

Abstract:

A study using participatory epidemiology (PE) methodologies was conducted in West Pokot and Baringo districts, Northern Rift Valley, Kenya to assess the status of East Coast Fever (ECF) and obtain livestock keepers' perceptions of how the disease impacts on livelihoods in pastoral and agro-pastoral production systems. The PE methods used included; scoring and ranking, proportional piling and disease impact matrix scoring alongside key informant interviews. Semi structured interviews were used for probing and clarification of results from the exercises. A total of 658 livestock keepers participated in meetings held in twenty two purposively selected locations each in West Pokot and Baringo districts. Results from the study showed cattle, goats, sheep and poultry were the main types of animals reared in that order of preference. Donkeys and camels were ranked fifth and sixth respectively. Nearly all the households in both communities depended on cattle keeping as the major source of livelihood and the activity was ranked as priority enterprise by 96.2% and 93.3 of the groups in West Pokot and Baringo district respectively. Cattle diseases were identified as the main constraint affecting production and in particular, ECF and trypanosomosis were reported as the most important compared to other diseases. The informants were relatively consistent in estimating the impact of diseases on cattle derived benefits. There was good agreement among informants in various groups with Kendalls' coefficient of concordance (W) values ranging between 0.43 and 0.60 ($p < 0.05$ – $p < 0.01$). East Coast fever was found to have the greatest impact. Based on the findings from this study, there is need for stakeholders in the livestock industry to develop control strategies that are supportive to the production systems.