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EFFECT OF TANNINIPHEROUS PLANTS EXTRACTS ON HATCHABILITY OF *Haemonchus contortus* EGGS

EFEITO DE EXTRATOS DE PLANTAS TANINÍFERAS NA ECLODIBILIDADE DE OVOS DE *Haemonchus contortus*

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Parasites are resistants to the main existing anthelmintic drugs on the market, so tanninipherous plants could be a sustainable alternative against gastrointestinal nematodes. The aim of this work was to evaluate the anthelmintic action of tanninipherous plants extracts on egg hatch assay (EHA) of *Haemonchus contortus* (*H. contortus*). The present research was conducted at the Institute of Animal Science (IZ/APTA/SAA) located in the city of Nova Odessa/São Paulo/Brazil. The leaves of the *Fabaceae Peptadenia colubrina, Leucaena pulverulenta, Stylosanthes guianensis* and *Neonotonia wightii* cv. tinaroo were collected at agrostological field at IZ/APTA/SAA, dried at 35°C and ground. Their actives were extracted with a solution of acetone:water (70:30), followed by washings with dichloromethane and freeze-dried. The percentages of total tannins (TT) and condensed tannins (CT) were calculated and values for TT and CT to *P. colubrina* was 12.7% and 0.89% respectively, followed by *L. pulverulenta* (7,5% and 6,9%), *S. guianensis* (2.4% and 1%) and *N. wightii* cv. tinaroo (1.1% and 0.09%). The extract concentration used to inhibit eggs hatching was 0.012 mg/mL to 50 mg/mL. Data were analyzed by SAS/Probit to determine Lethal Concentration (LC50) with independent variables (dose) transformed by natural logarithms (log-dose). The lowest LC50 was for *P. colubrina* (0.10 mg/mL), followed by *S. guianensis* (4.45 mg/mL), *N. wightii* cv. tinaroo (46.5 mg/mL) and finally *L. pulverulenta,* which did not reach the concentration of LC50. Among the tested plants *P. colubrina* has shown to be more effective in inhibiting the hatchability of *H. contortus* eggs.

Keywords: sheep, tannin, worms.

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