## **Abstract**

Toxicants ability, prevalence and capacity to absorb in internal organs and reach the body through respiratory tract, absorption and dermal exposure, heavy metals are amongst the most severe contaminants in the local habitat. The research study was carried out in order to detect the level of preferable heavy metals (lead and arsenic) in the fingernails of some selected volunteers that have been completely recovered from COVID-19 virus. The control samples also taken for comparison. All of these forty samples were sourced from different areas of Lahore, the main city of Pakistan. Arsenic (As) and lead (Pb) concentration was instrumentally analyzed using inductive couple plasma- mass spectroscopy (ICP-MS). After adjusting for age, gender, country, smoking, abuse of alcohol, and routine exercise the individuals survived from COVID-19 displayed a little bit varying measurement of As and Pb level concentration relative to the healthy one not affected from this infection at all. In conclusion we demonstrated that the mean value of As and Pb heavy metals in fingernails of corona recovered individuals suffering from diabetes, hypertension, hepatitis C were slightly higher but non-significantly as compared to control group suffering from same disease.