Literature review



Summary/ review The article, 'Pharmaceuticals, Hormones, and Other Organic Wastewater Contaminants in U. S. Streams, 1999-2000: A National Reconnaissance' co-authored by Kolpin, Furlong, Meyer et al. The article is highly relevant in the contemporary environment of advancing science and technology because it shows how the survival of human race is at danger from the effluents and waste material, consisting of various chemical and organic contaminants that are let lose on the streams without effective treatment across America. The study was conducted on the water sample taken from 139 streams across 30 states in America during 1999 to 2000. It was possibly the only study which was conducted to trace the transportation, occurrence in the environment and the ultimate end result of these chemicals, especially harmonically active chemicals that significantly stimulate physiological response in human-beings.

The study had selected 95 organic wastewater contaminants or OWC from the US streams that were observed to be the most damaging to the environment and to the health and survival of human-beings. The study had some startling results that showed the serious lapses on the part of the industries and pharmaceutical companies who were not effectively treating their effluents for the dangerous chemicals that were allowed to be passed onto the streams whose water was being used by the population at large. Indeed, the presence of many of these potentially fatal and active chemicals in the water pose serious threat to the health of the masses and needs to be addressed at the earliest.

The scientists' concern is genuine and reiterates that the conservation and preservation of natural resources are important part of population dynamics as its sustenance depends on the available resources. The population growth

has brought into focus the issue of sustainable development that promotes maintenance of ecosystem that facilitates a continuous supply of natural resources like safe drinking water, clean air, energy and food with proper waste disposal system. The wide ramification of science and technology are both good and dangerous and therefore, they must be tempered with conscious efforts towards environment conservation and preservation.

Reference

Kolpin, Dana W.; Furlong, Edward T.; Meyer Michael T.; Thurman, E. Michael; Zaugg, Steven D.; Barber, Larry B.; Buxton, Herbert T. (2002).

Pharmaceuticals, Hormones, and Other Organic Wastewater Contaminants in U. S. Streams, 1999-2000: A National Reconnaissance. Journal of Environment Science and Technology: 36(6), p 1202-1211.