World Academy of Science, Engineering and Technology
International Journal of Animal and Veterinary Sciences
Vol:19, No:07, 2025

Prevalence of Hemorrhagic Septicemia in Dromedary Camel (Camelus Dromedarius) For Some Selected Farms in Benadir Region, Somalia

Authors : Abdirahman Barre, Abdihamid Salad Hassan, Iftin Abdi Mohamud, Abdirahman Mohamed Mohamud, Ahmed Adan Mohamed and Mukhtaar Mohamed Idow

Abstract : Pasteurellosis (Hemorrhagic septicemia) is a common respiratory disease of camel that is an acutely fatal disease caused by Pasteurella multocida type A or several serotypes of Mannheimia hemolytic, which also affect other animals. The disease had shown to spread between animals, across herds and to humans. Meaning that the disease is Zoonosis. The study aimed at establishment of sero-prevalence of Pasteurellosis in some selected Districts of camel rearing in the Benadir Region. It was a cross-sectional study, where the study population was purposively chosen to consist of animals taken within three sub-Districts of Benadir Region, namely Sub-District (Daynile Township), Sub-District (Yaaqshid) Sub-District (kaxda). This was because they normally handle many camels in a day, thus making it easy for the investigator to access the required number conveniently; it was also assumed that data collected from these for-slaughter camels was representative of the situation in the sub-District/county. A total of one hundred and sixty camels were tested using four serological tests: Rose Bengal Plate Test (RBPT),) and Complex Fixation Test (CFT). The serological tests were purposively chosen to increase the chances of picking positive cases and also to compare their sensitivities with respect to camel serum since they were originally meant for use on bovine serum. Blood samples (15 ml) were collected for serum harvesting from the jugular veins of the animals as they were waiting to be examined. Rose Bengal plate test and CFT were run at a laboratory within the Department of Veterinary Medicine, University of Horsed, 21 October campus; serum samples having been transported in a cool box. On average, out of an overall total of 300 serum samples tested, 180 samples were selected as sample procedures and were given eleven (11) positive results, amounting to a prevalence of 6.67%. For the three Districts, respective prevalence (averaged from the two (2) serological tests run) were: 7% (3/50) for Yaqshiid; 8% (3/60) for Deyniile and 10% (3/70) for Kaxda. When sensitivities of the two (2) serological tests were compared, there was no significant difference between them with respect to the picking of positive cases (p=0.05). The study has demonstrated presence of Pasterolosis in camels in Benadir Region and the authors are recommending the usage of RBPT and CFT as screening tests, since they are cheap, quick, and easy to carry out. Any of the other three involving tests can then be used if one wants to establish respective titers. Therefore, further detailed investigation needs to be conducted so as to understand specific etiological agents causing pasteurollosis in camel and can be instituted to optimize the benefit obtained from the camel sector.

Keywords : hemorrhagic septicemia, camel, prevalence, Benadir region, Somalia
Conference Title : ICVSLD 2025 : International Conference on Veterinary Sciences and Livestock Diseases
Conference Location : Toronto, Canada
Conference Dates : July 19-20, 2025