

SPECIFIC PROTEIN POTENCY OF EXCRETORY SECRETORY SECOND STAGE LARVAE *Toxocara cati* IN THE TISSUE AS DIAGNOSTIC TEST SUBSTANCE IN MOUSE WITH ELISA TECHNIQUE

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Abstract

The aim of this research was to determine specific protein potency of excretory secretory second stage larvae in the tissues as diagnostic test substance in Toxocariasis with indirect-ELISA technique. This research used 20 male mouse (*Mus musculus*) were divided into four groups. The first group (P0) was injected by adjuvant as a control. The second (P1) were injected by Excretory Secretory (ES) of second stage larvae *Toxocara cati* in tissue. The third (P2) were injected by the adult worm homogenate of *Ancylostoma sp.* The fourth (P3) were injected by the adult worm homogenate of *Dipylidium caninum*. Injections was done according to sub cutan method. There were two steps of injections, as follow : initiation step with complete Freund's adjuvant (CFA) added to homogenate and the second step was booster immunization that was done two weeks after initiation, with incomplete Freund's adjuvant (IFA) added to homogenate. The booster was done two times with two weeks interval. Serum was taken two weeks after the final booster and utilized as antibody which reacted by specific protein antigen of excretory secretory second stage larvae *T. cati* in the tissues with 20,7 kDa molecular weight in indirect-ELISA technique. The result of ELISA formed as optical density (OD) value than analyzed with Anova Factorial test and continued with Duncan test. The result of research statistically indicate that there was significant differences ($p < 0,05$) between P1 and P0, P2, P3. Specific protein of Excretory Secretory (ES) of second stage larvae *T. cati* in the tissues with 20,7 kDa molecular weight more specific in detected antibody of against-ES of second stage larvae *T. cati* in the tissue.

Key word : Toxocariasis, *Toxocara cati*, *Excretory Secretory*, Second stage larva, ELISA.