

September 29<sup>th</sup> - 30<sup>th</sup>, 2016  
Palmeraie Golf Palace,  
Marrakesh



29 - 30 septembre 2016  
Palmeraie Golf Palace,  
Marrakech

## **HIGH-LEVEL MEETING ON THE INITIATIVE FOR THE ADAPTATION OF AFRICAN AGRICULTURE TO CLIMATE CHANGE "AAA"**

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**RENCONTRE DE HAUT NIVEAU SUR L'INITIATIVE  
POUR L'ADAPTATION DE L'AGRICULTURE AFRICAINE  
AUX CHANGEMENTS CLIMATIQUES "AAA"**



Food and Agriculture Organization  
of the United Nations



# Copying with water scarcity in agriculture: a global framework for action in a changing climate

- Supporting the Triple A initiative -



MARRAKECH  
COP22|2016|CMP12  
UN CLIMATE CHANGE CONFERENCE

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**RIO+20**  
Conferencia  
de las  
Naciones Unidas  
sobre el  
Desarrollo Sostenible

*Identified global challenges towards 2050 :  
“The future we want”*

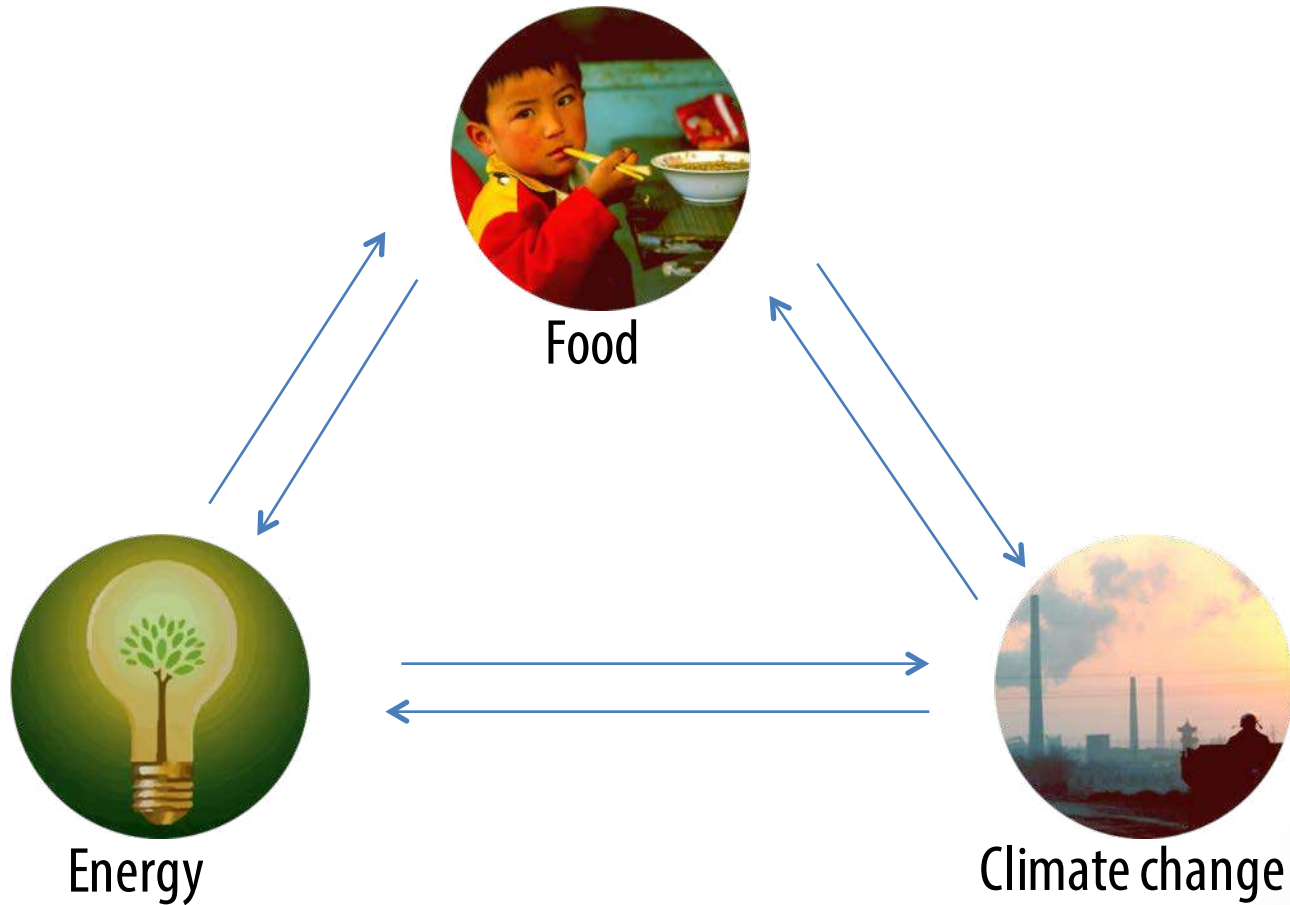
**2050**

# Global challenges

- From 7 to 9.1 billion people
  - *followed by slower population growth, older societies, increased urbanization, and migrations*
- Food production to increase 60-70% to meet demands
- Increased pressure on natural resources (water, soil, biodiversity)
- Climate change and extreme climate events
- Diverse energy sources
- Increased demand for governance, transparency and participation



# Main challenges in Rio+20



# Renewable and clean energy sources



# Food security



# Food security

- Increase production until 2050 in around 70%.
  - Sustainable practices
  - Reducing food losses (currently 30% of the production).
  - Changing nutritional habits.
  - Addressing limited water and productive soil issues.

# Climate change

- Ample scientific evidence that extreme events are becoming more frequent and severe, worldwide
- Paris Agreement
  - 188 countries submitted Intended Nationally Determined Contributions (by March 2016)
  - 94% included agriculture
  - 80% included water
  - 55% included water scarcity (more than 100 countries)



## Sustainable Development Goals



Food and Agriculture Organization of the United Nations

