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CFS 49

11-14 October 2021

The nexus between climate, water and food security and nutrition

Reflections on HLPE reports & CFS policy recommendations 2012 & 2015

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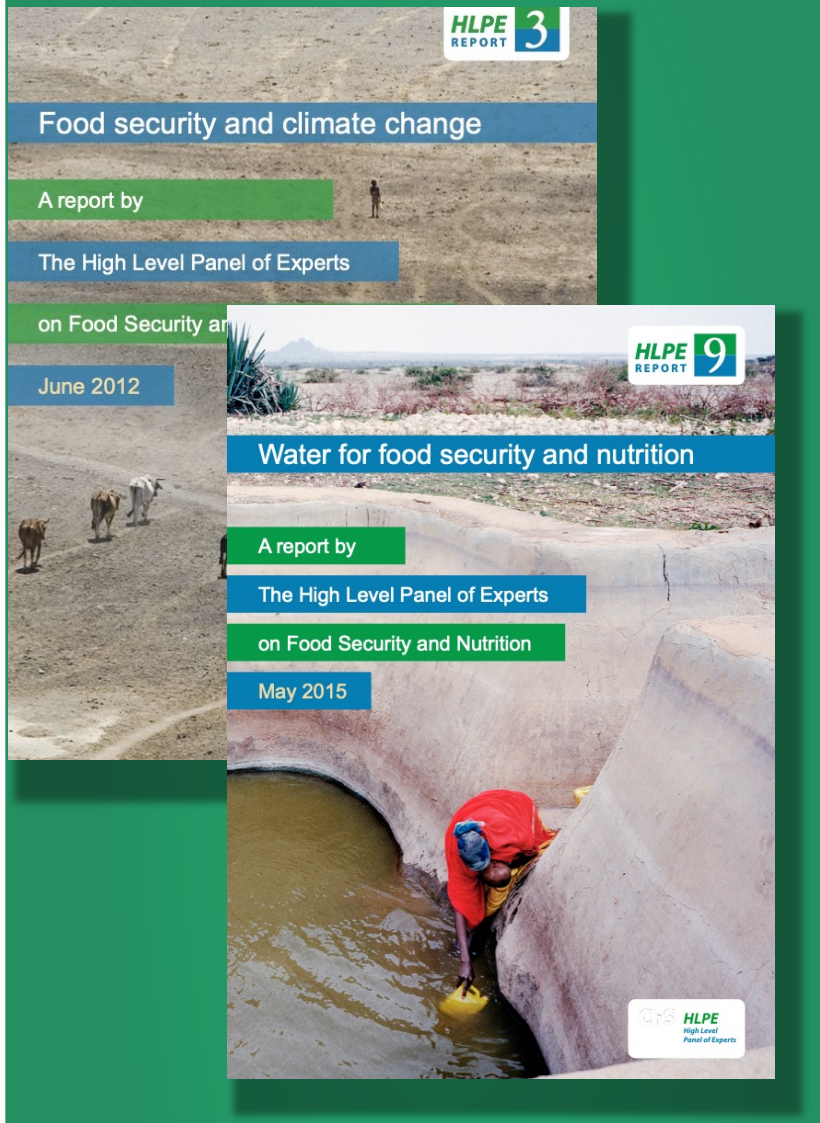

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Outline

A. The current understanding re climate, water and food security & nutrition (FSN)

B. Findings from HLPE reports:

- HLPE # 3: Climate change and FSN" (2012)
- HLPE # 9: "Water and FSN" (2015)

