

Beni-Suef University Faculty of Veterinary Medicine Biochemistry Department

Effects of some pollutant on some biochemical parameters in catfish obtained from Beni- Suef Governorate

Thesis Presented by

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Summary

In the present investigation, eighty immature channel catfish with average weight 100 g ± 5 were used. The fish were kept in glass aquaria one week before the beginning of the experiment for acclimation period. The water temperature about 22-23°c and pH level kept at 7.6±0.4. De-chlorinated tap water was supplied with oxygen by air pump. The fish were fed by commercial pelleted ration at 3% of body weight. The fish were divided into 7 groups. The first group reserved as a control. The second and third groups were exposed to Deltamethrin in a concentration 0.5µg /L and 0.75 μ g/L for one week. The fourth group was exposed to mercuric chloride in a concentration of 140 μ g/L for one week. The fifth group was exposed to both Deltamethrin and mercuric chloride in a concentration 0.75 and 140 µg/ L respectively. The results revealed that ALT, AST, urea, creatinine and blood glucose were significantly increased while total protein, albumin were significantly decreased, GSH concentration and catalase activity of (liver, Kidneys and gills) also were significantly decreased in groups exposed to Deltamethrin and / or mercuric chloride when compared with control group while ALT, AST, urea, creatinine and blood glucose were significantly decreased, total protein, albumin concentration were significantly increased, GSH concentration and catalase activity of (liver, Kidneys and gills) also were significantly increased in groups exposed to vitamin E or group exposed to copper when compared with mixed polluted group and Deltamethrin group respectively.