



e a w o p

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**2021 GLASGOW CONGRESS LEGACY**

- **Professional, streamers and amateur players: a virtual ethnography for exploring organizational behaviours in different work-play conditions**  
Arianna Boldi & Amon Rapp

In recent decades, work has been going through a series of transformations in the Western world leading to a shift in its organization and the rise of new organizational structures, like virtual organizations (DeSanctis & Monge, 1999). As the popularity of such organizations has grown, drawbacks and human resources issues have also arisen (Johnson & Isenhour, 2003), with reference to e.g., the management of a displaced workforce (Flecker, 2016) and knowledge sharing (Cramton, 2001).

Possible solutions could be drawn from the study of game worlds (Rapp, 2020a), since they are often designed to reply existing social structures, such as work ecosystems (Lukacs et al., 2009), and support organizations of players (Rapp, 2020b). In fact, virtual organizations have tried to respond to issues arising from the “virtualization” of their structure by embedding “gamification” techniques within work practices (Smith & Kilty, 2014) or developing video games aimed at e.g., engaging their members (Stanculescu et al., 2016). As these practices spread, the boundaries between *work* and *play* started blurring (Taylor, 2012), in a way that the old dichotomies between game and labour or between “real” and “virtual” worlds are no more arguable (Goggin, 2011).

In this new scenario, we need to understand how the entanglement between work and play may affect the structures of organizations and the organizational dynamics of their members. Therefore, I will explore how players, performing in different “play-work” conditions, produce different organizational forms and enact different organizational behaviours. Players engage in gaming sessions differently, depending on the perception of their activity as work, leisure, or both of them (*playbour*) (Törhönen et al., 2019). The target of the study consists in three types of players: Esports professionals, video game streamers, and casual players as they differently intertwine “playing” and “working” practices when playing video games. Esports professional are engaged in problems that are typical of professional workers, like pursuing a career in the area or developing their skills as professionals (Taylor, 2012). Video game streamers actively model their behaviour and their emotions during live performances (Woodcock & Johnson, 2019) in order to attract spectators and “retain” them (Walker, 2014). Finally, amateur players could occasionally be considered labourer, as they produce economic value (Koutsouras et al., 2017), despite not receiving any income.

A cross-comparison between all the three aforementioned categories, which is currently missing, may be an original contribute to WOP community in a twofold sense: it would clarify how different modalities of combining work and play impact on organization members; then, it

could help both academic and practitioners address the issues faced by current working virtual organizations, by providing insights on how to effectively organize people collaborating from a distance through “best practices” that can be found in games.

An ethnographic study will be conducted within an Italian gaming community. We will focus on a video game of the *Call of Duty* series, a First-Person Shooter (FPS) game which requires players to enact organizational efforts in order to reach the in-game objectives (e.g., defeat the enemy team). The study will use i) semi-structured interviews and participant observation conducted in the game

environment played by the amateurs, ii-iii) observation of gaming sessions, analysis of online content and semi-structured interviews with reference to streamers and Esports professional.

We expect that organizational forms might result to be more formal and goal-oriented if players perceive their activity as a sort of “work”. We also expect to identify which elements can support the organization of virtual teams when an external, profit-related motivation is absent, and how these differ from those that support teams externally motivated. This comparison may reveal novel strategies to keep a virtual team engaged and focused on the objectives in the long term in absence of profit-related motivators, as well as their drawbacks in comparison to situations in which people earn a salary. The analysis of stream players may reveal which leadership skills are enacted to engage and retain a huge community of followers in an online environment. Since we expect that streamers are rewarded by social gratification when playing (Blight, 2016), this research might also inspire the design of innovative strategies for employees’ social rewarding in the organizational context. Preliminary results are expected for December 2021 and could be presented at the conference.

Limitations of this work lies in the likely difficulties of generalizing the results to a wider population being targeted to the Italian context. However qualitative research aims to provide rich insights rather than generalizable results.

- **“Proto-organizations” in human-AI teams: exploring organizational abilities in a collaborative-competitive video game.**  
Arianna Boldi & Amon Rapp

In the last ten years, Artificial Intelligence (AI) has become pervasive in the context of work, being employed to support workers in a variety of high-complex tasks (Topol, 2019; Hayashi & Wakabayashi, 2017). Technology now autonomously and proactively helps humans, so that consensus is growing on considering artificial agents as subjects (Cai et al., 2019; Wang et al., 2019), or partners endowed with skills and competencies (Abbass, 2019), rather than as mere tools.

