

# REPRODUCTIVE PERFORMANCE OF JAMNAPARI

IN

## THE INTERMEDIATE ZONE OF SRI LANKA

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By

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## Abstract

This study compares the genetic and non-genetic factors affecting the reproductive performance of Jamnapari goats and compares the reproductive performance of Jamnapari at Imbulanthanda and Nikawaretiya farms. The reproductive performance of Jamnapari kept at Imbulanthanda and Nikawaretiya farms over a period of six years (1997- 2002) were studied. The data for this study was obtained from the history sheets of 79 and 186 does at Imbulanthanda and Nikawaretiya farms, respectively.

Traits studied were birth weight (BW), age at first kidding (AFK), kidding interval (KI) and litter size (LS). The over all least square means for the above traits were  $2.957 \pm 0.446$  kg,  $21.569 \pm 4.172$  months,  $9.975 \pm 2.44$  months,  $1.167 \pm 0.357$  for BW, AFK, KI and LS respectively.

Birth weight was significantly influenced ( $P < 0.01$ ) by farm, month of kidding, year of kidding, sex of kid, type of birth and parity. When data were analyzed separately for both farms a significant impact of month of kidding was observed only at Imbulanthanda farm

Farm difference, month of kidding, year of kidding and year of birth of doe were significantly ( $P < 0.01$ ) affected age at first kidding.

Kidding interval was significantly ( $P < 0.01$ ) influenced by month of kidding, year of kidding and parity. Whereas the influence of sex of kid was not significant.

## Acknowledgements

Parity and year of kidding were significantly ( $P < 0.01$ ) influenced the litter size. While the effect of year of birth of doe on litter size was not significant.

The results from the present study was compared with results obtained elsewhere in the tropics and the report discussed the future breeding and management plans to improve the reproductive performance of Jamnapari goats at Imbulanthanda and Nikawaretiya farm.

I am also greatly indebted to Dr. S. S. Balachandran, Director General, Department of Animal Production and Health, Peradeniya, who gave permission to make all the arrangements to carry out this study at Imbulanthanda and Nikawaretiya goat breeding farms.

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