C. Updating conceptual frameworks: Food systems thinking and broader view of FSN -> climate change and water

D. Reflections on CFS policy recommendations

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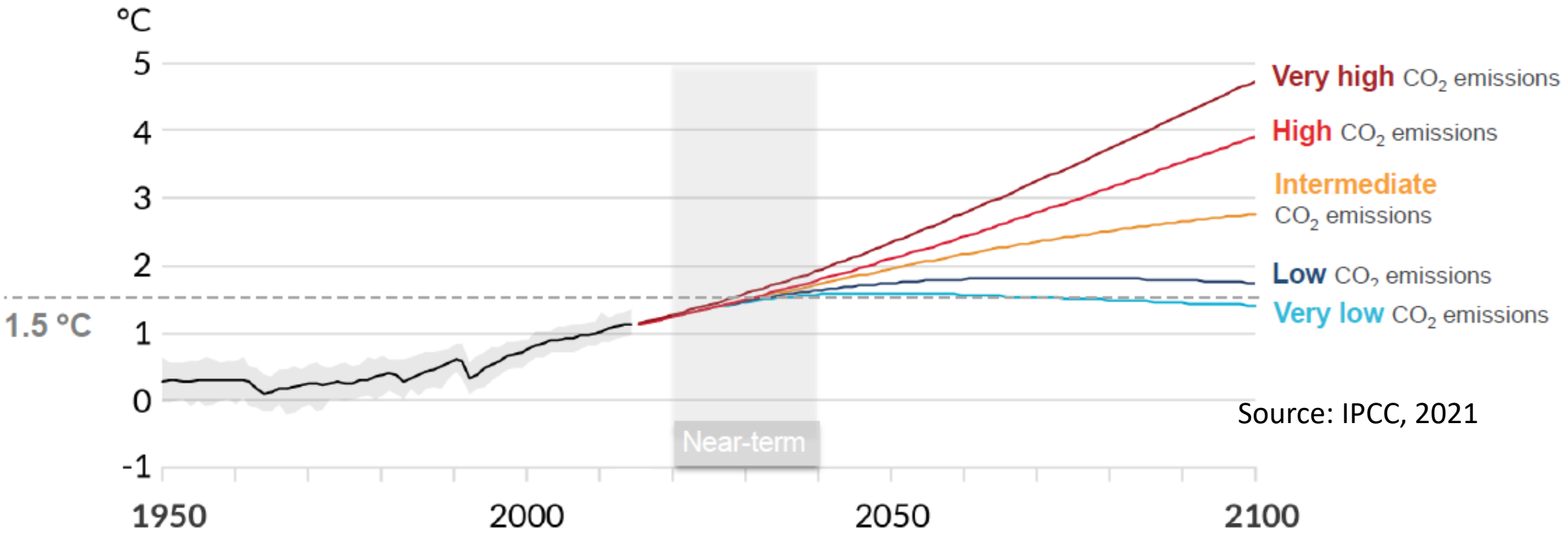
A. What we know about climate, H_2O & FSN

1. Global warming scenarios



Source: IPCC, 2021

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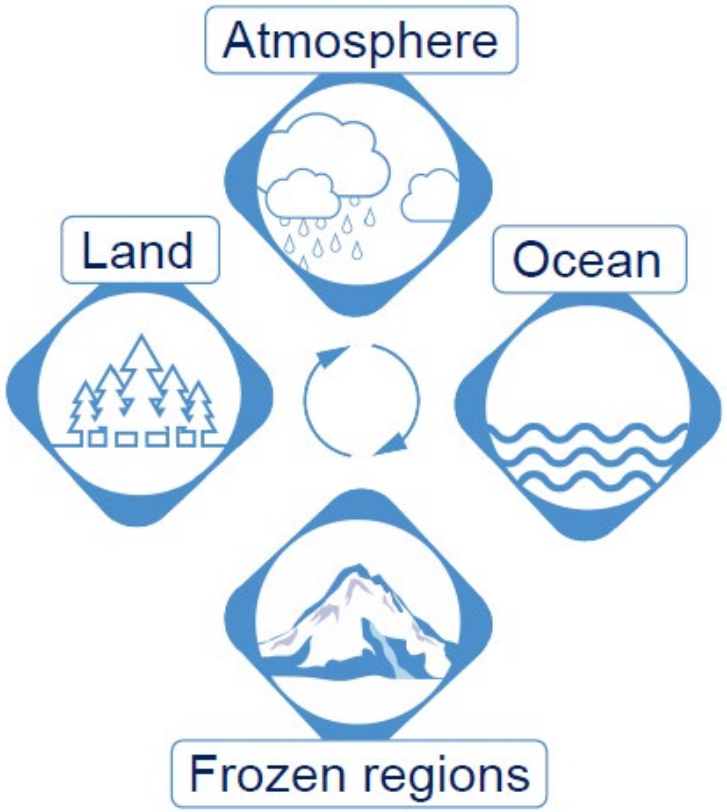
2. Climate change affecting water cycles