FAO and the 17 Sustainable Development Goals

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**Key FAO messages:**

- The Sustainable Development Goals offer a vision of a fairer, more prosperous, peaceful and sustainable world in which no one is left behind.
- In food - the way it is grown, produced, consumed, traded, transported, stored and marketed - lies the fundamental connection between people and the planet, and the path to inclusive and sustainable economic growth.
- Without rapid progress in reducing and eliminating hunger and malnutrition by 2030, the full range of Sustainable Development Goals cannot be achieved. At the same time, reaching the other SDGs will pave the way for ending hunger and extreme poverty. We can advance faster if we work together.
- The battle to end hunger and poverty must be principally fought in rural areas, which is where almost 80 percent of the world's hungry and poor live. To do this, we need to show a strong political will while also investing in the critical agents of change - smallholders, family farmers, rural women, fisher folk, indigenous communities, youth and other vulnerable or marginalized people.
- It is possible to eradicate hunger by 2030. This requires a combination of pro-poor investments in sustainable agriculture and rural development and social protection measures to immediately lift people out of chronic undernourishment and poverty.
- There are more people to feed with less water, farmland and biodiversity. But the world produces enough food for all. We need to transform our current input-heavy food systems to make them more sustainable - including reducing food waste and loss - through better management and improved techniques in agriculture, livestock, fisheries and forestry. Agriculture also has a major role to play in combating desertification and other negative impacts of climate change.
- With its expertise and resources, FAO is well positioned to support countries in achieving the Sustainable Development Goals, most of which are related to FAO's work. We cannot afford to miss the opportunity of becoming the Generation Zero Hunger.

