
A cool system to make E-waste great again.

Anita Baier

University of Umbhali
Pretoria, South Africa
author7@umbhaliu.ac.za

Jonas Mattes

University of Umbhali
Pretoria, South Africa
author7@umbhaliu.ac.za

An

University of Umbhali
Pretoria, South Africa
author7@umbhaliu.ac.za

Guoliang Xue

University of Umbhali
Pretoria, South Africa
author7@umbhaliu.ac.za

Zhe Li

University of Umbhali
Pretoria, South Africa
author7@umbhaliu.ac.za

Bruno Müller

University of Umbhali
Pretoria, South Africa
author7@umbhaliu.ac.za

Changkum Ou

University of Umbhali
Pretoria, South Africa
author7@umbhaliu.ac.za

ABSTRACT

UPDATED—May 13, 2017. This sample paper describes the formatting requirements for SIGCHI Extended Abstract Format, and this sample file offers recommendations on writing for the worldwide SIGCHI readership. Please review this document even if you have submitted to SIGCHI conferences before, as some format details have changed relative to previous years. Abstracts should be about 150 words. Required.

WOODSTOCK'97, El Paso, Texas USA

© 2016 ACM. This is the author's version of the work. It is posted here for your personal use. Not for redistribution. The definitive Version of Record was published in *Proceedings of ACM Woodstock conference, July 1997*, <http://dx.doi.org/10.475/123.4>.

A cool system to make E-waste great again.

WOODSTOCK'97, July 1997, El Paso, Texas USA

Good Utilization of the Side Bar

Preparation: Do not change the margin dimensions and do not flow the margin text to the next page.

Materials: The margin box must not intrude or overflow into the header or the footer, or the gutter space between the margin paragraph and the main left column.

Images & Figures: Practically anything can be put in the margin if it fits. Use the `\marginparwidth` constant to set the width of the figure, table, minipage, or whatever you are trying to fit in this skinny space.

Sidebar 1: This is the optional caption

CCS CONCEPTS

•**Computer systems organization** → **Embedded systems**; *Redundancy*; Robotics; •**Networks** → Network reliability;

KEYWORDS

Authors' choice; of terms; separated; by semicolons; include commas, within terms only; required.

ACM Reference format:

Anita Baier, Zhe Li, Jonas Mattes, Bruno Müller, An, Changkum Ou, and Guoliang Xue. 1997. A cool system to make E-waste great again.. In *Proceedings of ACM Woodstock conference, El Paso, Texas USA, July 1997 (WOODSTOCK'97)*, 5 pages.

DOI: 10.475/123.4

INTRODUCTION

This format is to be used for submissions that are published in the conference publications. We wish to give this volume a consistent, high-quality appearance. We therefore ask that authors follow some simple guidelines. In essence, you should format your paper exactly like this document. The easiest way to do this is to replace the content with your own material.

ACM COPYRIGHTS & PERMISSION

Accepted extended abstracts and papers will be distributed in the Conference Publications. They will also be placed in the ACM Digital Library, where they will remain accessible to thousands of researchers and practitioners worldwide. To view the ACM's copyright and permissions policy, see: http://www.acm.org/publications/policies/copyright_policy.

RELATED WORK

We don't work on the main file. Everybody includes his own .tex file :)

A cool system to make E-waste great again.

WOODSTOCK'97, July 1997, El Paso, Texas USA

Robinson [?] pointed out that most of the E-waste isn't even getting collected and just thrown into the household waste. 80% of the E-waste which got collected is then getting exported in poor countries. The recycling in these countries is problematic because E-waste contains lots of environmental contaminants and the facilities doesn't take proper care of this. This is why these contaminants are found around these premises. E-waste has already caused a "considerable environmental degradation"[?] in these countries. Also the workers are suffering from health problems because barely protected against the dangerous fluids and gasses.

A cool system to make E-waste great again.

WOODSTOCK'97, July 1997, El Paso, Texas USA

According to the current european WEEE-directive, manufacturers, sellers and distributors need to provide a return point for electronical and electrical devices. The aim is amongst others the reinforcement of recycling upon responsibility of the producer, which are also in charge of bearing the costs, while the end consumer has the responsibility of proper waste separation [?]. Specifically for smartphones, the German Goverment rejects a deposit at the expense of the final consumer on the national implementation [?]. There are also existing several non-profit projects, which accept mobile phones in order to reuse and recycle them [?][?].

A cool system to make E-waste great again.

WOODSTOCK'97, July 1997, El Paso, Texas USA

"Cumulatively, about 500 million PCs reached the end of their service lives between 1994 and 2003. 500 million PCs contain approximately 2,872,000 t of plastics, 718,000 t of lead, 1363 t of cadmium and 287 t of mercury" [?]

According to [?] this already huge amount of e-waste is going to increase even further as electronics keep advancing and the need for new electronics keeps increasing. Exporting e-waste to poor countries would make sense for first world countries according to Larry Summers (back in 1991) since third world countries don't have an industry that already pollutes their air, water and ground so heavily, so they can deal with that problem more easily. Plus since mortality rates are already so high in these areas, the added pollution would not affect these countries that much.

This thinking started to change with the Basel Convention in 1989. It limits how much e-waste can be moved to what parts of the world, trying to save the environment and also trying to push the companies towards recycling.

Large household appliances and IT and telecommunications equipment made up three quarters of all e-waste back in 2002. This e-waste was mainly generated by countries of the OECD. Overall numbers are going to keep on increasing.

Although it is hard to track down how and where e-waste is going, there have to be put some restrictions into action on where e-waste is going. To solve the problem of this steadily increasing waste, recycling should become more important and more commonly used. But even for this solution, there are environmental hazards that come along with recycling.

To prevent e-waste from even becoming a problem, products should also be designed in such a way that they thrown away in a relatively short time span.