

Pakistan Water Crisis :-

Management & conservation strategies

1. Introduction.

Thesis statement: Pakistan's water crisis is not merely the result of natural disasters but a consequence of chronic mismanagement and man-made disasters such as negligence of proper water planning, ineffectiveness, lack of water storing bodies etc. Shifting national water policies from short-term to long-term ~~the~~ planning through proper ~~and~~ equitable management and innovation, will help Pakistan to ensure water security.

2. Pakistan's Water resources including Indus river system, glaciers, ground water, limited storage and Indus Water Treaty.

3. Current state of water crisis ; Decline in per capita water availability from 5600 to below 900 cubic meters.

1. Major Causes of water crisis

4.1. Environmental factors highly contribute in water shortage in Pakistan. These factors include climate change, glacier melt, increase in global sea level and frequent

in falls.

- 4.2. Another major cause of water insecurity is institutional failure. The inappropriate water policies, lack of coordination and poor governance make the situation worst.
- 4.3. Agricultural mismanagement, outdated irrigation system and water intensive crops also contributes well in water shortage and security.
- 4.4. Rapid urbanization also has an important role in country's poor water index.
- 4.5. Another main reason of water crisis is negligence of policy. Delay in dam construction and inadequate water pricing system is also very alarming.

5. Consequences of the crisis

- 5.1 Water-crisis has a strong impact on agriculture, food insecurity and energy production.
- 5.2 Rural displacement, health issues and provincial water disputes has potential to bring a social instability.

5.3 Eutrophication, desertification, droughts, floods, and biodiversity loss have a potential to impact the country's environment.

6. Management and Conservation strategies

- 6.1. Revision and enforcement of National water policy (2018) .
- 6.2. Establish a national water council and provincial coordination.
- 6.3. Construction of small and large dams including Diaman ~~and~~ Basha . and Mohmand can help to store water.
- 6.4. By promoting sustainable development of irrigation system and drip canal system help alot to save water for future.
- 6.5. Glacier monitoring and watershed management supports the water saving for future survival.
- 6.6. There is a strong need community involvement to increase water index of Pakistan. Local water association , NGO-led ^{comm} awareness campaigns and traditional methods help in this crisis.

6.7. ~~Reuse~~^{Reuse} water and by adapting singapore's water recycling can ensure the minimum wastage of water.

6.8. Techonolgy and data can be used for informed decision making and policies in order to save Pakistan from further ^{water} insecurity.

7. Conclusion.