With the emergence of hybrid work teams composed of human and artificial agents, research started exploring how people collaborate with AI teammates and how such collaboration could be improved. Humans and AIs may exhibit complementary strengths and abilities (Dubey et al., 2020), but people may also treat differently humans and AI teammates (Zhang et al., 2021), hold biases against AI partners (Ashktorab et al., 2020), or have unrealistic expectations about their competences and performances (Dubey et al., 2020). However, research is still far from having a complete understanding of how this collaboration is enacted in “real-world contexts”, where people have situated objectives that need to be achieved, and how organizational aspects that are well known in “fully human” environments may be transformed by the presence of artificial teammates.

To fill this gap, we will explore the organizational abilities, strategies, and behaviours that people need to put into action for collaborating with AIs, by conducting an ethnographic research in a multiplayer video game, where humans and artificial players collaborate in teams to achieve specific goals. Virtual worlds can be a valid source for the study of organizational behaviours (e.g., Rapp, 2020a, 2020b) and offer an ideal and accessible environment where to conduct detailed observation of organizational dynamics involving artificial and human agents: in there, players may experience work-like dynamics, being requested to reach specific objectives under time and resource constraints; moreover, they can be observed in different situations (i.e., interacting with AI or human agents) while maintaining constant certain conditions (e.g., the game environment, objectives).

We will study a popular First-Person Shooter game of the series Call of Duty (COD) as a virtual environment where players have the possibility to join a team of AIs/humans teammates. The ethnography will entail semi-structured interviews and participant observation. Interview participants will be recruited with reference to two target groups: Human-AI teams, represented by

people (either with previous or no experience with the game) playing in teams composed of one human and multiple AI team members; Human-human teams, represented by players exclusively playing with other humans (either friends or strangers).

Our main research questions are: What cooperative behaviours (e.g., delegation, trust, role mobility) do human players exhibit when playing with AI and human teammates? What organizational skills (e.g., intersubjective thinking, situational awareness, predictive abilities) do they need? How is the overall performance of the team affected by teammates in these two conditions? We expect that participants will behave differently in human-ai teams, since here negotiation and leadership distribution are not possible; whereas teams formed exclusively by humans could rely on, e.g., verbal communication and shared organizational tactics. In human-AI teams, humans might take the whole burden of organizing the game action. For instance, they might give more attention to information cues provided by the AIs or adapt to their physical disposition within the game map. These organizational forms may be seen as “proto-organizations” that could be inspiring for understanding other forms of human-AI collaboration in “serious environments” (e.g., in organizations where workers have to collaborate with AIs). Preliminary results will be available in December 2021 (after the conduction of a first set of interviews) and be presented at the conference.

A Grounded Theory approach will drive our analysis, which is intended to be mostly explorative, given the fact that studies addressing this topic are still scarce. Limitations may be represented by the impossibility of manipulating the game environment and that generalizability of the results could be limited to Italian players. Despite that, we believe that this study would contribute to WOP community by revealing problems and challenges that workers face when collaborating with AI agents (e.g., stress, new skills to develop). With the increasing employment of hybrid teams in organizations, there will be the need to understand their impact on both individual's well-being and organizational performance, in order to give practical and theoretical insights to design working contexts where human-AI collaboration is possible to both scholars and practitioners.

- **Daily work stress and unhealthy snacking: The moderating role of trait mindfulness.**  
Dārta Vasiļjeva; Annika Nübold; Ute R. Hülshager & Chantal Nederkoorn

Unhealthy snacking is considered one of the main contributors to the current obesity pandemic with nearly a third of the world's population being obese nowadays (World Health Organization, 2020). Shedding light onto the factors that may contribute to snacking and weight gain is therefore crucial both from a theoretical and practical perspective. Clinical studies have persistently reported stress as one of the most important factors for changes in eating behavior (Hill et al., 2018; Scott & Johnstone, 2012) and first empirical evidence suggests that work stress, in comparison to other types of stress, has particularly strong effects on food choice (O'Connor et al., 2008). Nevertheless, although some studies on the impact of work stress on snacking emerged in the past years, they mainly focused on rather coarse and distal indicators of work stress (e.g., work hours; Jones et al., 2007; Wardle et al., 2000) and rather chronic, between-person differences (Clohessy et al., 2019), providing little insights into when and why work demands affect snacking.

