Leveraging the Potential of Livestock for Dryland Development: Why a Paradigm Shift Is Needed

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Introduction

**LPP** is an advocacy and technical support organisation for pastoralism and sustainable livestock development, based in Germany

[www.pastoralpeoples.org](http://www.pastoralpeoples.org)

**LIFE-Network** for community-based conservation of indigenous livestock breeds, advocating for „Livestock Keepers‘ Rights“

**Drynet** is a group of 14 CSOs in four continents working on land degradation in drylands

Fourteen civil society organisations

[www.dry-net.org](http://www.dry-net.org)
“The main wealth of the desert lands of the west and north consists in the vast herds of camels, horned cattle, and sheep which roam over the sandy wastes and thrive admirably in the dry climate”.

Imperial Gazetteer of Rajasthan, 1908
The famous livestock breeds are linked to pastoralist communities, such as the Raika...
....and are the product of traditional knowledge and institutions.
Social breeding mechanisms

Socially embedded customs influencing the gene pool

- Taboos on selling female animals outside community
- Rules for passing on animals from one generation to next
- Sharing mechanisms
“Nauguna”
9 selection criteria used by Raika sheep breeders

- Wool production
- Milk production
- Good pedigree, true to breed
- Mothering abilities
- Height
- Good walker
- Fast growth rate
- Drought and famine resistant
- Beauty
- High birth weight
- Ability to endure and withstand pain
Traditional village based breeding institutions

Chappa
Gual
Godda
Pardha
Camel Husbandry in the Thar Desert: An ingenious, indigenous land-use system

Camels range freely for much of the year; herded only during rainy season and breeding season. Camel movements not predictable, depend on availability and location of rainfall.
Movement of camels tracked and controlled through natural behavioural patterns, branding system, and mutual information and help. During most of the year camels depend on orans and trees, in rainy season they go for grass.
Camels utilise a wide variety of scattered and seasonally variable tree and grass vegetation.
The strengths of indigenous livestock and traditional management systems

1. Local breeds make optimal use of the local vegetation, due to long co-evolution
2. Animals lower their metabolic rate and thus withstand fodder scarcity.
3. Vegetation rapidly recovers after „over-grazing“ or is even stimulated by grazing

Under these circumstances it makes no sense to calculate carrying capacity and optimal rations – both plants and animals are adapted to pressure and scarcities
Comparative advantages of livestock keeping in Rajasthan

- Best adaptation to climate change
- Groundwater resources are depleted
- Demand for meat and milk is exploding
- Urban middle class likely willing to pay a premium for products that are perceived as healthy or have a regional flavour
Camel milk: white gold of the desert

- Medicinal properties
- Especially valuable for Diabetes patients
Camel milk makes good ice cream
Desert Health Food...
Camel Milk Ice Cream
It can be used for making camel milk soap
Camel dung can be processed into highly biodiverse paper: containing 36 species!
Camel wool is currently not marketed, although it was traditionally used for various products.
Camel wool also has potential
Camel leather

“Camel leather” items are attractive to tourists, but currently almost none of them are genuine. Trademark for genuine camel leather needed!
The possibilities for products are endless!
Camel demand up as oil price soars
By Jo Johnson in New Delhi

FARMERS IN THE INDIAN STATE OF RAJASTHAN ARE REDISCORVERING THE HUMBLE CAMEL.

AS THE COST OF RUNNING GAS-GUZZLING TRACTORS SOARS, EVEN-TOED UNGULATES ARE MAKING A COMEBACK, RAISING HOPES THAT A FALL IN THE POPULATION OF THE DESERT STATE'S SIGNATURE ANIMAL CAN BE REVERSED
Current Livestock Policy

- Emphasizes performance enhancement through cross-breeding with exotics and by means of Artificial Insemination
- Ignores the linkage between livestock and access to grazing resources (Responsibility of another department)
- Attaches no value to traditional production systems, regarding them as backward.
What we need instead:

• Appreciate the locally developed animal genetic resources
• Rescue the traditional knowledge systems and institutions that have nurtured them
• Protect and reserve livestock grazing areas
• Support livestock keepers to realise the potential for value addition through niche-marketing and specialty products (examples: range-fed mutton, „Jaisalmeri mutton“) by building up value chains.
• Support livestock keepers organisations and give them a voice in policy making
• Upgrade the status of livestock keeping
Some promising initiatives: Banni Buffalo Breeders Association
Policy Neglect of pastoralists

- No recognition of their role („backwards“)
- Lack of pastures (due to encroachment, population pressure)
- Socially marginalised
- No linkages to the market
- No access to services
Livestock Keepers‘ Rights

- Principle 1: Recognition of livestock keepers as creators of breeds and custodians of AnGRFA
- Principle 2: Recognition of the dependency of the sustainable use of traditional breeds on the conservation of their respective eco-systems
- Principle 3: Recognition of traditional breeds as collective property, products of indigenous knowledge and cultural expression.
- Right 1: The right of the livestock keepers to make breeding decisions
- Right 2: Right of livestock keepers to participate in policy making processes on AnGRFA issues
- Right 3: Support for training and capacity-building of livestock keepers and provision of services along the food chain.
- Right 4: Right to be involved in setting research priorities and to be consulted (prior informed consent).
- Right 5: Right to information about all issues concerning their breeds
Raika pastoralists have taken the lead in lobbying for Livestock Keepers‘ Rights in international processes, such as the Global Plan of Action for Animal Genetic Resources and the Convention on Biological Diversity.
A new tool: Biocultural Protocols

- Biocultural Protocols document the role of a community in conserving AnGr and eco-systems.
- Are the product of a facilitated process in which communities reflect how they want to handle access to their knowledge and genetic resources.
- Are an extremely empowering experience.
- Provide a legal tool for access to grazing resources.
Handing over the Protocol to the Chairman of the National Biodiversity Authority
The Thar Desert is the home of unique animal cultures that have deep knowledge about balancing people, animals, and the eco-system.

Let's nurture and add value to them instead of ignoring and obliterating them!
Thank you!