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Healthy and Safe Workplaces: Aspiring to Contributions from Multiple Administrative Disciplines

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Joseph Stiglitz (2002), in a lecture given to the International Labour Organization (ILO) office in 2001, reminds us that "the purpose of economic activity is to increase the well-being of individuals, and economic structures that are able to do so are more desirable than those that do not" (p. 9). Yet the ILO estimates that occupational illnesses and injuries result in approximately 2.2 million deaths worldwide per year with over 264 million workplace injuries occurring annually, and over 700,000 workers a day suffering a workplace injury causing absence of three days or more (Hämäläinen, Takala, & Saarela, 2006). According to these statistics, modern economic activity is falling short of Stiglitz's desirability standard and requires more attention from academics and practitioners.

Effective organizational action to promote worker well-being requires coordinated efforts among those who control resources and make decisions about how work is structured, as well as those who face the potential psychological and physical risks of work (Hofmann & Tetrick, 2003). There are many characteristics of organizations that may affect the way in which health and safety is managed and studied. For example, multinational companies (MNCs) experience high risks due to their geographically dispersed locations and operations in developing nations where national standards are less comprehensive compared to more developed countries. At the same time, small- and medium-sized enterprises (SMEs), which make up the bulk of the world's business organizations, often face the same health and safety challenges but without the resource base of MNCs. Further, Nash (2005) wrote that MNCs are increasingly addressing health and safety by "[a] shift to a single safety management system that applies to all of their operations throughout the world" (p. 28). While the intent of such systematic effort is noble, research suggests that the way these "management systems" are implemented needs to reflect both local knowledge and sensitivity to contingencies of a particular work climate (e.g., Collinson, 1999; Johns, 2006). Similarly, evidence of work practices that promote health and safety suggest that there are significant health and safety gains realized through integrating "people practices" (Zacharatos, Barling, & Iverson, 2005), and that reductions in perceptions of job insecurity (e.g., Probst & Brubaker, 2001) offering fair compensation (e.g., Kaminski, 2001), implementing motivating work design (e.g., Turner, Chmiel, & Walls, 2005), and encouraging transformational leadership among supervisors (e.g., Arnold, Turner, Barling, Kelloway, & McKee, 2007) enhances health and safety outcomes. These features are largely achievable by organizations without needing economies of scale, investment in proprietary health and safety management systems, or the presence of particular legislation,.

The above statistics and available research also suggest that organizations have met mixed success in creating environments where work conditions effectively reduce the experience of job-related illness and injuries and promote well-being (Parker, Turner, & Griffin, 2003). We believe, however, that there is ample evidence for optimism that healthful and safe organizations are achievable. Data from various administrative disciplines may reinforce this optimistic perspective by promoting the integration of health and safety goals into many functions of the organization.

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This short introduction examines how the three papers that make up this special section extend the field of workplace health and safety through a focus on the interplay of individual and contextual influences. Following a brief description of the intent of the Call for Papers and each of the three papers, we highlight some proposed directions and an overall framework for extending research in this area.

Health and Safety from Multidiscipline Perspectives

This Call for Papers aspired to a multidisciplinary approach to health and safety in organizations. Our aim was to further sensitize business academics and practitioners to the need for an integrated understanding of health and safety in organizations. We requested papers on themes that cut across business functions: the financial performance of firms that pursue comprehensive health and safety practices (e.g., Fernández-Muñiz, Montes-Peón, & Vázquez-Ordás, in press); economic perspectives on health and safety outcomes (e.g., Shalini, in press); the accounting of health and safety in organizations (e.g., Liu, Hwang, & Liu, 2009); psychosocial determinants of health and safety (e.g., Neal & Griffin, 2006) including measurement of the effectiveness of safety-seeking initiatives (e.g., Zohar, 2002); the linkage between organizational practices and safety performance (e.g., Wallace, Popp, & Mondore, 2006); the marketing of health and safety to suppliers, vendors, and customers (e.g., Tait & Walker, 2000); safety in supply chains (e.g., Das, Pagell, Behm, & Veltri, 2008); work health and safety in developing countries (e.g., Forastieri, 2002); and health and safety in vulnerable organizational sectors such as health care (e.g., Vogus & Sutcliffe, 2007). The proposed themes, while ambitious in scope, represent different focal perspectives on health and safety in organizations. The submissions to the Call for Papers broke new ground in a number of areas, and, although advertised widely, drew interest from largely a micro-organizational behaviour perspective on health and safety at work. This lack of representation was another reminder of the need for multidisciplinary research into and an integrated approach toward workplace safety and health.

