

# Background

We have done an intensive assessment of:

- The **issues** important to sustainability from multiple perspectives that relate directly to the sourcing of agricultural raw materials through use of controlled vocabularies to coordinate meaning.
- **Indicators** that can be used to measure these issues and how effective they are for different purposes (our database currently includes more than 2000 indicators).

A **prototype semantic web** informatics structure manages the data and a **querying process** quickly winnows the expansive set of indicators to a manageable set (approximately 10-20).

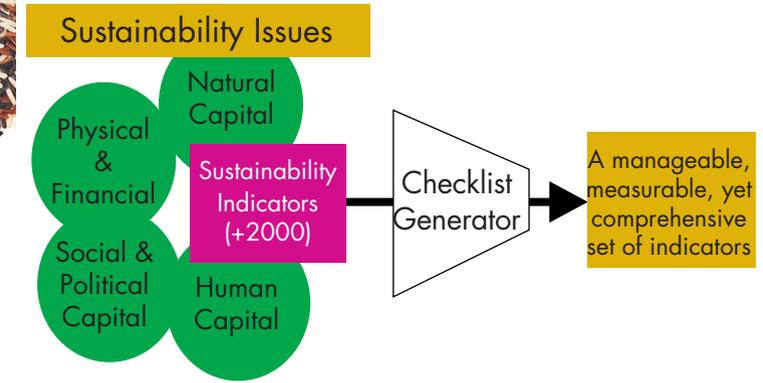
By using consistent methodologies, this process enables multi-scale commodity and region-specific indicator sets that define and measure the sustainability of global sourcing given current knowledge.

Through the application of our tools to several case studies, we hypothesize that a subset of issues applicable for all contexts will emerge to **elucidate a global definition of food system sustainability building from specific examples.**

# Focusing & Measuring Sustainability

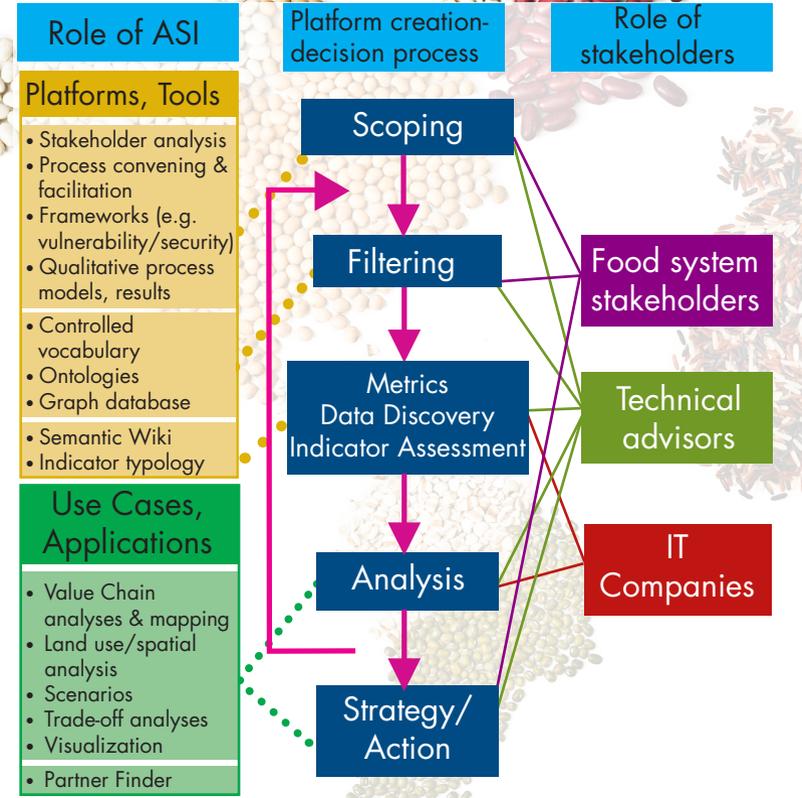
- How to choose a manageable set of indicators?
- How do we know we have the right list?
- How can we focus appropriately and still be comprehensive?

Our checklist generator process determines a minimum set of indicators that comprehensively covers sustainable sourcing.



Our tool allows users to find **specific indicator sets for different commodities, contexts, and frameworks.**

# Utilizing Information



ASI/ICE supports stakeholder processes using this platform. Our semantic wiki, checklist generator, and all other tools are open access.

# Partners

- **Academic:** Chinese Academy of Science, Colorado State University, Columbia University, Harvard University, Ohio State University, ETH Zürich, University of California, Berkeley, University of California, Davis, University of California, Merced, University of Minnesota, University of Tennessee-Knoxville, University of the West, University of Washington
- **Supply chain:** Bunge, Campbell Soup Company, Del Monte, Ladder Livestock, Kraft Foods Group, Mars Incorporated, Rabobank International, Sugarcane Growers Association of Capivari, Wells Fargo
- **Civil society:** Family Farm Alliance, Global Environmental Facility, Greenpeace International, IMAFLORA, Oxfam America, Royal Government of Bhutan, Solutions from the Land, The Nature Conservancy, World Resources Institute, World Wildlife Fund USA, Yocha Dehe Wintun Nation
- **Technology/Data:** California Digital Library, CGIAR, Encyclopedia of Life, Esri, Food & Agricultural Organization of the United Nations (FAO), Franz, Inc., Google, IBM, International Center for Tropical Agriculture (CIAT), International Food Policy Research Institute (IFPRI), Maplecroft

The strength of the Sustainable Sourcing project is in the network that creates it. We are always seeking new partners and food system stakeholders to engage in our work.

## Funders

The Sustainable Sourcing of Agricultural Raw Materials project was launched as a collaboration between the **Agricultural Sustainability Institute (ASI)** and the **Information Center for the Environment (ICE)**, with a gift to ASI from **Mars, Incorporated**.

Through additional support from **Kraft Foods, Inc.** and other collaborators, including the **World Food System Center at ETH Zürich**, the project is expanding to develop specific applications.

## Lead Institutions

The **Agricultural Sustainability Institute (ASI)** provides a hub for initiatives and education in sustainable agriculture and food systems across departments at the **University of California, Davis**, across the **University of California**, and with many other partners throughout California and beyond.

The **Information Center for the Environment (ICE)** is an environmental information brokerage and research lab in the **Department of Environmental Science & Policy at the University of California, Davis**. ICE specializes in the development and dissemination of geospatial data and technologies, and robust data architectures and decision support systems geared toward improving the capabilities of resource managers in a variety of sectors.

## For more information

<http://asi.ucdavis.edu/sustainablesourcing>

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# Sustainable Sourcing of Agricultural Raw Materials

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## About

The Sustainable Sourcing of Agricultural Raw Materials Project seeks to promote the long-term sustainability of the global food system by *providing publicly-available and scientifically-validated* information and tools to the broader food industry and to **support a comprehensive understanding of sustainability in multiple dimensions for a given commodity in a given location.**