

ShapeTech - Shaping technology: biometric data, collective empowerment and humanization of work

Abstract

There is a trend towards self-optimization using tools designed to help users optimize their sleep, be better organized, improve their sport activities, or avoid distractions at work. At the same time, organizational cultures increasingly encourage individuals to control and optimize themselves. In such a context, digital devices using biometric data may gain currency. On the one hand, these tools may help to protect employees' health precisely under conditions of work intensification; on the other hand they bear the risk of excessive (self-)optimization and thus foster 'motivated self-endangerment'. To achieve a humanizing effect, a conscious and goal-oriented design of technology and specific social contexts of use are needed. ShapeTech addresses the ambivalence between self-optimization and health promotion by exploring the design options and usage contexts of self-monitoring tools with the goal of humanizing highly digitalized work. In doing so, it will analyze how employees in such work environments use a self-monitoring tool based on biometric data to become aware of stressful situations at work, how they may share their experiences in occupational health circles and how joint suggestions for improvements of work situations may be developed. The project will thus promote humanized design and usage of self-monitoring tools currently gaining currency and, at the same time, use these tools to support the humanization of highly digitized work.

Scientific disciplines:

504002 - Sociology of work (40%) | 501003 - Occupational psychology (30%) | 102013 - Human-computer interaction (15%) | 102029 - Practical computer science (15%)

Keywords:

self-monitoring tools, biometric data, co-determination, quantified self, work-related stress and health, humanization of work, social shaping of technology

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Further links about the involved persons and regarding the project you can find at

https://archiv.wwtf.at/programmes/information_communication/ICT20-034