ABSTRACT

A study was conducted on the textile industries of Maqbool road Faisalabad, Madduana Drain and River Ravi to assess the pollution load on ecosystem of the area by estimating temperature, pH, TSS, TDS, DO, BOD$_5$ and heavy metals (Ni, Zn, Cr, Cd, Cu, Fe and Pb) in textile effluents, Madduana Drain and River Ravi.

Analysis of the data showed that the textile effluents are contaminating the soil where in Cr, Pb, Cd were dominant toxic metals having concentration of 0.314 mg/l, 4.438 mg/l and 5.493 mg/l respectively. When the temperature, pH, TSS, TDS, DO, BOD$_5$ and other heavy metals (Ni, Zn, Cu and Fe) concentrations compared to permissible standards issued by WHO (2000) and NEQS (2000), significantly high concentrations of TSS, TDS, DO, BOD$_5$ and heavy metals (Ni, Zn, Cu and Fe) are found.

These effluents can not be used for irrigation without proper treatment otherwise that may cause toxicity to soil, plants and animals as well add to the problems of salinity. Similarly these effluents can not be used for fish farming.

In conclusion Madduana Drain and River Ravi is highly polluted by the addition of untreated industrial effluents.

The consequence may be more worse in future if heavy load of pollutants from textile industries of Faisalabad as well as untreated effluents from other industrial units constitute to be discharged into River Ravi.