PREVALENCE OF *CRYPTOSPORIDIUM* SPP. INFECTION IN DAIRY CALVES IN KHON KAEN PROVINCE, THAILAND

Phennarin Doungmala[1], Patchara Phuektes[2], Weerapol Taweenan[2] and Somboon Sangmaneedet[2]*

[1]Interdisciplinary Veterinary Science, Faculty of Veterinary Medicine, Khon Kaen University, Khon Kaen 40002, Thailand; [2]Department of Pathobiology, Faculty of Veterinary Medicine, Khon Kaen University, Khon Kaen 40002, Thailand

In order to determine the prevalence of *Cryptosporidium* spp. infection in diarrheic and non-diarrheic dairy calves (>1-28 days) in Khon Kaen province during December 2016 to January 2017, fecal specimens from non- (n = 63) and diarrheic (n = 137) dairy calves were collected and examined for the presence of *Cryptosporidium* spp. oocysts by modified Kinyoun's acid-fast staining method. Dairy calves were grouped according to their age as follows (50 per group): group I (>1-7 days), group II (8-14 days), group III (15-21 days), and group IV (22-28 days). The overall prevalence of *Cryptosporidium* spp. infection in dairy calves was 52%, 71% in diarrheic dairy calves, and 9% in non-diarrheic dairy calves. Oocysts of *Cryptosporidium* spp. were detected in 25, 44, 64, and 50% of feces from group I, II, III and IV animals, respectively. The intensity of oocysts was higher in diarrheic compared to non-diarrheic dairy calves. There is a significant association between *Cryptosporidium* spp. infection and occurrence of diarrhea (p <0.05). This study indicates that dairy calves aged up to 4 weeks were highly infected with *Cryptosporidium* spp., and the infection mostly occurred in diarrheic dairy calves.

*Corresponding author: E-mail: sombn_sa@kku.ac.th

One Health Operation Research under THOHUN Research Grants