- Sea level rising at a fastest rates
- Droughts increasing
- Ocean warming, acidifying and losing oxygen
- More intense & heavy rainfall
- Complex changing of monsoon cycles
- Some effects irreversible: glacial retreat



Source: IPCC, 2021

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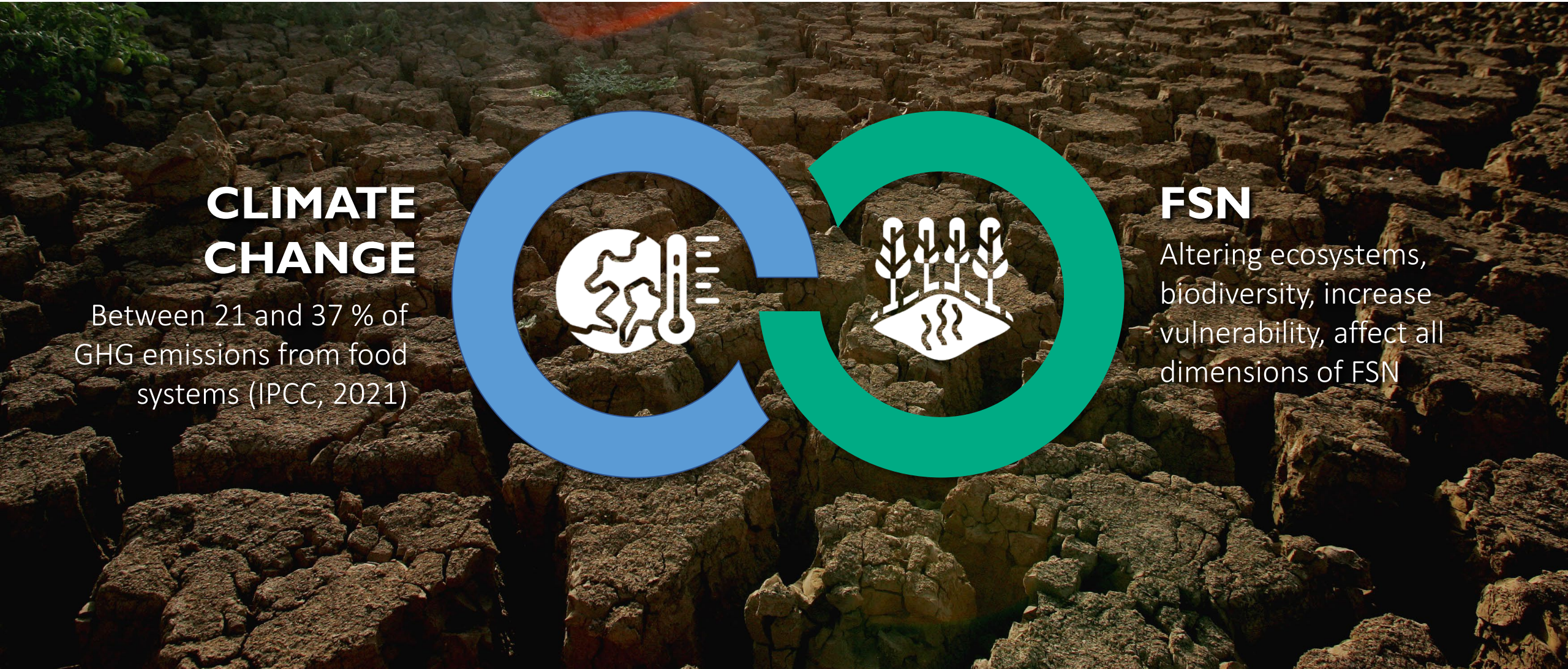
3. A two-way relationship between climate change and FSN



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B. Findings from HLPE reports #3 on climate change/FSN #9 on Water/FSN

HLPE report #3 on Climate change and food

Focus on how climate change affects agricultural production and FSN, and proposes mitigation and adaptation strategies

- Assessing vulnerability: Integrating biophysical and socioeconomic features essential.
- Emphasize the need to embed climate change adaptation in efforts to improve FSN
- Assess mitigation & food security jointly

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HLPE report #3 on Climate change and food security (Ctd.)

