Study of some of the reproductive parameters of Zanskari mares at high altitudes

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The present study was carried out in cold arid desert area of Ladakh, India at an altitude of 11,500 ft from mean sea level. The region is marked with little precipitation, long winters and short summers. Zanskari ponies, native of Zanskar valley in Ladakh, are one of the six indigenous breeds of India and are very well adapted to the locally prevalent high altitude and cold desert conditions. These ponies are used for riding, playing polo and as pack animals in this area. A total of 82 Zanskari mares were monitored regularly for four years for different reproductive parameters. These mares were maintained under standard feeding and managerial practices. The estrous cycles of all the non-pregnant mares were observed closely and ovarian activity of these mares was monitored per rectum. The Zanskari ponies were found to be somewhat shy breeders with not very apparent and overt estrus signs. The maximum number of mares came in heat during the months of May, June and July. The mean estrous cycle length was 20.76 ± 1.78 days. The length of estrus was 6.24 ± 0.74 days. The duration of estrus was highest during the month of June and was shorter at the beginning and end of breeding season. Foal heat was found to be uncommon (21.28%). There was no incidence of dystocia. However, retention of fetal membranes was found in one mare. The mean gestation length was found to be 336.95 ± 2.56 days ranging from 316 to 355 days. The placenta weight was 2.39 ± 0.02. The breeding season lasted for nine months beginning from the month of February to October.

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