# LEAVE NO ONE BEHIND



# Water scarcity and the Agenda 2030

“Water is a precious resource, crucial to realizing the Sustainable Development Goals, which at their heart aim to eradicate poverty”

*Ban Ki-moon, UN Secretary General*



## Goal 6: Ensure access to water and sanitation for all

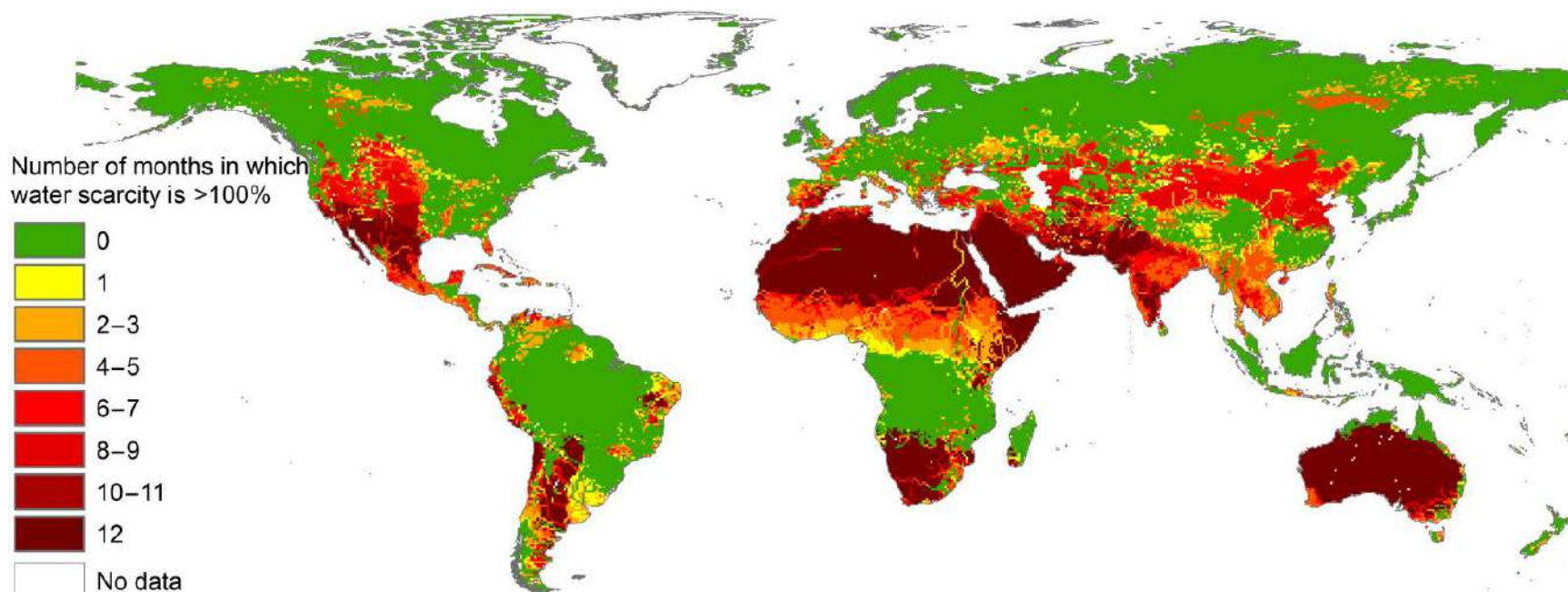
- By 2030, substantially **increase water-use efficiency** across all sectors and ensure sustainable withdrawals and supply of freshwater to address water scarcity and substantially **reduce the number of people suffering from water scarcity**
- By 2030, implement **integrated water resources management** at all levels, including through transboundary cooperation as appropriate
- By 2020, **protect and restore water-related ecosystems**, including mountains, forests, wetlands, rivers, aquifers and lakes