Yet, since snacking takes place on an intrapersonal level and naturally fluctuates from day to day, the overall goal of our study is to adopt a within-person perspective in studying the fundamental mechanisms linking work demands to snacking behavior. Drawing on COR theory (Hobfoll, 1989), we suggest two pathways that may explain how work stress relates to unhealthy snacking: self-regulation and affect regulation. When faced with stressful situations at work, individuals may attempt to distract themselves and regulate their negative experiences by turning to unhealthy snacks because they believe that it will alleviate the stressful experience and make them feel better (Berset et al., 2011; Ulrich-Lai et al., 2015). In turn, an important personality trait that may act as a buffer between negative work experiences and unhealthy snacking is mindfulness, as individuals with high trait mindfulness are able to experience negative encounters without impulsively reacting to them (Alberts et al., 2012).

To test our hypotheses, we collected diary data across two workweeks (10 working days). The final sample included 120 employees who responded to three daily surveys measuring their experiences at work and in the evening after work. Results did not show a significant linear

relationship between daily work stress and unhealthy snacking. The protective nature of trait mindfulness became apparent, with individuals high in trait mindfulness snacking less when emotionally exhausted in the evening after work. Additionally, supplementary analysis revealed that workload has a curvilinear effect on unhealthy snacking in the evening after work with lower daily workload related to higher unhealthy snack intake compared to moderate levels of daily workload.

Despite the strengths of our study, our self-report measures may have affected the accuracy of the reported snacking behaviors. Research has shown that participants tend to underreport their snack intake (Poppitt et al., 1998) and merely monitoring one's eating behaviors decreases food intake, especially when measuring consumption of energy-dense foods (Robinson et al., 2015). Future research could therefore make use of potentially more objective, detailed measures and highlight the importance of honest reporting.

Overall, our study shows that lower daily workload (underload and boredom) may be a particular trigger for unhealthy behaviors. To protect employees, organizations may evaluate current job roles and consider potential job enlargement and job enrichment strategies. We also find that trait mindfulness may be a protective factor. From a practical point of view, this is promising, as mindfulness can be improved with training (van de Veer et al., 2012). Future interventions aimed at reducing unhealthy lifestyle choices of employees may therefore particularly target employees with lower levels of trait mindfulness and should consider that unhealthy snacking may be most problematic and mindfulness may be most effective in altering employees' eating behaviors specifically during the evening hours after work.

Our study responds to the call for more research on daily variability of work experiences and snacking as prior research has been largely cross-sectional or lab-based, therefore lacking application to real-life settings and daily events (O'Connor & Conner, 2011; Stewart-Knox, 2014). Our approach offers a more detailed understanding of specific factors that trigger snacking episodes within the workday and contributes to the theoretical understanding of within and cross-domain outcomes of work stress.

- **Minorities choose ingroup members for hard-to-win political seats: Complexities in the motivations leading to glass cliff choices.**  
Clara Kulich; Cristina Aelenei; Yvette Assilamehou-Kunz & Vincenzo Iacoviello

Ethnic, racial, or immigration (ERI) minorities are underrepresented in politics in Western Europe, even if their presence in elections has increased over the years (Wilson, 2017). In order to understand why ERI candidates are kept from entering positions of power, we were interested in the conditions under which these candidates run the electoral races and potential reasons for these decisions.

The glass cliff phenomenon shows that women and other minority groups are more likely selected for positions of power under precarious circumstances. These may include poor company performance, failure in previous political elections, or any sort of scandal or crisis. An anecdotal example often named in the media is Theresa May who became UK Prime Minister with the task to negotiate the Brexit, an impossible

mission. Leaning on this definition, archival research on elections in the UK and the US have demonstrated that ERI minorities, as compared to White majority candidates, are more likely to run in hard-to-win seats compared to easy-to-win seats (e.g., Kulich et al., 2014; Robison et al., 2021). Experimental research showed this phenomenon in particular for left-wing oriented participants (Aelenei et al., 2020), suggesting that the belief in an ERI candidate's particular traits or capacities may drive such decisions (belief in their change potential). In an effort to extend this research, we advanced the idea that ingroup members - i.e., ERI participants - may also associate ERI candidates with a particular potential to win, thus showing a preference for ERI candidates in precarious versus easy contexts. We thus hypothesized that minority participants would associate a strong change potential with minorities and thus prefer their candidacy in particularly difficult situations, i.e., seats that are hard-to-win for their party.

