## Scoping study to evaluate the extent and quality of ex post impact assessment activity on livestock related research in the CGIAR to-date

Over the years there have been many *ex post* IA studies that have sought to document the impacts of agricultural research in the CGIAR, although the vast majority of these have focused on crop germplasm improvement, i.e., adoption and impact of improved crop varieties. As such there remain serious gaps in the extent to which impact assessment of other components of the CGIAR portfolio have been conducted. To fill this gap, one of the activities of the SPIA-coordinated SIAC program targets assessments of 'under-evaluated areas of CGIAR research'. The list of under-evaluated areas of CGIAR research includes irrigation and water management, livestock, agro-forestry, policy and social sciences, biodiversity and natural research management.

As a first step in a series of activities intended to increase the inventory of credible *ex post* IAs of underevaluated CGIAR research, SPIA is commissioning desk studies to review the IA work to-date in each of these areas. A review of the impact of CGIAR research on irrigation and water management has just been completed (Merrey, 2014)<sup>1</sup> and SPIA is now turning its attention to livestock research.

Livestock related research, which encompasses a fairly broad area of CGIAR research activities (animal genetic resource conservation and use, animal health, crop-livestock interactions, livestock feed management, livestock/environment/climate change, livestock value chains, livestock policy) is generally considered to be under-evaluated<sup>2</sup>. A significant part of the CGIAR's livestock related research has historically been conducted or coordinated by ILRI and its predecessors ILCA and ILRAD, although in more recent years other Centers (IFPRI, ICRISAT, ICARDA, IITA, CIAT and World Agroforestry) and CRPs have invested in specific aspects of livestock research. Although precise numbers are difficult to come by, it is likely that the CGIAR has to-date invested some US \$500 million or more in livestock-related research since the late 1970s (when ILCA and ILRAD joined the CGIAR). Despite this sizeable investment, there appears to have been relatively few published studies measuring and documenting the impact of this investment *ex post*. But this warrants closer examination, and for the studies that have been done, a critical review of the methods and data used and the findings would be a good first step in evaluating the potential for commissioning further IA studies.

A key objective of the desk study would be to identify the strengths and limitations of the existing livestock related research impact assessments (in terms of scale effects, rigor of causal relationships, or how close the impact indicators of the studies correspond to the System-Level Outcomes of the reformed CGIAR system). The desk study would also seek to identify the major constraints and limitations in terms of methods, data availability, resources, etc., which would in turn highlight potential for new work. For example, new initiatives may emphasize targeting intermediate impacts, e.g. estimating the extent of influence of ILRI's research on key livestock policies, or simply adoption of research outputs, rather than ultimate, CGIAR system-level outcomes and impacts. But it may also identify some areas of livestock research which have generated technologies or policies that have been widely adopted but as yet undocumented, but have good potential for measurement.

<sup>&</sup>lt;sup>1</sup> http://impact.cgiar.org/sites/default/files/pdf/Merrey-Irrigation Research IAs-Oct2014.pdf.

<sup>&</sup>lt;sup>2</sup> In their meta-assessment of the documented impacts of different areas of CGIAR research up until 2010, Renkow and Byerlee (2010) cite only one reference to studies attempting to measure impacts from CGIAR livestock – related research, a study by Kaitibie et al. (2007) assessing the impact of a policy change in dairy marketing in Kenya.

This initial background review will lay the groundwork for a subsequent scoping study which would assess the potential for utilizing state of the art approaches and possibly new data for launching a series of impact assessments of specific improved management related interventions or policy actions deriving from CGIAR research on livestock, irrigation and water management and other presumed underevaluated areas. Ultimately, this and other critical reviews of past studies and scoping study reports will form the basis for the SIAC Project Steering Committee recommending to the Fund Council Committee on Evaluation and Impact Assessment some specific areas for further impact assessment work under the SIAC program that has good potential for generating large scale, long term economic, social and environmental impacts from under-evaluated CGIAR research.

## Specific objectives of the background review

The desk study would seek to provide:

- 1. An estimate of the total investment in livestock related research and related activities within the CGIAR since about 1990.
- 2. A review of what the CGIAR has done in assessing the economic, social and environmental impacts of CG research in the area of livestock management. The review should make critical judgments about the credibility/rigor and scale of those studies relative to the total amount of investment. This should include identification of gaps (i.e., research 'successes' that don't feature in the impact assessment literature) and weaknesses in the reviewed studies, some of the promising methods and approaches used to-date, and key challenges in assessing large scale, long term impacts of CGIAR research in this area.
- 3. A summary of the estimated economic, social and environmental impacts (or influence) documented by the IA studies deemed to be reasonably credible, whether in quantitative and qualitative terms.
- 4. Based on survey or even anecdotal evidence, identification of management interventions or policy actions deriving from specific lines of CGIAR livestock related research that appear to warrant serious attention for future adoption and impact assessment studies.

## **Modus Operandi**

The desk study will be conducted by a two-person team working together to produce a report that addresses the objectives of the review. **The lead consultant**, a person with considerable knowledge of and experience with livestock research evaluation inside and outside the CGIAR, will have primary responsibility for overseeing the study and submitting the report as per the designated timeline. The time commitment here is expected to be 15 days. **The second consultant**, a person with expertise in *ex post* impact assessment in the context of livestock R & D, will be responsible for reviewing the set of IA studies submitted by the Centers/CRPs to assess the quality and credibility of the claims of those studies. The time commitment here is expected to be 10 days.

Some key reference material would be provided by the ISPC Secretariat, although considerable interactions with relevant CRPs and CGIAR Centers, e.g., ILRI, IFPRI, ICRISAT, ICARDA, CIAT, IITA, World Agroforestry and other relevant individuals would be required by the consultants. The SPIA Secretariat will facilitate initial contact with these institutions. The review is expected to take place between April and June 2015, with a draft final report submitted to SPIA by mid-July 2015. No travel is envisaged under these terms of reference. The consultants will report to the SPIA Secretariat in Rome – Timothy Kelley (timothy.kelley@fao.org). SPIA members/Secretariat will provide feedback on an outline report and the draft final report.

**Peer-review**: The draft final report should be sufficiently developed to be ready for peer-review by two external reviewers (in addition to SPIA's own comments on it). The lead consultant should outline how she/he has addressed the comments made by the peer-reviewer when submitting the revised final report.

## Output

The outputs will include:

- 1. An annotated outline of the report in early May 2015
- 2. A well-developed draft final report by mid-July 2015
- 3. A final report reflecting feedback from reviewers within two weeks of receiving comments from SPIA.