# Global risks (WEF 2015 report)

Top 10 risks in terms of Likelihood	Top 10 risks in terms of Impact
<ul style="list-style-type: none"><li>1-Interstate conflict</li><li>2-Extreme weather events</li><li>3-Failure of national governance</li><li>4-State collapse or crisis</li><li>5-Unemployment or underemployment</li><li>6-Natural catastrophes</li><li>7-Failure of climate-change adaptation</li><li>8-Water crises</li><li>9-Data fraud or theft</li><li>10-Cyber attacks</li></ul>	<ul style="list-style-type: none"><li>1-Water crises</li><li>2-Weapons of mass destruction</li><li>3-Interstate conflict</li><li>4-Energy price shock</li><li>5-Failure of climate-change adaptation</li><li>6-Fiscal crises</li><li>7-Unemployment or underemployment</li><li>8-Biodiversity loss and ecosystem collapse</li><li>9-Spread of infectious diseases</li><li>10-Critical information infrastructure breakdown</li></ul>

# Water Scarcity: a global issue

**4 billion people (66% of all people) lives under severe water scarcity at least 1 month of the year. It affects all regions of the world**



Source: Mekonnen & Hoekstra, Univ. Twente, Feb 2016



# Water in agriculture: the entry point for adaptation to climate change



# Challenges of agricultural sectors

- Main user of water resources (70% of global water withdrawals)
- Need to increase and improve food production to cope with growing population and changing food habits
- Cause and casualty of climate change
  - Mitigation and Adaptation measures required





### Why Water Scarcity

- Among top priorities in “FAO’s Regional Priority Framework for Near East”
- Approaches water resource management within context of agriculture and food security:
  - Around 90% of water use allocated to agriculture
  - Food security is a major regional priority; FAO’s concern

### Innovations, Principles

- \_ Focus on regional priorities
- \_ Integration, multi-disciplinary approach
- \_ Joint work by Decentralized Offices and HQ
- \_ Enhanced collaboration between countries
- \_ Partnership



# FAO will launch at COP 22 a **Global Framework for Action**

## How people is affected?

- Physical water scarcity
- Economic water scarcity
- Institutional water scarcity

## How to act?

- Country-focused
- Knowledge management and information sharing
- Promoting investment and innovation



## Opportunities

- 2030 Agenda
- Integrated approaches (Nexus)
- Paris Agreement
- Financial resources (GCF, GEF, etc)
- Innovation

## Triple A

## Tools

- National and local capacity development
- Transformational projects
- Joint action and collaborative efforts



# ***FAO's Global Framework and the Triple A***

- Triple A: transformational for African agriculture
- Global framework: global coverage based on regional approaches

>>> In Africa, FAO's new initiative on “*Copying with water scarcity in agriculture: a Global framework for action*” intends to become a major support for the AAA pillar on agriculture water management



