

New ways of working: Implications for office ergonomics

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THE WORK IN CONTEXT

Places of work have been completely transformed in the past decade from traditional offices to working from home to working from anywhere imaginable by innovations in electronic tools and ever-present access to data over the internet. How does an organisation manage and implement an effective office ergonomics program to achieve and sustain organisational excellence? What organisational change factors need to be considered by enterprises when technology disruptions occur in the workplace including how these technological changes impact workspace design and workers' wellbeing? Applying ergonomics and human factors design principles and implementation strategies, within a systems framework, can positively affect knowledge workers' performance and wellbeing, and organisational effectiveness. This groups consist of experts in the area of office ergonomics who each present research findings, design strategies and practices related to designing and implementing leading edge office ergonomics workplaces and programs.

Evaluating the effectiveness of new workplace designs and training on performance and wellbeing, Michelle Robertson, PhD, CPE

To mitigate these adverse health trends and enhance work effectiveness, organisations are redesigning physical workspaces and, in some cases, providing ergonomics training. Although there is a growing interest among employers to improve office workplaces, there are only a few well-designed field studies that have examined the effects of office ergonomics interventions on workers' health and performance.

Macroergonomics is an organisational design approach that can reduce health risks and increase performance by providing flexible physical work environments and accommodating the ergonomic needs of individual employees and project teams. This approach enhances workers' control over their work environment allowing them to influence decisions about where and how they might work leading to improved physical health and performance. The macroergonomics approach to organisational design incorporates an understanding of the individual components of the work system as well as their interrelationships, specifically the social, technical, and physical environments. Emphasis is placed on participation of workers in the workspace design process in terms of understanding work process needs and business requirements and training in the optimal use of the workspace as a tool for safe and effective work.

Ergonomics training is another fundamental element of our macroergonomics approach, as it can integrate ergonomics into an organisation and play a key role in linking the corporate goals with ergonomic practices. Additional benefits of ergonomics training are that it provides employees with

the necessary knowledge on how they should arrange their individual and team workspace, and it promotes healthy computing habits.

Several office ergonomics field intervention's and extended lab study's findings and their emerging common themes will be presented. Further, the macroergonomics work system approach and determining the key performance indicators to measure the results of organisational workplace intervention will be discussed.

Can the application of ergonomics help organisations thrive in the VUCA (volatile, uncertain, complex and ambiguous) world of work? Jim Taylour

Four points highlight the role of human factors in answering the question in the above title:

- 1) Using wellbeing and workspace to help define, refine and nurture positive culture.
- 2) Harmonising and simplifying the standards and going bespoke if needs be.
- 3) Recognising meaningful wellbeing as the WD40 for efficient, effective, experiential and energised work settings.
- 4) Employing ergonomic tools for inclusive selection, and future-proofing.
- 5) Enabling optimum ergonomics for agile workers.

Enabling optimum ergonomics for agile workers, Guy Osmond

Whilst it should be easy for employers to equip dedicated workstations and provide adaptable shared spaces in the workplace, ad hoc working environments away from the office will almost certainly be less accommodating. It is also true that well designed workplace environments will offer poor ergonomics if used incorrectly. It is therefore important to train personnel and provide them with an understanding of 'what good posture looks like' to empower them to find the best available comfort in any environment.

Ergonomics in a rapidly changing work environment, Meg Honan, MS, PT, CPE

The new ways of working are now commonplace. There are a multitude of examples of unassigned and open work areas for knowledge workers across industry types. Some work well; many do not meet the needs of knowledge workers. The devil's in the details. Meg has contributed a human factors perspective to the design and implementation of open and unassigned work environments both as a consultant and ergonomics program manager for Genentech Inc. She says strategic partnerships and a practical set of furniture and work environment considerations can ensure a more successful outcome.

Why sitting isn't the new smoking and what to do instead: Human factors and Ergonomics in practice, Bob Bridger, PhD

Recent research has demonstrated the adverse health effects of a sedentary lifestyle, including sitting at work, leading some to claim that sitting is 'the new smoking'. Research findings show that the analogy with smoking is weak. It breaks down at a number of levels, both in terms of personal choice and in terms of employers' responsibilities to provide a healthy work environment. In daily life, people go to work to work, not to improve their health. Offices are not and should never be gymnasias. At the same time, sitting in an office chair to work at a computer is hardly more physically demanding than staying in bed all day.