





Benha University Faculty of Veterinary Medicine Food Hygiene and Control Department

Evaluation Of the quality of Tilapia, Mugil and Claris in farms of Kafr El- Sheikh City

A Thesis Submitted by

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APC	Aerobic Plate Count		
E. coli	Escherichia coli		
EIEC	Enteroinvasive E. coli		
EAEC	Enteroaggregative E. coli		
EPEC	Enteropathogenic E. coli		
НАССР	Hazard Analysis and Critical Control Point		
MPN	Most Probable Number		
MPN/g	Most Probable Number per gram		
рН	Hydrogen ion concentration		
S.E	Standard Error of mean		
SFP	Staphylococcal Food Poisoning		
S. aureus	Staphylococcus aureus		
ТВА	Thiobarbituric acid value		
TVN	Total volatile nitrogen		
ТМА	Tri methyl amine		
T. Niloticus	Tilapia Niloticus		
M. Cephalus	Mugil Cephalus		
C. Grepinus	Clarias Gariepinus		

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Abstract

Title	Evaluation of The Quality Of Tilapia, Mugil and Claris in farms of			
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Abstract				

A total of 90 random fish samples (30 of each) were collected from different farms in Kafr El sheikh city in Egypt. All samples were subjected to bacterial and chemical evaluation for their quality assessment. This Thesis show the incidence of *S.aureus* 33.3%, 30% and 46% respectively, *E.Coli* 36.6%,26.6% and 43.33%, *Salmonella* 33.3%,16.6% and 36.3%, *Aeromonous hydrophila* 80%,76.6% and 90% and *Pseudomonous aeruginosa* 43.3%, 80% and 76.6%.

Results of pH, total volatile nitrogen (TVN) "mg N /100g", Trimethylamine (TMA)" mg /100g", Thiobarbituric acid (TBA)" mg/kg" and Histamine.

According to Permissible limits (E.O.S) in chemical parameters and isolation of bacteria show that high contamination levels of fresh cat fish than others types can be considered as risky factors which may affect human health especially due to detection of coliforms, E. coli, Salmonellae, *Aeromonous hydrophila and Pseudomonous aeruginosa* and Also, it could be concluded that hygienic and proper practices should be performed during transportation and handling of fish. So, adequate cleaning and sanitization of utensils, effective training for workers on hygiene and safety, application of hygienic measures during handling of fish are required.

Keywords: Farm fish, Chemical Evaluation, Bacterial Evaluation, Quality of fish

General Introduction