

WORLD SUSTAINABLE DEVELOPMENT SUMMIT

BEYOND 2015: PEOPLE, PLANET & PROGRESS





Climate-Resilient Agriculture

October 5, 2016 | 1000-1200 hours Venue: Jacaranda, India Habitat Centre

Agriculture is highly vulnerable to climate change. Insufficient / excessive rain fall; hot or cold spells; little too early or late availability of water; days with extreme climate; etc. can have catastrophic effects on crop and livestock production. Rising concentration in the CO_2 due to climate change could perhaps help in increasing yields in some regions, but will likely be swamped by the indirect impact of changing climate disturbance, resulting in potential devastating impact on the quantity and quality of produce.

The IPCC's Fourth Assessment Report (AR4) predicted that parts of the sub-tropics could experience deteriorating conditions for food production. Crop yields across almost all regions would decline by 5 – 47%. Regions with high population density and where food security remains a concern will likely be impacted the most. South Asia is projected to be among the worst hit regions of the world.

Agriculture is estimated to be among the highest sources of GHG emissions. It is also potentially the largest part of the solution to the problem. Technologies and practices that are environmentally friendly hold the promise of the "triple-win" – increased productivity, adaptation and mitigation. Germplasm which tolerates fluctuating temperatures, water stress and water logging; balanced and improved practices in the use of fertilizers, high-efficiency irrigation, conservation agriculture, precision agriculture; etc. are some of the options now available to make agriculture more climate smart.

This session will focus on issues related to climate change and strategies to mitigate the impact of climate change on agriculture. It brings together experts and practitioners to discuss the urgency for action, as well as potential options to make agriculture more climate resilient.