Key messages are still valid:

- Pursue synergies in food security and climate change actions
- Increase resilience of food systems to climate change
- Develop low-emissions agricultural strategies that contribute to food security
- Ensure participation of local stakeholders and use of local data and knowledge

What was missing:

- Limited attention to how agriculture production & associated activities affect climate change
- Report drafted at a time when agroecology was not as well accepted (HLPE #14)

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2. HLPE report #9 on Water for FSN (HLPE, 2015)

- Assesses multiple linkages between water and FSN beyond agriculture, through an ecosystem-based approach to integrate management of water, land and living resources
- Attention to technical, institutional, socio-economic, cultural and political dimensions
  - Access to water (socio-economic, gender & power relations)
  - Stability (climate change)
  - Water quality (food utilization, ecosystems' functioning
  - Wastewater as a resource or threat)

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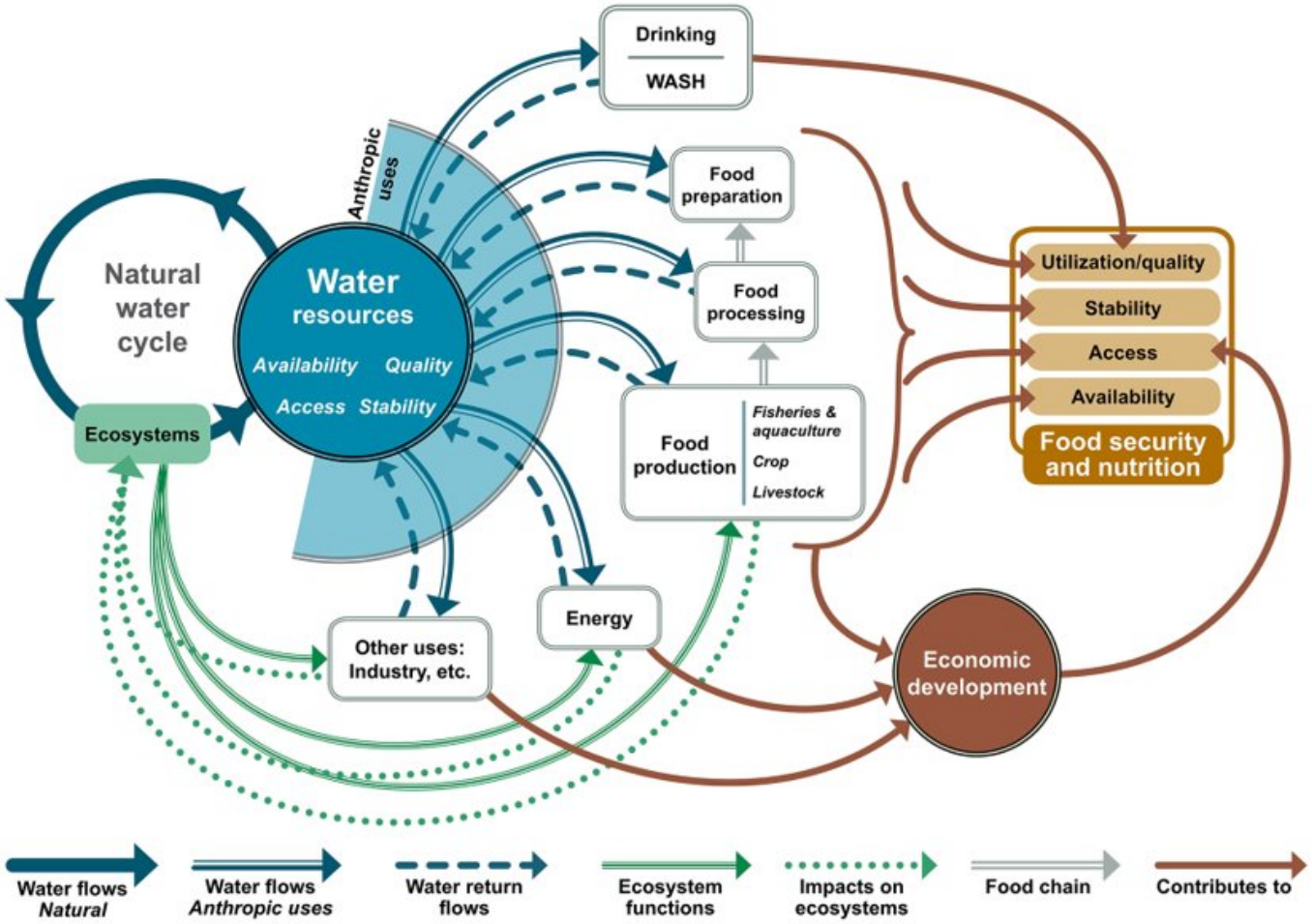
Multiple linkages between water and food security and nutrition



