



CAMEL BREEDING MANAGEMENT AMONG THE SOMALI, SAKUYE, GABBRA AND RENDILLE PASTORALISTS OF NORTHERN KENYA

I. Tura^a, S.G. Kuria^b, H. K. Walaga^c, and Joseph Lesuper^d

^aKenya Agricultural Research Institute - Garissa Research Centre P.O. Box 230- 70100 Garissa, Kenya.

^{bcd} Kenya Agricultural Research Institute - Marsabit Research Centre P.O. Box 147- 60500 Marsabit, Kenya.

Introduction

- Camels are key livestock species in pastoral production systems in the arid and semi-arid areas of Kenya.
- Camels are important for food security and transport.
- Over 90% of camels in Kenya are owned and managed by pastoralists. Camel keeping has been adopted by traditional cattle keepers after realizing their value thus a high demand for camels.
- Pastoral camel keepers are concerned over their declining performance.

Methodology

- A survey was conducted in Turbi, Merille, Thambas and Dabel to gather data on breeds of camels kept, age bulls and heifers attain reproductive maturity, number and sources of breeding bulls, age of retiring breeding bulls, how to discourage inbreeding.
- A semi-structured questionnaire was used to gather the data from 240 respondents across the four study communities. Systematic random sampling was used to identify the respondents. Data were analyzed using SPSS version 12.

Results

- The dominant breeds kept by Sakuye and Somali communities are Somali-breed while Gabbra and Rendille mainly kept their own breeds (Table 1).
- Gabbra heifers and bulls attained reproductive maturity earliest followed by the Sakuye, Somali and Rendille (Table 2).
- Breeding bulls range from one to four in herds and are sourced within own herds and those of neighbours (Table 3 & 4).
- Sakuye retire their bulls earlier among the study communities (Table 5).
- Bulls are restrained traditionally from mating mothers but not siblings and offspring (Table 6 & 7).

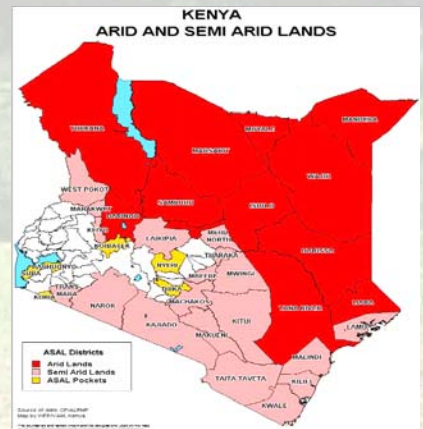


Table 1: Breeds of camels kept

Breeds of camel kept	Ethnicity			
	Somali (n=80)	Rendille (n=80)	Gabbra (n=80)	Sakuye (n=80)
Somali (%)	96.6	40.8	5.9	93.2
Gabbra/Rendille (%)	3.4	55.1	94.1	4.1
Gabbra/Rendille and Somali crosses (%)	0	0	0	2.7
Turkana (%)	0	4.1	0	0

Table 2: Age heifer reaches reproductive maturity

Ethnicity	Heifer Reproductive Maturity		Bull Reproductive Maturity	
	Mean	Std. dev.	Mean	Std. dev.
	Gabbra (n=80)	3.94	0.43	4.18
Sakuye (n=80)	4.11	1.01	5.68	1.79
Somali (n=80)	4.46	1.70	5.85	1.76
Rendille (n=80)	4.70	0.45	5.84	0.80

Table 3: Number of breeding bulls in a herd

Breeding bulls in own herd	Somali (%) (n=80)	Rendille (%) (n=80)	Gabbra (%) (n=80)	Sakuye (%) (n=80)
One	82.8	77.5	82.3	93.3
Two	12.9	22.5	11.8	4.1
Three	3.9	0	0	1.3
Four	0.4	0	0	1.3
None	0	0	5.9	0

Table 4: Source of breeding bulls for the past 25 years

Source of breeding bull	Somali (%) (n=80)	Rendille (%) (n=80)	Gabbra (%) (n=80)	Sakuye (%) (n=80)
Own herd	67.9	43.2	60.1	44.7
Own herd and neighbors	29.1	52.3	32.5	39.6
Within the community but far region	1.7	2.3	5.9	11.8
Outside own community/clan	1.3	2.2	1.5	3.9

Table 5: Age of retiring camel breeding bull

Do you retire camel breeding bull	mean	S.dev.
Somali (n=80)	18.86	4.36
Rendille (n=80)	15.31	2.37
Gabbra (n=80)	16.0	1.41
Sakuye (n=80)	14.75	3.73

Table 6: Restraining bull to mate its mother

Bull mating mother	Somali (%) (n=80)	Rendille (%) (n=80)	Gabbra (%) (n=80)	Sakuye (%) (n=80)
	Yes	31.9	66.7	82.2
No	68.1	33.3	11.8	54.5

Table 7: Bulls mating with siblings and offspring

Bull mating offspring and siblings	Somali (%) (n=80)	Rendille (%) (n=80)	Gabbra (%) (n=80)	Sakuye (%) (n=80)
	Yes	19.9	6.3	2.7
No	80.1	93.8	97.3	92.2

Conclusion

The study concluded that the Somali camel is the preferred breed of camel. To prevent inbreeding, the study recommends timely swooping of bulls and sourcing for bulls from distant areas and retiring bulls at age of 10 years to prevent them mating their offspring.

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