

# Standards and Cross-Organization of Work: Two Useful Tools for A Prevention of Manual Handling of Patients in the Healthcare Sector

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## ABSTRACT

Preventive responses most often made to caregivers are too often "gestures and postures training" type to reduce these occupational hazards. Taking the party to focus on manual handling of patients (MMP), it seemed appropriate to revisit prevention measures being implemented by combining the results of international standardization and reflections on the organization of work. The approach described above has found its place in the training actions in applied ergonomics and prevention of risks related to physical activity for caregivers and their management. The objective is to convey to employees, tools for evaluation of work situations, adapted to their activity for taking into account the ergonomics for reducing the risk occurrence of MSDs. Such an approach fit into the development of working group and the cross disciplinary organizations.

**Keywords**: patient manual handling, healthcare, risk assessment, trail of prevention

## INTRODUCTION

National and international statistics show that healthcare personnel health's is subject to higher risks of musculoskeletal disorders (MSDs) than other jobs. Factors such as the number, experience and qualifications of nursing staff can interact in the increased risk of MSDs, with the following conditions : type, condition and number of patients, wrong posture and forces exerted ; lack of equipment , inadequate space, lack of training of caregivers.

The "technical training", to reduce occupational hazards, are generally the preventive responses, made to caregivers, without prerequisite evaluation and without being sure that trainings are strictly focused on their real activity. Taking the party to focus on manual handling of patients (MMP), it seemed appropriate to revisit preventive approaches combining normative consensus and work organization.

### **REVIEW OF THE PREVENTIVE SITUATION**

An analysis of the organization of work, including manual handling tasks and determinants of risk mentioned above, is essential for reducing the risk of healthcare workers. An ergonomic approach can have a significant impact on reducing the risks of manual handling of patients but it is insufficient if the management and organization of the

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activity are not taken into account. The recommendations presented in the standards (ISO TR 12296) allow the identification of hazards, risk estimation and suggest prevention's trails. They are based on the integration of data from epidemiological and biomechanical approaches and consensus of international experts.

The healthcare sector does not avoid the search for performance and reasons more and more into system. The "system" can capitalize the best practices and organize the strategic management (deployment). The biggest pitfall, in the implementation of new "achievement system MMP", would consider the project only a technical point of view. Regarding the practices, it is "easier" to buy aids and equipment's than to consider with the caregivers their needs of equipment's or to improve the organization of the activity. The project should integrate the outset motivation and involvement of operators as a key of success factor. The approach should be participatory, technology is just an excuse to touch the motivation of operators. The implementation of such a system also involves a profound change in the role of management.

### FRAMEWORK FOR SYSTEMIC APPROACH

Based on the judicious use of standards in ergonomics, but also on the" Human and Organizational Factors in Industrial Safety" approach (HOFS) (Daniellou &al.2009), it is to identify and establish the conditions that promote a positive contribution of operators and working group to develop a healthy workplace culture. The search for a consensus on "Human and Organizational Factors of Health" aims to facilitate collaboration between all stakeholders contributing to the safety and health, and to promote social dialogue on this topic. This approach involved the development of a " safety culture" that contributes to the health.

The approach described above has found its place in the training actions in applied ergonomics and prevention of risks related to physical activity for personal care services and their management (Zana & al. 2010). The objective is to convey to employees, tools for evaluation of work places and work situations, adapted to their activity for taking into account the ergonomics for the design or re-design of work situations and reduce the risk occurrence of MSDs.

The proposed approach encourages and develops a multidisciplinary approach and commitment of all parties. It involves four steps (Zana & al. 2010):

- Ergonomic diagnostic of working conditions in each health sector,
- Restitution and discussion in working groups of prevention proposals,
- Implementation of prevention project-by-step in each sector,

- Action-training for some employees of the health structure in applied ergonomics for the prevention of MSDs

- Action-training for all caregivers in prevention of physical workload.

The assessment methodology use a specific tool organized around threshold values which draw on ergonomic principles and how they should be applied in order to design and improve work and workplace settings. These principles are based on requirements that stem from the biomechanics, physiology and psychophysics of how the human body works during a physical workload, as detailed in European and international standards (Zana & al. 2012) This tool, in line with the European directives, makes no distinction between male and female workers concerning physical efforts and specially manual handling. It provides guidance for the assessment of the risks for populations concerned by manual handling activities, owing to immediate effects (accidents) and longer-term effects (occupational diseases) imposed by these tasks.

### CONCLUSION

In many works situations, the performance is more individualized. We can talk about the performance of a department, a service or a team, not of the performance of a individual in particular. Therefore, from a certain organizational level, the breakdown of objectives is against-productive. By individualizing what is not, it leads away from the goal.



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