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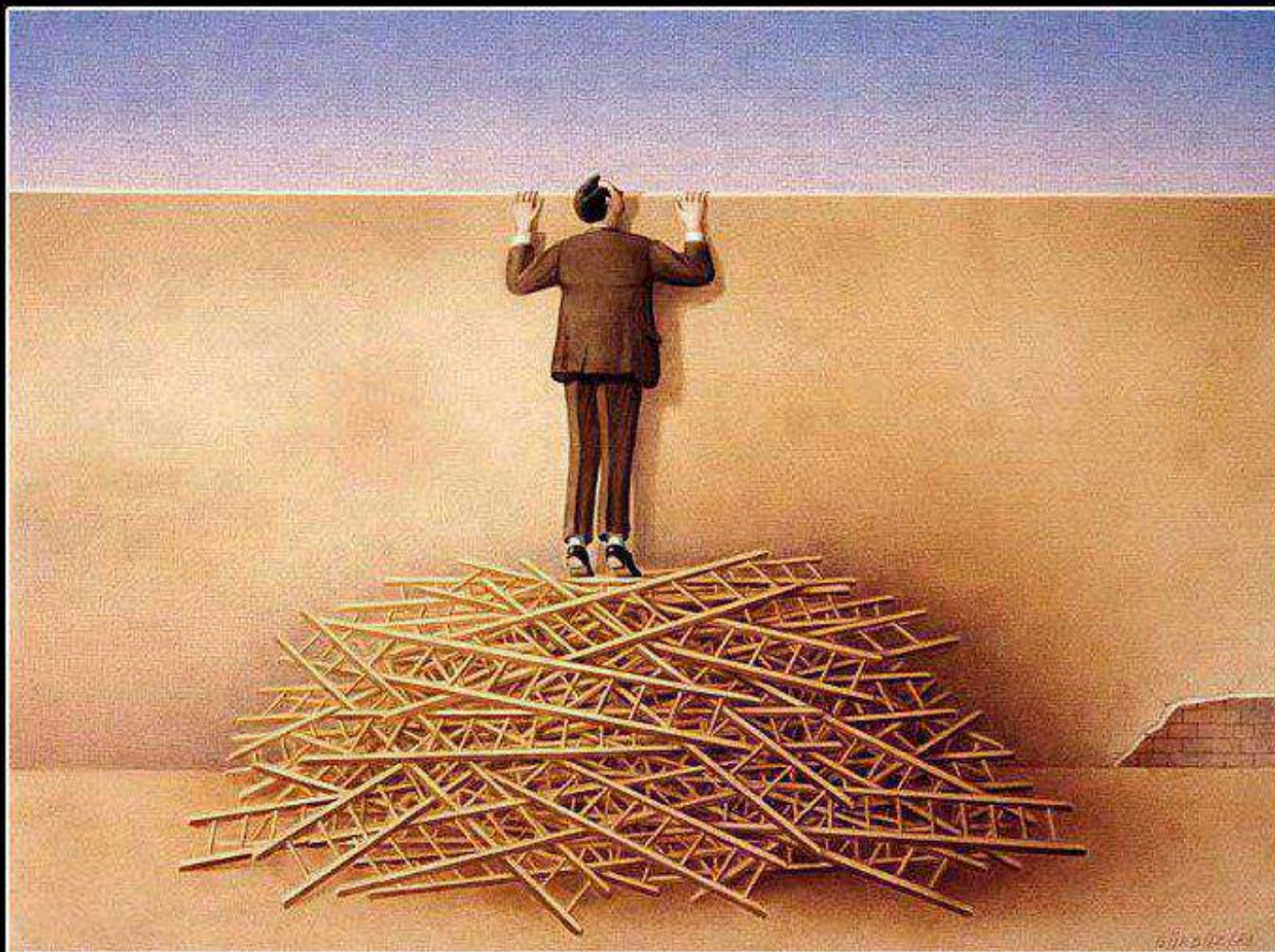
# How?

- A people-centred approach to water resources management that seeks to capitalize on the dynamic linkages in the landscape between human and natural systems





It doesn't matter how many "resources" you have.



If you don't know how to use them,  
it will never be enough.

# What FAO brings?

- i. **Global mandate** to support member countries develop sustainable agriculture to eradicate hunger and poverty, and promote the sustainable use of natural resources
- ii. **Global presence** (offices in more than 80 countries)
- iii. **Global network** and good calling capacity
- iv. **Technical** capacity
- v. Good **science-policy-practice** interface

# What can you bring?



**A Knowledge Group**

**An Investment Group**

**A Steering Group**

**The Water  
Platform**

# To know more:

- [http://www.fao.org/nr/water/topics\\_scarcity\\_framework.html](http://www.fao.org/nr/water/topics_scarcity_framework.html)

## Flyer:

- <http://www.fao.org/3/a-i5604e.pdf>

## Email

- [Water-scarcity@fao.org](mailto:Water-scarcity@fao.org)



# Thank you!



Food and Agriculture Organization of the United Nations – *for a world without hunger*