



Food and Agriculture Organization  
of the United Nations

## Technical Briefing

### “The water-food nexus: Tackling water scarcity in the context of sustainable development”

25 January 2017, 12.00-1.00 pm

Conference Room 8, UN Headquarters

#### Concept Note

### Introduction

The technical briefing on “The water-food nexus: tackling water scarcity in the context of sustainable development” will discuss how countries can address the dilemma of food production under limited water availability. The event will present the FAO Near East and North Africa (NENA) Water Scarcity Initiative, that provides a comprehensive framework to support Member States in their efforts to ensure food security and the sustainable use and preservation of scarce water resources while progressing towards sustainable development. While the briefing focuses on the experience of Western Asia and North Africa, findings are applicable and relevant for all countries facing water scarcity and will provide an opportunity to share experiences and showcase examples from other regions as well.

### Global context

Food and agriculture lie at the heart of the 2030 Agenda for Sustainable Development. Implementing sustainable agriculture is central to the achievement of most Sustainable Development Goals (SDGs), including, for example, SDG 2 on ending hunger, achieving food security and improving nutrition and promoting sustainable agriculture; SDG1 on poverty; SDG6 on water for all, SDG 13 on climate change and SDGs 14 and 15 on preserving, restoring and promoting the sustainable use of ocean and land resources.

An innovative approach to food and agriculture is needed to achieve the SDGs, taking into account trade-offs and synergies across sectors and across the economic, social and environmental dimensions. FAO has recently developed a *common vision for sustainable food and agriculture*, which proposes policy dialogue and governance arrangements and helps identify sustainable development pathways across the SDGs, across different sectors and along related value chains.

The water-food nexus is a case in point: there is an inextricable link between food production and water consumption, which too often is not captured in sectoral policies. Countries with limited natural resources, in particular freshwater, usually face greater challenges in ensuring the food security of its population and need to resort in greater share on food imports.

### Agriculture and water scarcity in Western Asia and Northern Africa today

Western Asia and Northern African countries are among the most water-scarce in the world. Medium and longer-term outlooks indicate that, in the coming decades, they will face a severe intensification of

water scarcity due to several drivers, including climate change resulting in more frequent, intense, and prolonged droughts; demographic growth; expanding urbanization; a quest to increase food self-sufficiency; higher energy demand; and overall socio-economic development. Food insecurity, the widening divide between availability and demand of fresh water, the accelerated degradation and depletion of groundwater resources and the impact of climate change also act as threat multipliers in an already fragile region.

Agriculture is a vital sector in Western Asia and Northern Africa, from both an economic and social viewpoint. It contributes on average nearly 15% of the gross domestic product (GDP), excluding oil rich countries, and provides jobs and incomes for close to 40% of the economically active population. Investing in a more inclusive and sustainable agriculture is therefore critical to food security, enhanced livelihoods, decent employment, sustainable development and peace and stability in the region.

At the same time, agriculture is by far the largest freshwater user and consumer of all sectors of the society, with an average 85% withdrawal, facing strong competition with other water users. Agriculture, therefore, faces the challenge to improve its performance in terms of resource efficiency while contributing to food security and nutrition and the rural economy. Simply boosting efficiencies and productivity of the water use and other resources alone will not suffice. Structural changes in how water is used in agriculture will be required.

### **FAO Regional Water Scarcity Initiative**

The FAO Regional Water Scarcity Initiative was formulated in response to the request of the FAO Regional Conference for the Near East and North Africa that identified the issue as a central priority of Member States. The initiative supports countries of the NENA Region to cope with some of their most striking challenges: the pursuit of food and water securities for a sustainable social and economic development under an unprecedented severe escalation of water scarcity. The Water Scarcity Initiative, which falls under FAO's Strategic Programme for sustainable food production, aims at identifying critical areas that require actions, assist in the formulation of a regional collaborative strategy and build broad partnerships to support its implementation.