The Featured Papers

In the first paper of this issue, Day, Sibley, Scott, Tallon, and Ackroyd-Stolarz examine a population typically ignored but particularly susceptible to workplace injuries, namely air medical personnel. Their examination of combined context (e.g., debris from helicopter rotator blades) and traditional patient threats (e.g., needle stick injuries) provide a nuanced look at how these factors, through worry, loss of personal job control (e.g., barriers to patient care), and team dynamics (e.g. team efficacy) are related to exhaustion in air medical personnel. The conservation of resources model (Hobfoll & Freedy, 1993) provides a theoretical lens to interpret the results. Individuals work to preserve a positive resource balance to counteract stressors in their environments. When the resource balance becomes negative, employees are more susceptible to threats in their surroundings, and in this case, to health and safety risks. According to the theory, various factors such as personal resilience and group support networks can serve to moderate the impact of these stressors. Day et al. (this issue) provide an example, within an extreme work context, of how physical and psychosocial factors can potentially increase health and safety risks through fatigue and emotional exhaustion of job occupants.

In the second paper of the issue, Baba, Tourigny, Wang, and Liu examine how individual factors and safety-related climate perceptions were related to diminished work performance in a sample of Chinese airline employees. Personality factors related to workplace health and safety have been rarely examined in the literature and most often have focused on the Big Five personality characteristics (e.g., Clarke & Robertson, 2005). In the current paper, interactions between proactive personality, perceived safety climate, and emotional exhaustion are modelled as predictors of individual work performance. The authors argue that employees who have more proactive personalities are able to counter work environment stressors more effectively than those with less proactive personalities. Similar to the conservation of resources arguments made by Day et al. (this issue), Baba et al. (this issue) theorize that proactive personality works to reduce emotional exhaustion to allow employees to conserve personal resources that can be used to focus on performance-related job responsibilities. In addition, they illustrate how weak safety climate perceptions are related to decrements in individual performance (cf, Michael, Evans, Jansen, & Haight,, 2005). Combined decrements in personal performance across employees could have broad organizational effectiveness implications.

The final article in this special section, written by Peters and Brown, takes the reader, at first glance, in a different direction, focusing on perceptions about hiring and accommodation practices for employees with mental illness. In particular, this article focuses on the social context related to the acceptance and inclusion of employees with mental disabilities. Upon closer examination, we realize that the treatment of employees in a work context is similar to team efficacy, examined in the Day

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et al. study (this issue) relating emotional exhaustion, and work injuries. In addition, the Baba et al. study (this issue) reinforces the need to examine emotional exhaustion in relation to work performance. Taken together, Day et al. and Baba et al. extend the implications of Peters and Brown. If employees are not well integrated into their work settings, they may have limited personal resources upon which to draw and may be more susceptible to work-related psychological and physical risks. These increased risks may be interpreted by employees as representing a poor safety climate, which in turn could also have implications for work performance. Without work climates in which employees look out for one another and value employee well-being more generally, both employee well-being and organizational performance is jeopardized.

Thus, the three articles featured here focus on different aspects of a generalized stressor-strain model to predict how individual and contextual factors are related to riskier work environments. A common focus is on contexts in which health and safety risks are high.

Where does this leave us with the current status of individual and organizational health and safety? We argue that there remains a need for multi-focal discipline-based studies that were invited in our original Call for Papers. Interdisciplinary studies that draw on perspectives of different business functions are needed to further integrate workplace health and safety perspectives into varied and often overlooked contexts.

Workplace health and safety has traditionally been examined as a segregated aspect of organizations: the workplace safety and health "function." The current studies and others highlight the need to examine more broadly the creation of positive workplace health and safety climates. To do so, we need consistent contributions from a wider range of disciplines within the field of management and its foundational disciplines such as psychology, sociology, and economics. Research in organizational behaviour, such as the articles that appear in the present issue and those that have appeared in the *Canadian Journal of Administrative Sciences* on health and safety in the past (e.g., Barling & Hutchinson, 2000) have attempted to shift the focus from compliance-oriented models of meeting minimum standards to the motivation potential of positive workplace health and safety climates. Organizations in which management has placed an emphasis on people-centred practices often experience reductions in workplace illness and injuries and promote positive health and safety outcomes (Barling & Frone, 2004). More research is needed to document characteristics of organizational life and their connection to outcomes related to workplace health and safety. Our hope is that this Special Section encourages researchers in administrative sciences to consider answering this call.

References

Arnold, K.A., Turner, N., Barling, J., Kelloway, E.K., & McKee, M.C. (2007). Transformational leadership and psychological well-Being: The mediating role of meaningful work. *Journal of Occupational Health Psychology, 12*, 193–203.

