

**Toxicity effect of Mercury on hematological parameters of
Indian Major Carp, *Catla catla* (Hamilton)**

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Abstract

Mercury (Hg) toxicity in Indian Major Carp, *Catla catla* (Hamilton) was examined by the hematological parameters after two weeks exposure to various Hg concentrations (0.02, 0.002, 0.0002mg/L Hg). Test groups were set up with three replicates for each concentration, plus the control group. Blood samples were collected from six individuals for each concentration at 0, 3, 7, 10 and 14 days of exposure. The hematological parameters analyzed were: red blood cell count (RBC), white blood cell count (WBC), differential leukocyte counts, hemoglobin (Hb), hematocrit (Ht), means corpuscular volume (MCV), mean corpuscular hemoglobin (MCH), mean corpuscular hemoglobin concentration (MCHC), and total thrombocyte count (Tr). There were significant differences among the mean hematological values at the different Hg concentrations indicating that Hg at the concentrations studied was toxic to Indian Major Carp, *Catla catla*.

Key words: Mercury, heavy metal toxicity, *Catla catla*, hematology