

CROSS-SECTIONAL STUDY OF FASCIOSIS IN CATTLE SLAUGHTERED
FROM MAHOGANY MARKET TAGAYTAY, CAVITE

THESIS

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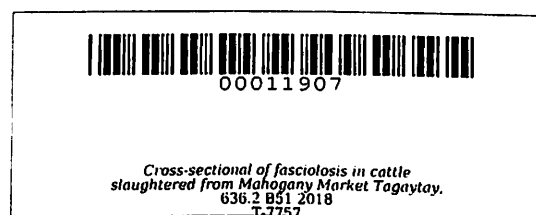
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**CROSS-SECTIONAL STUDY OF FASCIOSIS IN CATTLE SLAUGHTERED
FROM MAHOGANY MARKET TAGAYTAY, CAVITE**

Undergraduate Thesis
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ABSTRACT

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This study was conducted to determine the prevalence of Fasciolosis in cattle slaughtered in Mahogany Market, Tagaytay Cavite using fecal and post-mortem examination of liver. A total of two hundred sixty nine (269) cattle were selected and used for liver inspection and fecal examination. The fecal sample were examined using a standard sedimentation technique.

Results of the study revealed that ninety-five (95) samples have mature flukes upon inspection of the liver and one hundred one (101) were positive from fecal examination with a prevalence rate of 35.3 % and 40.5 %, respectively. All the positive samples according to the cattle's age adult, sex-female, place of origin-Batangas and poor body condition scoring were statistically significant.

In addition, the difference between post-mortem examination through liver inspection and fecal examination through sedimentation technique were not significant. Thus, either the two method can be used in the detection of *Fasciola* species.

Associated risk factors for Fasciolosis were proved to be more prevalent in ruminants with poor body condition scores than medium and good conditioned animals. The level of fasciolosis in cattle represent high rate of infection and tropic immense economic losses to atleast two provinces such as Cavite and Batangas.

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An undergraduate thesis manuscript submitted to the faculty of the College of Veterinary Medicine and Biomedical Sciences, Cavite State University, Indang, Cavite, in partial fulfillment of the requirements for the degree of Doctor of Veterinary Medicine with contribution No. 16. Prepared under the supervision of Dr. Cherry R. Alvarez.

INTRODUCTION

Fasciolosis is a parasitic disease of herbivorous mammals caused by trematodes of the genus *Fasciola* (Nambafu *et al.*, 2015). It is an emerging parasitic infection which impacts significantly on veterinary health, worldwide (Lazara *et al.*, 2010). Two highly infective species are identified as *F. hepatica* and *F. gigantica*. *Fasciola hepatica* survives in a variety of climatic conditions while *Fasciola gigantica* is generally dominant in tropical area of many countries of the world (Urquhart *et al.*, 1988).

Fasciola sp. is commonly recognized as liver flukes and they are responsible for widespread morbidity and mortality in cattle (Karim *et al.*, 2015). These flukes mainly attack the liver, where they reside and feed on mucosa of the bile duct and hepatic parenchyma resulting in the massive tissue damage (Shaikh *et al.*, 2004).

Fasciolosis is a major constraint to agricultural and animal production in most countries located in the wet tropics (Spithill *et al.*, 1999). It causes a significant reduction in meat and milk production, fertility, and draught power in infected animals (Dargie 1987). The prevalence of *Fasciola* infection depends on several risk factors related to the