Barling, J., & Frone, M. (Eds.) (2004). *The Psychology of Workplace Safety.* Washington, DC: American Psychological Association.

Barling, J., & Hutchinson, I. (2000). Commitment vs. control-oriented safety practices, safety reputation and perceived safety climate. *Canadian Journal of Administrative Sciences, 17*, 76–84.

Clarke, S., & Robertson, I.T. (2005). A meta-anlaytic review of the Big Five personality factors and accident involvement. *Journal of Occupational and Organizational Psychology, 78*, 355–376.

Collinson, D.L. (1999). "Surviving the rigs": Safety and surveillance on North Sea oil installations. *Organizational Studies, 20*, 579–600.

Das, A., Pagell, M, Behm, M., & Veltri, A. (2008). Toward a theory of the linkages between safety and quality. *Journal of Operations Management, 26*, 521–535.

Fernández-Muñiz, B., Montes-Peón, J.M., & Vázquez-Ordás, C.J. (in press). Relation between occupational safety management and firm performance. *Safety Science.*

Forastieri, V. (2002). *Children at work—health and safety risks.* Geneva: International Labour Organization.

Hämäläinen, P., Takala, J., & Saarela, K.L. (2006). Global estimates of occupational accidents. *Safety Science, 44*, 137–156.

Hobfoll, S.E., & Freedy, J. (1993). Conservation of resources: A general stress theory applied to burnout. In W.B. Schaufeli, C. Maslach & T. Marek (Eds.). *Professional Burnout: Recent Developments in Theory and Research* (pp. 115–135). Washington, DC: Taylor & Francis.

Hofmann, D.A., & Tetrick, L.E. (Eds.). (2003). *Health and safety in organizations: A multilevel perspective.* San Francisco: Jossey-Bass.

Johns, G. (2006). The essential impact of context on organizational behaviour. *Academy of Management Review, 31*, 386–408.

Kaminski, M. (2001). Unintended consequences: Organizational practices and their impact on workplace safety and productivity. *Journal of Occupational Health Psychology, 6*, 127–138.

Liu, H., Hwang, S.L., & Liu, T.H. (2009). Economic assessment of human errors in manufacturing environment. *Safety Science, 47*, 170–182.

Michael, J.H., Evans, D.D., Jansen, K., & Haight, J. (2005). Relationships between management commitment to safety and employee outcomes: An exploratory study. *Journal of Safety Research, 36*, 171–179.

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Nash, J.L. (2005). Managing global safety: The power of one. *Occupational Hazards, 67(9)*, 28–31.

Neal, A., & Griffin, M.A. (2006). A study of the lagged relationships among safety climate, safety motivation, safety behavior, and accidents at the individual and group levels. *Journal of Applied Psychology, 91*, 946–953.

Parker, S.K., Turner, N., & Griffin, M.A. (2003). Designing healthy work. In D.A. Hofmann & L.E. Tetrick (Eds.), *Health and safety in organizations: A multilevel perspective* (pp. 91–130). San Francisco: Jossey-Bass.

Probst, T. M., & Brubaker, T. L. (2001). The effects of job insecurity on employee safety outcomes: Cross-sectional and longitudinal explorations. *Journal of Occupational Health Psychology, 6*, 139–159.

Shalini, R.T. (in press). Economic cost of occupational accidents: Evidence from a small island economy. *Safety Science.*

Stiglitz, J. (2002). Employment, social justice and societal well-being. *International Labour Review, 141(1–2)*, 9–29.

Tait, & Walker, D. (2000). Marketing health and safety management expertise to small enterprises. *Safety Science, 36*, 95–110.

Turner, N., Chmiel, N., & Walls, M. (2005). Railing for safety: Job demands, job control, and safety citizenship role definition. *Journal of Occupational Health Psychology, 10*, 504–512.

Vogus, T.J., & Sutcliffe, K.M. (2007). The Safety Organizing Scale: Development and validation of a behavioral measure of safety culture in hospital nursing units. *Medical Care, 45*, 46–54.

Wallace, J.C., Popp, E., & Mondore, S. (2006). Safety climate as a mediator between foundation climates and occupational injuries: A group-level investigation. *Journal of Applied Psychology, 87*, 304–311.

Zacharatos, A., Barling, J., & Iverson, R.D. (2005). High performance work systems and occupational safety. *Journal of Applied Psychology, 90*, 77–93.

Zohar, D. (2002). Modifying supervisory practices to improve subunit safety: A leadership-based intervention model. *Journal of Applied Psychology, 87*, 156–163.

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