that the network should have interactions and collaborations with relevant EIPs.

Ireland

Noel Collins, Department of Agriculture, Food and the Marine (DAFM)

NRL: Karl Richards, Teagasc

NFR: Noel Collins, DAFM

There is no formal national SI network in Ireland. The Agricultural Greenhouse Gas Research Initiative Network and Agricultural Catchments Programme contribute to the SI area and the Teagasc National farm survey and Irish food board have initiatives aimed at better understanding and enhancing SI. The research community working in the SI areas interacts regularly with stakeholders including public policy, enforcement, industry, farmers etc.

SI is central to key strategies in Ireland including Food Wise 2025 (agri-food strategy), Innovation 2020 and SHARP (Strategic Research Agenda in Sustainable Food Production and Processing Area). The KNSI Network is useful platform to have a deeper understanding of what sustainable truly means and

how it can be demonstrated, to build on current knowledge and state of art and to bridge gap between cutting edge research and practical approaches relevant to farmers. In short term, the network could highlight innovative farm and landscape management practices and cases of best practice for knowledge sharing. In a longer term, the network could facilitate a more coherent, collaborative and strategic approach to various national efforts at achieving SI.

The Netherlands

Martin van Ittersum, Wageningen UR

NRL: Martin van Ittersum, WUR (tbc)

NFR: Linda Reijers, Ministry of Economic Affairs (tbc)

Although there is no specific SI network, SI is one of the research strengths and priorities in NL with many partnerships in the knowledge chains. The Dutch agricultural innovation system has a strong triangle approach connecting knowledge, practice and policy, and involves a wide range of actors who enable, guide, fund, perform, implement, inform and facilitate innovation. The key SI players in The Netherlands are public sectors, national research council NWO, universities, applied research institutions and relevant networks (education, research, government, business).

SI strength in NL includes integrated systems approach to SI, quantitative approaches, multidisciplinary collaboration and public-private partnerships. With an overarching priority of transforming knowledge into innovation, the main priorities lie in a robust and resilient food system, development and assessment of metrics and indicators through use of models and databases, taking into account natural capital and biodiversity, plant and animal diseases, antibiotics and animal welfare, ICT, big data and precision farming.

The KNSI Network can provide insight into EU SI research community, create synergies and opportunities for long term collaboration and funding, proactively define the research agenda, create connections between research and policy to increase impact of SI insights and mutual learning and sharing of good practices on national research programming, knowledge dissemination and impact. The network could lead to alignment of research efforts and efficient use of public funding, establish a shared SI knowledge base for EU national and EC policy, create an easy accessible knowledge base and provide SI policy advice to FACCE GB.

Norway

Kirsti Anker-Nilssen, Research Council of Norway

NRL: Audun Korsæth, NIBIO

NFR: Kirsti Anker-Nilssen, RCN

There is no formal national SI network in Norway. Informal SI networks include large national flagship projects (Agropro, Agrispace, Smartcrop etc.) and national annual conference on agriculture. There is no SI community as such but it is based on individual initiatives from different research groups. The national strength lies in good stakeholder dialogue and engagement with a single research council having an overview. SI is an overarching priority with some focus on blue-green synergies.

The KNSI network could be a useful platform for international networking, knowledge exchange and alignment, stronger national and international cooperation, raising awareness of SI and to contribute to the development of novel ways of cooperation. At the European level, KNSI network could help discover overlaps, gaps and synergies, promote transnational cooperation, knowledge exchange and increased mobility, and contribute to research and innovation agenda (e.g. Food 2030). In a long term, the results could lead to resource efficiency and contribute to achieving sustainable food and nutrition security in EU.

Spain

Jesús Escudero, National Institute for Agricultural and Food Research and Technology (INIA)

NRL: Paloma Melgarejo, INIA

NFR: tbc, INIA

The functional SI network is coordinated by INIA and is composed of representatives of INIA and the National Autonomous Regions. The network focuses on thematic specialities in animal and crop farming within each national autonomous region (e.g. milk being a speciality in Cantabria region, olive oil and aquaculture in Andalusia etc.). The SI research strengths and priorities are in line with national R&D plan corresponding to SI in animal and crop farming as well as sustainable forestry exploitation.

By being involved in the KNSI, ES aspires to share expertise and data among different centres and improve SI along the different areas of interest and regions. At transnational level, KNSI should stimulate team building with relevant R&D groups, work in common projects and publications and share national expertise and best results e.g. in efficiency in water use and greenhouse gases.

