## SUMMARY

The present study was carried out on 112 Tilapias and 43 Armout catfishes collected from Nile resources and Ibrahimia branch **at** Beni Seuf governorate during different seasons. All fishes were subjected for clinical examination.

The results of clinical examinations revealed the presence of **clinical abnormalities in 78 Tllapia and 21 Armout** catfishes- These **abnormalities** includes sluggish movements, loss of condition, signs of dullness, loss of scales balance, detachment of scales, paler or darker color than normal, erosions, ulceration in different parts of: the body. Sometimes there were signs of asphyxia, accumulation of mucous in gill pouches and sometimes yellowish creamy cysts were present in the gills.

All employed fishes were subjected for parasitological examination of the gills. The results revealed detection of different types of parasites including, Chilodenella species, Trichodina species, Ichthyophithirus species, Epistylls species. Mongenetic trematodes and lambroglena species in Tilapia fishes. Armout catfishes were infested with Chilodenella species, Trichodina species, Ichthyophithirus species, Henneguya species and Monogenetic trematodes.

Concerning the seasonal variation of the investigated parasites, the results revealed highest incidence during winter, followed by spring and autumn, while the lowest incidence was recorded in summer.

In this study the gills of all employed fishes were subjected for bacteriological examination. The results revealed isolation of different types of bacteria including: Aeromonas hydrophila, Pseudomonas fluoresces, E.Coli, Citrobacter, *Staph, Staph aureus. Tmonots, A .hydrophila* and *Pseudomonas fluorescence* predominate in diseased fishes than in a apparently healthy fishes.

Application of antibiotic sensitivity teat to *Aeromonas hydrophila* revealed high sensitivity to "oxytetracyclin (1007.> and Chloraniphenlcol (88.87.), while *Pseudomonas fluorescence* was <100X) sensitive to Oxytetracyclin and Chloramphenicol. Mycological examination of gills of all employed fishes revealed the isolation of several types of moulds including *Aspergilttis flavus, Aspergillus' niger, Aspergilttis flavus. Aspsrgillus ochoracious, Aspeirgiltus terreus,* Penicillium species, Mucor species, Cladosporium species, Alternaria species, Absidia species and Fusariuro species.

**Concerning yeasts IS isolates were isolated 2 of them were identified as** *Candida albicans* and 2 as Rhoduterullae species and 11 isolates were un typed. Application of antibiotics sensitivity test revealed that both types of yeasts were only sensitive to Nystatin and Clotrimazol.

**Concerning the relationship between different gill** affections (parasitic, bacterial and mycotic). The results indicate the prevalence of parasitic affections as compared with bacterial and mycotic affection. Moreover, parasitic affections seems to predispose for other affections as incidence of parasitic - bacterial affections, parasitic - mycotic affections and parasitic - bacterial - mycotic affections were (1.6X),- (33%3, ie < 16.87.) respectively. While The incidence of bacterial affections alone was  $(5.230 \text{ and the incidence of mycotic affections alone was <math>(0.07.)$ .

In this study histopathological examination of gills infested with different types of parasites were carried out. The results indicate the severe damage caused by these parasites and different types of tissue alterations which is considered also as predisposing factor for other affections.