

Connecting streams of workplace innovation (WPI)

Introduction

The world of work changes rapidly, but the role of humans remains crucial when it comes to performance and innovation. Workplace innovation is a topic that connects innovation in organisations with how work is designed, how jobs are designed and how work behaviour is stimulated and directed. In the past two decades workplace innovation has been addressed from different angles. The work of McMurray and colleagues (Australia and South-east Asia) see workplace innovation as a behavioural, psychological construct. Their WPI scale was designed to identify and measure the behavioural aspects of innovation practices by individuals in their workplace and comprised the four dimensions of organizational innovation; innovation climate; individual innovation; and team innovation. The work of Pot/Dhondt/Totterdill/Oeij (Europe, Netherlands, UK) see workplace innovation as a set of organisational conditions that enable employee engagement, which in turn promote both organisational goals and good quality jobs. While the work of McMurray et al is rooted in psychology, the work of Pot et al stems from sociology, particularly modern sociotechnics. More or less in between these approaches is the work of Parker and colleagues (Australia, UK) about work design, who map work design perspectives onto distinct historical developments: (a) sociotechnical systems and autonomous work groups, (b) job characteristics model, (c) job demands-control model, (d) job demands-resources model, and (e) role theory. In so doing Parker et al cover work ranging from psychology, sociology and management science. In addition, we observe new streams, for example in Asia. The Korea Labor Institute studies how WPI can be used to improve working conditions and employment relations to boost innovative capability in firms, whilst making better use of talents and experiences of the employees. The Human Augmentation Research Center from Japan has developed a design approach as an example of WPI how to improve the cooperation between humans and machines / robots.

Despite differences, these streams have also commonalities: designing workplaces such that potential negative effects can be mitigated. Today's main threats (and opportunities) may come from technological and social change, which might result in job loss or hollowing out the quality of work. Good work design and good workplace innovation interventions can prevent potential negative effects of the present and future digital transformation and social transformation of our economies. Workplace innovation is a possible road for enhancing innovation via employee engagement.

This workshop intends to connect different international streams that deal with related issues. The presentation of the Australian-SE Asian stream has as point of departure an individual behaviour construct to understand WPI and innovative behaviour; the EU stream sees WPI strongly connected to organisational conditions and modern sociotechnical thinking; the third Australian-UK presentation tries to connect individual and organisational approaches with the notion of work design and SMART work. The fourth Korean stream presents a study of studies working conditions in manufacturing that are conducive to WPI. A fifth and final presentation investigates the implications for WPI from the cooperation between people and intelligent machines like robots in Japan. This workshop intends to explore new routes for workplace innovation approaches and seek what are their common grounds. What are commonalities and differences and how does that help innovation in general?

Organisers and presenters:

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Abstracts of presentations

Centre for Transformative Work Design / Future of Work Institute, Curtin University (Australia)

-Presenter: Professor Sharon K. Parker

-Title: SMART work design as an approach for building workplace innovation in the context of technological change

-Abstract:

In this presentation, against the back drop of a “mental health crisis” and the need for “prosperity through innovation”, I articulate the importance of high quality work for a healthy and functioning society. I introduce the “SMART” model of work design, which refers to work that is Stimulating, enables Mastery, supports human Agency, is Relational, and has Tolerable demands. I then discuss how digitalization and the associated technological and organisational changes present both challenges and opportunities for SMART work. I argue that discussions about the future of work have been dominated by a focus on the need to achieve smarter workers via formal training and education, with insufficient attention being given to the proactive design of smart work that, amongst other outcomes, maintains and develops human skill and knowledge. I provide practical examples of how we have used the SMART work design approach to build innovative organisations with healthy and engaged workers.

Korea Labor Institute (Republic of South Korea)

-Authors/Presenters: Kyetaik Oh, Honggeun Chang, Seri No / Kyetaik Oh

-Title: Workplace Innovation in Korea

-Abstract:

This report tries to explore the workplace innovation in Korea. It explains what is happening in the Korean workplaces in manufacturing sector. The survey was conducted and information from about 1,000 Korean companies was collected. It analyzes them in terms of work organization, human resource management practices, and human resource development practices. It also includes Korean company cases in which workplace innovation works well. It analyzes in which conditions workplace innovation can be activated and what would be consequences of workplace innovation. Finally, the report summarizes policy implications for future of Korean workplace innovation including Korean workplace innovation models and Korean national workplace innovation model.

Human Augmentation Research Center, National Institute of Advanced Industrial Science and Technology (AIST), University of Tokyo (Japan)

-Authors: Ryosuke Ichikari, Kentaro Watanabe, Takeshi Takenaka, Takashi Okuma

-Title: Case studies on workplace innovation based on objective analysis of industrial sites where employees cooperate with intelligent machines

- Abstract:

Intelligent machines such as robot and artificial intelligence have been dramatically changing working environment in many service and industrial fields. In this talk, we introduce our case studies on workplace innovation activities that employees cooperate with intelligent machines held in distribution warehouse, Japanese restaurant, and manufacturing field. We illustrate the quantitative analysis of the effect of such activities using employees' behavior measurement technologies and records of usage of the intelligent machines. Finally we provide some implications for workplace innovation through technology integration.

College of Business and Law, RMIT University (Australia)

-Authors: Adela McMurray and Peter Oeij

-Title: Measuring Workplace Innovation

-Abstract:

Workplace innovation studies can be classified into the two categories of process innovation and outcome innovation. The concept of workplace innovation is an organisational capability renewing organisational behaviour (Oeij & Vaas, 2016). This presentation reports on the Workplace Innovation Scale (WIS) that was developed by McMurray and Dorai (2003) and validated globally for 17 years demonstrating Cronbach Alpha reliability scores over $\alpha = 0.89$. The WIS is comprised of 24 items measuring the four dimensions of: organisational innovation, workplace climate, individual innovation and team innovation in evaluating the business's innovation process and has established relationships across multiple organisational concepts. The WIS addresses Oeij et al.'s (2014) conceptualisation of workplace innovation that emphasizes the need for looking at the organisation as a whole when addressing workplace innovation.

TNO, department Healthy Living (Netherlands)

-Author/Presenter: Peter Oeij, Paul Preenen

-Title: Workplace innovation as a means to improve business performance and job quality by employee engagement

-Abstract:

Innovation in organisations is needed to remain competitive, effective and efficient. Many organisations apply top-down strategies for innovation, underusing employee potential and running the risk of resistance to change. Workplace innovation in Europe is a stream that propagates another way of developing and implementing innovations and technological choices. While this stream recognizes the position of management to play a leading role, it fosters employee engagement in the innovation process. Such an approach strives to simultaneously improve business performance and job quality. The presentation explains the approach and presents some tools.

References

-McMurray, A., Muenjohn, N. and Weerakoon, C. (eds.) (forthcoming). *The Palgrave Handbook of Workplace Innovation across Developed and Developing Countries*. Palgrave Macmillan, UK.

-Oeij, P.R.A., Rus, D. and Pot, F.D. (eds.) (2017). *Workplace innovation: Theory, research and practice*. Springer, Cham (Switzerland). <https://www.springer.com/gp/book/9783319563329>