Switzerland

Jochen Mayer, Agroscope

NRL: Jochen Mayer, Agroscope (tbc)

NFR: tbc

Although there is no formal national SI network in Switzerland, there are 2 national research programs on SI – 1) Sustainable use of soil focussing on soil quality and soil protection and 2) Health, nutrition and sustainable food production including food quality. Several actors are working on basic and applied research in the frame of SI including Agroscope, Swiss Federal universities etc. Funding institutions like Swiss National science foundation is supporting basic research and the federal office for agriculture and environment are supporting applied research. There are several activities ongoing in the SI related areas that are carried out independently as single research. There is a need to coordinate efforts in addressing SI issues. The current national activities focus mainly on climate change mitigation and crop production adaptation to climate change, soil protection and food quality and sustainable food production within the frame of the two national research programmes.

The KNSI network is an important platform to exchange on research activities on SI and work towards the development of common research strategies, avoid overlaps in research and coordinate research efforts across Europe.

United Kingdom

Lucy Foster, Defra

NRL: Andy Whitmore, Rothamstead Research

NFR: Lucy Foster, Defra

The UK national SI network was described by Michael Winter in his previous talk. The research areas in SI landscape is addressed and covered by Research Councils and government departments. The research in SI includes agricultural production, environmental management, economic and social aspects, food safety, human health, nutrition and energy and engineering. SI falls at the interface of several UK funders which gives an opportunity to integrated communities and use interdisciplinary, multi-scale approaches. The following are the funders' priorities:

- Gain predictive understanding of how agriculture functions within the wider landscape to inform future decisions on management of land for food security and climate mitigation
- Sustainably enhance agricultural production with improved resource use efficiency and better environmental outcomes
- Balancing production (optimising trade-offs) with maintenance of natural capital on which it and other ecosystems services depend
- Promoting collaboration and partnerships to stimulate innovation and tackle global food security and environmental issues

By being involved in the network, the UK SI community aims to participate in discussions and support and integrated SI research agenda in Europe, exchange expertise, best practice and knowledge,

influence future directions, promote UK research, better align UK and European research priorities and increase opportunities and scope for UK researchers. In short term, the network could map current multidisciplinary research and programmes in SI, increase exchange and dissemination of findings, improve integration of knowledge base and networks and improve opportunities for funding joint innovative SI projects. In the longer term, the network could help develop and test sustainable intensification metrics, gather evidence to support and influence policy making and new calls, deliver guidance, tools and solutions to farmers, land managers and researchers and improve access to funding and infrastructures.

Following the presentations and discussions, key points were noted:

Key points from the presentation and discussions:

- Most participating countries have no formal SI networks but a lot of activities that contribute to SI are happening;
- The participating countries feel that the network will be valuable in aligning transnational activities and ensuring collaborative approach to achieving SI. They are keen to share data, information, expertise and best practices to build on current knowledge.
- The KNSI network is a valuable platform to allow networking and exchange of best practices, new and existing knowledge and improve integration of knowledge base. It could also improve opportunities for transnational cooperation including funding and joint calls for innovative SI projects, access to infrastructures etc.
- The participating countries feel that the network could lead to development of a common SI strategy and should contribute to influencing high level European policy agendas e.g. Food and Nutrition Security Strategy, FP9 etc. to enable SI.
- The Knowledge Network could help increase impacts in SI and in broader issues of agriculture, food security and climate change by facilitating integration at different aspects and levels (from farm to consumers, from research to farmers and end-users).

Session 3: Knowledge Network Implementation of the instrument – actions for 2016-2017

During this session, the Committee discussed the potential programme of work. Following the discussions, the Committee noted the following main actions for 2016-2017:

Action plan for 2016-2017

- 1) Mapping of SI related activities, key sites (study farm, research site etc.), key areas covered, economic constraints and standard SI metrics and indicators; The goal of the mapping exercise should be very specific and clear;
- 2) Defining boundaries for SI i.e. scope of the network activities. It was agreed that agro-ecological approaches is included in the scope of SI;
- 3) Discuss and agree on ways of working (who does what and when). The Committee will discuss and agree on operational structure and meeting coordination to determine the roles and responsibilities of the KNSI Chairs, Committee members and Secretariat Working Group;

The KNSI is a network on Sustainable Intensification and should therefore focus both on intensification of production and sustainability. In the course of discussing the scientific scope of the network, the Committee noted that holistic approach for agroecology should be included. It is important for the

Committee to have a common understanding of what agroecology is (a common definition) and what aspects of ecology are attributable to sustainability. The Committee also agreed that KNSI's scope should include exploring wider sustainability issues, i.e. wider than farming and production and extending to social sustainability.