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HLPE report #9 on Water for FSN (HLPE, 2015) (Ctd.)

Key messages are still valid:

- Ensure sustainable management and conservation of ecosystems for the continued availability, quality and stability of water
- Ensure an integrated approach to Water and FSN related policies
- Prioritise the most vulnerable and marginalised
- Improve water management in agriculture (irrigated and rain-fed)
- Foster an inclusive and effective governance of water for FSN
- Promote a rights-based approach to governance of water for FSN

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Continuing challenges

- Insufficient data, especially sex-disaggregated and at the local level
- Issues of governance, rights and power relations continue to be overlooked
- Lack of integration of water and climate change in national policies and programmes and their impacts on FSN
- Lack of integration of major global initiatives on food, water and climate change

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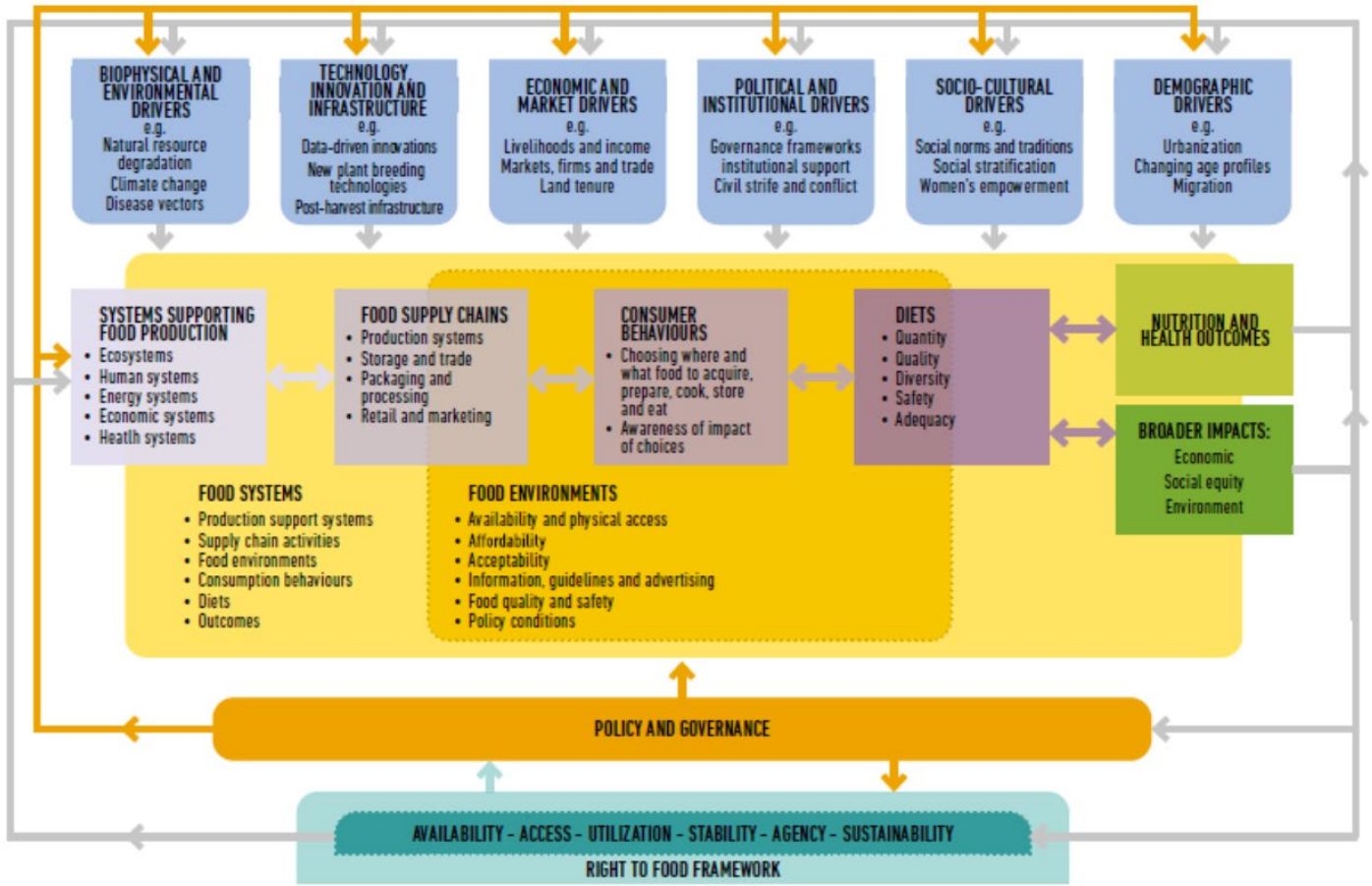
C. The importance of updated conceptual frameworks