Three quasi-experimental studies (Pilot study: N = 182 [of whom 35 minority] French students; Study 1 N= 261 [129] French students; Study 2 N= 375 [132] French Crowd Panel workers) investigated political glass cliff choices of a male ERI minority (vs majority) candidate in the light of decision makers' own ERI backgrounds and party winnability (hard- to-win vs easy-to-win). We measured participants' self-categorization as ERI minority vs majority member and we manipulated the winnability of a party's political seat (i.e., whether the party had won or lost in the previous election). Participants' task was to imagine themselves in the role of the party leader with the task to nominate one out of two candidates (ERI minority vs majority).

Our hypothesis was generally supported. In all studies, ERI minority participants preferred the ERI minority candidate in the hard over the easy-to-win seat condition, whereas majority participants' choices did not vary across conditions. However, Study 3 introduced an important boundary condition: as the glass cliff was only significant for male minority participants. Due to smaller sample sizes, the gender moderation effect could not be tested in the first two studies, where similar descriptive choice patterns seemed to exist. Female minority participants were indifferent in the selection of the candidate across conditions. Across the three studies, majority participants either did not differentiate between minority and majority candidates or preferred the majority candidate, independent of party winnability. Exploring potential motivations for candidate choice, Studies 1 and 2 showed that, independent of winnability, the minority participants' preference for the minority candidate was, in part, explained by stronger associations of this candidate with morality, competence, and signaling change potential (i.e. the party's willingness to change). In Study 3 the minority candidate was associated to a higher potential of change, atypicality, and higher effort by all participants which in turn made it more likely to choose the minority candidate. However, this result was not moderated by participants' own ERI background or gender.

We conclude that glass cliff choices may arise from minority valuing motives and on top of that there may be a particularly strong belief in the ingroup in terms of gender and ERI background that may strengthen the phenomenon.

Our results are not completely conclusive on the exact motivations driving male ERI minority participants to glass cliff decisions. Intersectionality should be investigated as we use a default male ERI candidate, thus results may not apply to a female ERI candidate. It is important to know and understand the motivation for glass cliff choices in order to come up with interventions that allow the step from minority candidacies to minority leadership. So far, it seems that hostile as well as more benign motivations, as illustrated here, may cause the glass cliff.

To our knowledge, ingroup favoritism in glass cliff choices has never been investigated. Studies on the ERI minority glass cliff are rare, in particular using experimental methodology.

Video presentation is available by following this [link](#).

- **Deducing multilevel job demands and resources in an Italian healthcare institution.**

Davide Giusino; Marco De Angelis; Greta Mazzetti; Rita Chiesa; Edoardo Pische; Ilaria Rita Faiulo; Siw Tone Innstrand; Marit Christensen; Dina Guglielmi & Luca Pietrantonì

Healthcare workers' mental health is a major concern across Europe (Alexandrova- Karamanova et al., 2016). This circumstance has been further exacerbated by Covid-19 pandemic outbreak. There is an urgent need to implement timely interventions to prevent mental ill-health and promote healthcare workers' positive mental health at work. However, effective interventions should be grounded on a precise knowledge of causes of mental ill-health and barriers to positive mental health, which should be tackled within a given working environment (Di Tecco et al., 2020). Complementary to the reduction of risk factors, interventions should leverage positive mental health sources to strengthen protective factors already available in the workplace (Christensen et al., 2020). The data presented hereinafter have been collected during the needs assessment phase taking place at the H-WORK project's Italian intervention site. Consistent with the above line of reasoning, the purpose of the analysis was to detail the contingent elements to which subsequent actions and initiatives have been specifically tailored.

We adopted the Job Demands-Resources model (JD-R; Bakker & Demerouti, 2018) as a guiding framework for the performed analysis. Also, a recent stream of literature has pointed out the greater effectiveness of addressing more than one of the levels of analysis which a workplace is composed of (ibidem). Thus, we also adopted the Individual-Group-Leader-Organisation model (IGLO; Nielsen et al., 2018). Therefore, the workplace mental health needs assessment activity was designed to detect both obstacles (i.e., job demands) and facilitators (i.e., job resources) of healthcare workers' mental health, subsequently classified according to IGLO levels.