In the longer term, the KNSI should work towards achieving the following objectives outlined in the ToR.

Long term action plan

- Establish a clearly mapped network of multi-disciplinary research groups or consortia working on integrated approaches to sustainable intensification to share knowledge, expertise, reduce duplication and maximise impact;
- Create a network of research sites / prototype farms across Europe which are representative of a diverse range of agricultural systems and agro-climatic zones;
- Develop a typology of landscape classifications associated with the study farms on which to test standard sustainable intensification metrics (including indicators on productivity, GHG emissions, biodiversity and air, soil and water quality etc.);
- Raise awareness of innovative farm and landscape management practices which enable crops and livestock to be produced more efficiently and utilised more effectively within the bioeconomy;
- Identify cases of best-practice for knowledge sharing across the participating countries and beyond, and influencing policy development at national, EU and global level.

The Committee then discussed the transversal issues of capacity building, data and infrastructure, information dissemination and miscellaneous topics related to the network in a world café setting. Some main themes including short term and medium term priorities for each transversal issue emerged as below:

Capacity building:

Short term	Long term
<ul style="list-style-type: none"> • Indicators and metrics to evaluate SI • Raising awareness of KNSI and linking to existing national and global networks • Literature review on state of art networks • Analysing self-sustainability of the network and working towards a self-sustaining model 	<ul style="list-style-type: none"> • Possibilities for training schools • Validated indicators and metrics set for comparison of SI in participating countries • Translating research results into policy relevant information • Upscaling the network to global level

Data and infrastructure:

Short term	Long term
<ul style="list-style-type: none"> • Identifying type and source of data required • Dynamic mapping of thematic activities across Europe • Creating a metadata to generate meaningful information • Developing inventory of infrastructure (e.g. equipment for modelling, monitoring, database infrastructure, farm systems etc.) 	<ul style="list-style-type: none"> • Mapping and enhancing different decision making tools for farmers • Influencing EC to develop agrimetrics data • Adopting and developing emerging technologies and infrastructures

Information dissemination:

Short term	Long term
<ul style="list-style-type: none">• Developing communication strategy and clarifying communication structure including identification of target audience• Raising awareness about KNSI by involving in planned events• Developing a website or a webpage	<ul style="list-style-type: none">• Communications about what SI network can mean for research• Writing themes and call topics• Preparing policy briefs• SI mobile app?• Organising information exchange platforms like workshops, conferences, small working groups etc.

Other related issues:

Short term	Long term
<ul style="list-style-type: none">• Formulate clear examples of benefits of participating in the network• Clarify roles of the Committee• Delineate the boundaries of KNSI	<ul style="list-style-type: none">• Coordination across whole supply chain actors• Help create more formal SI networks nationally• Apps for consumers e.g. footprints etc.• Sustainability navigator• Involving and coordinating with bordering networks

Session 4: Conclusions and practical next steps

The actions coming out of the meeting were summarised by Dorri te Boekhorst as below:

KNSI Committee action plan for 2016-2017

- 1) Mapping of SI related activities, key sites (study farm, research site etc.), key areas covered, economic constraints and standard SI metrics and indicators;
- 2) Defining boundaries for SI i.e. scope of the network activities. It was agreed that agro-ecological approaches is included in the scope of SI;
- 3) Discuss and agree on ways of working (who does what and when). The Committee will discuss and agree on operational structure and meeting coordination to determine the roles and responsibilities of the KNSI Chairs, Committee members and Secretariat Working Group.

Practical next steps for KNSI Secretariat:

- Finalise the Terms of Reference of the Committee; **UPDATE:** Final ToR circulated to the Committee
- Contact the KNSI Committee with regards to the election/appointment of the Chair and vice-Chair;
- Circulate doodle poll to agree on a date for the next meeting – explore the possibility to have it back to back with the TempAg meeting of 5th – 7th October 2016;
- Prepare a report of the meeting and an action plan for 2016-2017;
- Take forward the actions coming out of the meeting.

Huub closed the meeting by thanking the participants and the secretariat for their active participation at the meeting.

END

*FACCE-JPI Secretariat /MB
June 2016, finalised September 2016*

Participants

NRLs and NFRs

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Linda Reijers	Ministry of Economic Affairs, NL
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