

UPR-Led Climate Research Empowering Government Initiatives

To take the first steps in response to climate change warnings, local and regional governments are informed about the research being conducted by the various departments at University of Poonch Rawalakot (UPR). To improve governmental efforts in addressing climate change challenges, the UPR has shared information with the Environmental Protection Agency and forwarded recommendations from the 7th International Conference to the government.

**Recommendations of the 7th International Science Conference on
“Climate Smart Agriculture: Innovations and Adaptation”
15-17 June 2021**

Conference Recommendation Formulation Committee

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Going through the course of proceedings it is felt very strongly that there is a dire need of a paradigm shift in agriculture, because the community is feeling threatened due to unprecedented changes in the environment which is directly undermining our food security. To make this shift, a practical reality, the following recommendations are being made:

No.	Recommendations
1	Import of germplasm of fruits and crops which can withstand high temperature and water stress conditions.
2	A project be initiated to collect and improve the local germplasm of major and minor fruits and other crops which require less water.
3	The sewage water be channelized and used for irrigation purposes after treatment as heavy metals and toxins are being observed in the fruits and vegetables. Wet land technologies should be introduced for clean water.
4	Rooftop rainwater harvesting system should be installed in the houses and water should be used in kitchen gardening.
5	Water saving technologies like ridge sowing, drip irrigation and LASER leveling should be used to save the irrigation water.
6	Light irrigation should be applied as per requirement of the crop through sprinkle irrigation. At the moment, sprinkle irrigation equipment is very expensive. Therefore, it is recommended that local sprinkle irrigation system should be developed.
7	Forest department should devise a system to avoid forest fires In AJK. In addition, biodiversity resources other than trees should be explored and mapped.
8	Soil microorganisms and organic matter should be added to increase the water use efficiency. Technologies like biofertilizers and effective micro-organisms may be promoted.

9	There is a great need of mitigating climate change by adopting conservation agriculture to enhance carbon sequestration.
10	Organic farming and biocontrol agents for the control of diseases, insect pests should be promoted on commercial scale to reduce environmental impact.
11	In AJK, construction of mini dams, water storage reservoirs and small community lakes should be encouraged to utilize the water in scarce periods. Government should provide subsidy for this purpose.
12	Breeding work for drought tolerance and water efficient crops plant should be conducted.
13	In AJK, economical machinery for small farmers right from sowing to harvesting should be provided on subsidized rates.
14	In AJK, the cropping area should be mapped based on microclimatic conditions and conventional and non-conventional crops should be recommended for cultivation including legumes.
15	Awareness champaigns should be launched to save water in the household as well as for agriculture purpose.
16	Research activities may be carried out as per need of the industry.
17	Fruit farming, its preservation and commercialization may be encouraged.
18	A course may be included as outreach activity by research scholars.

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