

**E-WASTE GENERATION AND MANAGEMENT PRACTICES IN JAFFNA AND NALLUR DIVISIONAL SECRETARIAT DIVISIONS, SRI LANKA – A BASE LINE STUDY**

**Kayathiri.K<sup>1\*</sup>, E.Y.A. Charles<sup>2</sup> and S.N. Surendran<sup>3</sup>**

<sup>1\*</sup>

*Faculty of Graduate Studies, University of Jaffna*

<sup>2</sup>

*Department of Computer Science, University of Jaffna*

<sup>3</sup>

*Department of Zoology, University of Jaffna*

\*Corresponding author: kayakumaran@gmail.com

**ABSTRACT**

The post-conflict development state of Jaffna District has resulted in increased e-waste generation and the problems associated with it. In this phase of development, Jaffna peninsula faces several environmental problems which need an urgent attention.

This baseline study was conducted to estimate the magnitude and flow of e-waste generation and to understand the e-waste management practices in Jaffna district. It was conducted in the Jaffna and Nallur Divisional Secretariat Divisions in Jaffna District from February to August 2013 targeting households and corporate as key consumers. Using skip sampling method, random samples of two hundred households in each GN divisions were selected and interviewed. Six offices were selected to represent government, banks and telecom companies.

Results of the household survey were compared with the usage of items reported in the 2004 – Consumer Finance and Socio-Economic Survey conducted by the Central Bank of Sri Lanka. The survey revealed that the usage of refrigerators has increased to 58% from 12.8% while the usage of washing machines has increased to 34% from 0.8%. The usage of televisions has increased to 98% from 43.9%.

The survey at the corporate revealed that out of their total electrical and electronic equipments desktop computer shows high percentage (28%) of usage. Significantly greater percentage (22%) of LED/LCD screen monitors are used while the usage of CRT monitors is comparatively less (6%). A large number of (9%) air conditioners are in use.

80% of the households are keeping their e-waste at home and are reluctant to throw them as waste. Similarly all public offices keep e-waste until they are auctioned. Large enterprises send their e-waste to the head offices which are located in Colombo. There are no e-waste collection centers in Jaffna. Even though a large number of people can distinguish (70%) e-waste, 100% of households are not aware of what happens to the equipment they have discarded as general waste. Similarly the corporates are also unaware of it.

The study also tried to estimate the increase of equipment usage through the electricity consumption. There is a high increase in electrical and electronic equipment usage in Jaffna district which will increase the e-waste dramatically. Also there is a severe lack of knowledge regarding e-waste. Establishing an e-waste collection centre in Jaffna district is an essential need. General public should be made aware of the negative impacts of uncontrolled disposal of e-waste.

**Key words:** E-waste management.