



ENVIRONMENTAL HEALTH & BIODIVERSITY

Effects of rest duration and rainfall variability on vegetation dynamics in arid rangeland of Tunisia

- Long term resting (exclusion of grazing) can be detrimental to rangeland health
- Arid rangeland are resilient to climate variability
- Rational grazing requires skillful decisions and close monitoring of its consequences



RESEARCH
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LIVESTOCK & ENVIRONMENT

Mounir Louhaichi, ICARDA
m.louhaichi@cgiar.org

Co- Authors:

Mouldi Gamoun, ICARDA
Azaiez O. Belgacem, ICARDA

A panoramic view of arid rangelands of Southern Tunisia after excluding grazing for one year

Context

- Steady rangeland degradation presents a serious concern for the livelihoods of pastoral and agro-pastoral communities.
- Rangeland resting (protection from grazing) offers a cost-effective way to preserve and maintain the productivity of arid rangelands.

Our innovative approach

- We assessed rangeland resources based on social and biophysical characteristics of each target site (plant community, soil type, land tenure, etc.).
- We facilitated participatory rangeland restoration involving local pastoral communities, governmental agencies, research institutions and local authorities.
- We shared scientific results, knowledge, and experiences among the various actors to build trust and guarantee long term sustainability.

Outcomes

- Spatial and temporal variability across landscape (watershed) should be taken into account during planning phases.
- Though grazing should be controlled, it should also be flexible and opportunistic to take advantage of any available seasonal grazable biomass.

Future steps

- Develop a management strategy for rangeland resources to cope with climate change and to enhance the resilience of the pastoral communities relying on arid rangelands.
- Give appropriate alternative recommendations to rangeland owners who want to enhance livestock production and their environments.
- Adopt flexible and participatory approaches to rangeland management procedures, applicable to communal/state rangelands.
- These procedures require effective use indicator(s) and must follow specific management processes approved by the OEP.

Partners in Tunisia

- Institute of Arid Lands (IRA)
- Office of Livestock and Pastures (OEP)
- Direction Générale des Forêts (DGF)
- IFAD project (PRODESUD)



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