Website: www.desertnet-international.org

WHAT IS FOOD SECURITY?

Food Security is understood as a situation:

When food is available at all times, that all persons have means of access to it, that it is nutritionally adequate in terms of quantity, quality and variety, and that it is acceptable within the given culture (World Food Summit 1996)

Food security depends on three major factors:

1. Food availability
2. Food accessibility and
3. Food utilization

CONCERNS ABOUT FOOD SECURITY ARE NOT NEW

The Universal Declaration of Human Rights (proclaimed and adopted on 10.12.1948, by the General Assembly of the UN) Article 25 states:

*Everyone has the right to a standard of living adequate for the health and well-being of himself and of his family, **including food**, clothing, housing and medical care and necessary social services, and the right to security in the event of unemployment, sickness, disability, widowhood, old age or other lack of livelihood in circumstances beyond his control.*

WHERE DO WE STAND TODAY[1]?

- One out of seven people on Earth today do not have enough food;
- Progress towards achieving the UN Millennium Development goal of halving the proportion of people living in hunger and poverty between 1990 and 2015 has been slow
- Recurrent volatilities in global food markets have contributed to global outbursts of increased hunger;
- Food systems are insufficiently adjusted to buffer shocks and stresses linked to both human (economic, political) and environmental (climatic, biophysical) drivers.

[1] Sources: Report of the 36th Session of the Committee on World Food Security/CFS (Rome, 11-14 and 16 October 2010) http://www.fao.org/docrep/meeting/020/k9551e.pdf, Ecosystems & Human Well-being: Desertification Synthesis (2005) http://www.millenniumassessment.org/documents/document.355.aspx.pdf

Dryland areas occupy 41% of the planet's land area and are particularly precariously placed to cope with these food security challenges. By the year 2000, drylands were home to 1/3 of the human population, many of whom sit below the poverty line. Drylands are already degraded by 10-20% (medium certainty) according to the Millennium Ecosystem Assessment. Thus, there are clear concerns about continued loss of the land's productivity and the knock-on impacts this could have for famine, as well as the creation of environmental and hunger refugees[2].

ROLE OF THE DNI WORKING GROUP ON FOOD SECURITY: LOOKING FORWARD

The multi-faceted nature of food security concerns especially in drylands bridges a range of different scientific research areas and requires an equally diverse interdisciplinary response. The DesertNet International Working Group on Food Security was launched in Alghero, Sardinia, in July 2011, in a session at the international conference on dryland ecosystem functioning and resilience: integrating biophysical assessment with socio-economic issues, entitled "Global Perspectives on Food Security and Food Sovereignty in Drylands" in order to identify pressing issues and initial recommendations from existing research. Presentations in this session considered the links between climate vulnerability and food security, food sovereignty and trends in global markets, food production and environmental variability and the links between livestock and livelihoods in building resilience and adaptive capacity of the production system.

Key emerging thematic areas linked to food security include: threats to food production (ability to grow sufficient food, links to land quality, land tenure, land ownership and water security, as well as rural-urban relationships linked to production and consumption); political aspects of land transactions (land and water grabbing); links between land condition, biodiversity, nutritional diversity and human health and wellbeing; integration of indigenous/local knowledge alongside scientific and technical knowledge (including discussions on genetically modified varieties); institutional and market aspects of food security in drylands (including pricing/market mechanisms, storage options, infrastructure) as well as aspects of food safety.

The scientific research areas noted above provide an important starting point for discussions across disciplines on the current state of knowledge. It is envisaged that this list will be further refined through forthcoming workshops, conferences and meetings with a view to delivering outputs in the form of briefing notes, policy advice and the fostering of research cooperation between scientists and policy makers to provide concrete policy options to address the food security challenge in drylands.

Membership of the DNI Food Security Working Group is open to all scientists who endorse the Declaration of DNI. For more information on joining the DNI Food Security Working Group, please contact Lindsay Stringer l.stringer@leeds.ac.uk and for more information on joining DNI, please contact: office@european-desertnet.eu

[2] Millennium Ecosystem Assessment, MA (2005): Ecosystems and human well-being: Desertification synthesis. http://www.maweb.org/en/Products.aspx.