

Camel husbandry management and reproductive performance in tropics

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Abstract

This study offers an evaluation of camel reproductive performance from more than one hundred studies ($n = 119$) focused on dromedary camel (*Camelus dromedarius*) husbandry and breeding practices in the typical camel husbandry regions. The results showed that the mean \pm SD age of puberty of males and females, age at first service, age at first calving, calving interval and pregnancy length was 50.74 ± 12.78 , 42.55 ± 8.73 , 49.15 ± 9.49 , 61.57 ± 8.69 , 24.99 ± 7.37 and 12.44 ± 0.27 months, respectively. The latest age at first service (54.71 ± 6.93 months) was reported in studies from East 4 African region and the latest age at first calving (69.6 ± 0.72 months) from Central Africa. The longest calving interval was reported also in Central Africa (31.8 ± 5.4 months). The average calving rate, abortion rate and calf mortality (mean \pm SD) was 53.54 ± 17.12 , 16.79 ± 15.81 and 26.22 ± 17.78 %, respectively. The highest abortion rate (41.45 ± 26.23) and calf mortality (31.38 ± 2.36) was found in South Asia. The mean weaning age from all studies was 11.56 ± 2.44 months. Significance for all methods and tests was set at $p < 0.05$. The calf mortality and abortion rate were moderately and strongly correlated with rainfall, the higher rainfall was in the area the higher were these parameters, but these correlations were not significant ($p = 0.0556$, $p = 0.1921$, respectively). The significantly later age of male puberty ($p = 0.019$) was found in areas with higher temperature. There were no significant correlations of any other climate conditions with other reproductive parameters in this analysis.

Biography

Jana Maresova is a PhD student at the Czech University of life sciences Prague. She got her master degree from the reproductive biotechnologies. Her main research aim is to determine how various husbandry techniques can influence the reproductive performance of camels and llamas in captivity. Her research also focuses on the occurrence of allosuckling and intersuckling, and its relationship to the management of these species.

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