Climate Change and Water Resources in Morocco: Challenges and Innovative Solutions

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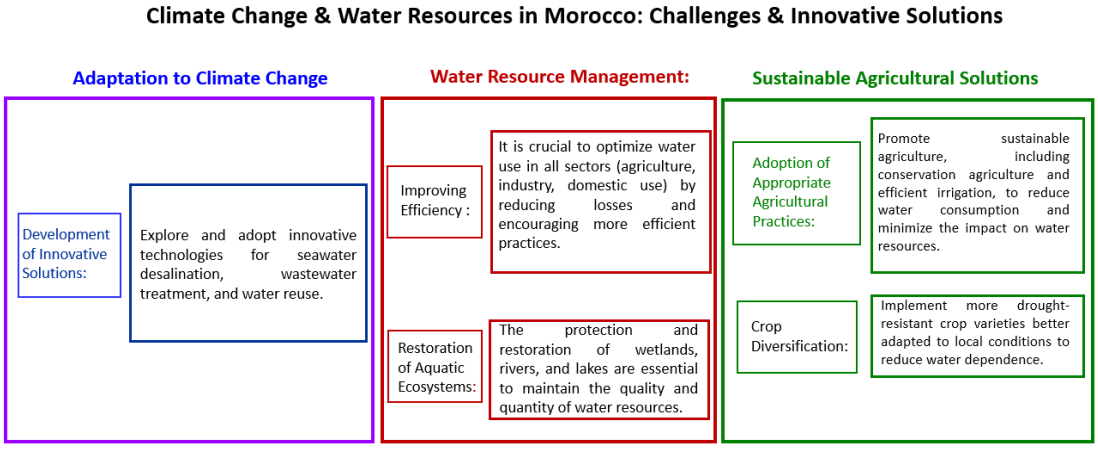
Thematic Area: Water resources & sustainable environment

Abstract

Water scarcity, particularly exacerbated by climate change, represents a major challenge for North Africa, particularly Morocco, where groundwater resources are threatened. Projected decreases in rainfall are exacerbating this situation, affecting agriculture, a vital sector heavily dependent on irrigation due to the low productivity of rain-fed crops. This crisis has prompted researchers, policymakers, and authorities to take significant steps to address this problem. An integrated approach involving water resource management, the development of sustainable agricultural solutions, and the implementation of climate change adaptation strategies will be necessary. Implementing this approach will have a significant impact on improving the resilience of the water sector to the effects of climate change. This presentation will discuss and develop innovative adaptation and mitigation solutions to reduce the effects of climate change on water resources. Innovative solutions, such as desalination, wastewater reuse, and efficient irrigation technologies, will be presented, which can be implemented to ensure sustainable water management. A diagram outlining the main approaches in each area will be presented:



By adopting this integrated approach, it is possible to address the challenges of water scarcity and build a more resilient future in the face of climate change. Regional and international cooperation is also essential to share knowledge and best practices in water management.

Keywords: water resources, climate change, agriculture, innovative solutions, Morocco