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Abstract

This study was carried out to assess the prevalence of mange in sheep and goats in five local government areas (LGAs) of Ogun State in South Western Nigeria. A total of 4,973 sheep and 7,902 goats of West African Dwarf breeds were sampled of which only 4 (0.08%) of sheep and 42 (0.53%) of goats were confirmed positive for mange infestation. In all the LGAs sampled, Odeda LGA had the highest concentration of sheep (39%) and goats (51%) while Abeokuta South had the least percentage of sheep (1%) and goats (1%). All the mange-infested cases in sheep were recorded in just one LGA (Ewekoro) which constituted 0.24% of the population within the location. For goats, three out of five LGAs namely: Obafemi Owode, Ewekoro and Abeokuta North had prevalence of 1.46%, 0.53% and 0.72% respectively. There was no significant (P > 0.05) difference between non-infested and infested animals in terms of packed cell volume (31.79 ± 0.87% vs. 31.41 ± 1.13%), haemoglobin (10.51 ± 0.21 g/100 ml vs. 10.28 ± 0.37 g/100 ml) and red blood cells (8.71 ± 0.29 × 10¹²/l vs. 9.40 ± 0.37 × 10¹²/l). The infested group however showed significantly (P < 0.01) higher white blood cells count $(7.60 \pm 0.22 \times 10^{9}/I)$ than the non-infested animals $(6.81 \pm 0.17 \times 109/I)$. Neutrophil, eosinophil, basophil and monocyte as well as chloride were not significantly affected by the health status of the animals. There existed significant (P < 0.01) difference between non-infested and infested animals in terms of total protein (5.42 ± 0.16 vs. 4.75 \pm 0.20 g/dl), sodium (137.98 \pm 1.53 vs. 128.92 \pm 1.92 mEq/l) and potassium (4.04 \pm 0.14 vs. 3.46 \pm 0.18 mEq/l). It can be concluded from this study that the prevalence of mange mite infestation varied with location and was generally low or absent in some of the LGAs considered. Goats were particularly more susceptible to mange infestation than sheep. More concerted effort is needed to control mange in order to avoid spread since it is a contagious disease.