1. A food systems approach can help advance analysis & policy on the climate/water/FSN nexus



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C. 2. Broadening FSN understanding to better address key issues of climate, water and food

- HLPE 15 (2020) proposes a six-dimensional approach to food security: Availability, Access, Utilization, Stability, **Agency & Sustainability**

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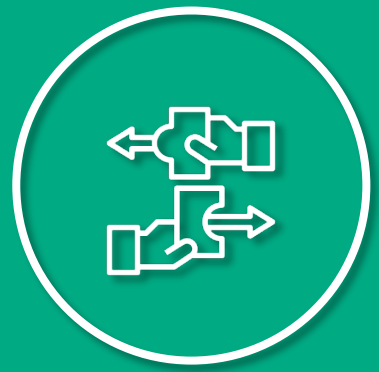
3. Sustainability and agency address key and neglected issues at water, climate and FSN nexus

a. AGENCY

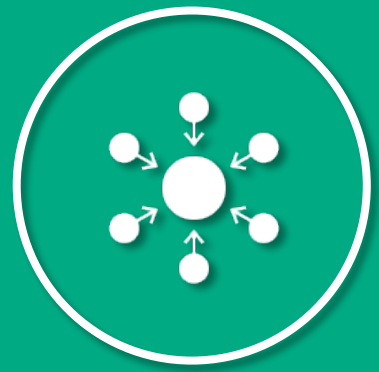
e.g., Situated agency and cropping decisions

GOVERNANCE

PARTICIPATION



DISTRIBUTION AND CONTROL



POWER RELATIONS

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b. SUSTAINABILITY

Links between sustainability, vulnerability and resilience

BIODIVERSITY

DIETS & HEALTH OUTCOMES

PRODUCTION SYSTEMS

ECOSYSTEMS & LIVELIHOODS

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D.1 Reflecting on CFS policy recommendation on climate change and FSN

CFS Recommendation on Food security and climate change:

- Reinforce attention of food systems' contribution to global warming and integrate sustainability concerns in food security policies
- Agroecology as approach for encouraging sustainability

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D.2 Reflecting on CFS policy recommendation on water for FSN

CFS Recommendation on Water for FSN

- Integrate a food systems approach into water cycle management
- Increase attention and responses to climate challenges

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Thank you! Questions?

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