Participants were from three departments (Emergency, Medicine, Research Institute of Neuroscience) of a large Northern Italian public healthcare institution. Twenty-one managers (8 senior managers, 13 middle managers) participated in semi-structured individual interviews. In

parallel, 27 employees (5 doctors, 17 nurses, 5 healthcare assistants) attended focus groups. Activities took place between September and October 2020. A deductive qualitative content analysis (Hsieh & Shannon, 2005) was conducted to thematically identify individual-, group-, leader- and organisational-level job demands and resources.

At the individual level, job demands included resistance to change, high emotional demand, older age as associated with physical workload, whereas the younger generation as related to emotional workload and perception of unreasonable tasks. Resources included work attitudes and personal resources. At the group level, job demands included lack of team communication, lack of team identity, stigma towards mental health issues, and team conflict. Resources included interdisciplinary cooperation, peer support, and collaborative team climate. At the leader level, job demands included divergence between leaders' and employees' perspectives, lack of managerial and mental health training, lack of psychological support to managers, and senior and middle managers' workload. Resources included cooperation between middle and senior managers, identity entrepreneurship, leaders' openness to change, and specific leadership styles. At the organisational level, job demands included the burden of bureaucracy, underpayment consequences, short-term planning of organisational changes, long work shifts, lack of workplace mental health policies and practices, top-down decision-making, and understaffing. Resources included equipment, performance feedback and rewards, job rotation, and organisational well-being services.

Findings derive from an inherently interpretive process, which might be biased towards adopted theories. Nevertheless, deductive coding is likely to provide researchers with a shared mental model ensuring consistency of findings and mitigating subjectivity.

Practical implications are held for the design of participatory mental health interventions both at the H-WORK project's Italian intervention site and in healthcare organisations in general. Results from the performed needs assessment provided hints about the most meaningful targets to be addressed by subsequent workplace mental health initiatives at multiple levels of interventions, thus maximising their potential impact of to the extent that they are aligned with the achieved results. Also, as JDR-IGLO integration proved feasible, occupational mental health practitioners are provided with a suitable approach to workplace mental health needs assessment activities, from which multilevel interventions can be derived to balance the burden of work demands and strengthen resources with a view to improving the mental health of employees, managers, work teams and organisational well-being.

This study was an earlier attempt to test the JD-R and IGLO models' integrated deployment for needs assessment activities in order to provide a bottom-up evidence for future multilevel interventions promoting healthcare workers' mental health.

- **Developing self-compassion in healthcare professionals utilising a brief online intervention: A randomised waitlist control trial.**  
Amanda Super; Joanna Yarker & Rachel Lewis

The present study aimed to identify the impact of a brief online self-compassion focused intervention on the health and wellbeing of healthcare professionals, in order to understand whether employees health and wellbeing can be improved and if a time-limited online intervention with minimal home practice can be effective. Given the time and scheduling constraints experienced by many workers, a brief online self-compassion intervention may be an effective way forward for organisations looking to support staffs' health and wellbeing.

It is well established that workers in the healthcare sector are particularly vulnerable to stress (Harris, 2001; Moore and Cooper, 1996) and are most affected by burnout (Schaufeli and Greenglass, 2001), with healthcare professionals requiring support to address the inherent stressors in their work (Shapiro et al., 2005). Crucially, research has shown that high levels of stress in nurses negatively correlates with quality of care provision (Sarafis et al., 2016). With a pressing need to ensure high quality, safe, effective and compassionate patient care (Francis, 2013), interventions to protect staff and sustain caring behaviours are required (Slatyer et al., 2017). Given the high incidence of stress and burnout in the workplace, self-compassion may be a useful construct to support the health and wellbeing of staff and thus improve patient care. Self-compassion has been recognised as important to health and wellbeing in non-clinical samples over the last fifteen years (see Zessin et al., 2015 for a review), with particular relevance to psychological health. In a meta-analysis, Macbeth and Gumley (2012) found that self-compassion is a robust predictor of outcomes related to stress and that burnout can also be mediated by self-compassion (Barnard and Curry, 2011a). Furthermore, studies demonstrate that self-compassion can act as a defending factor against a wide range of wellbeing measures including stress, emotional exhaustion and burnout in healthcare professionals (Duarte et al., 2016; Raab, 2014; Rao and Kemper, 2017). A number of randomised controlled studies support the view that a variety of training interventions can improve self-compassion in community samples (Jazaieri et al., 2013; Neff and Germer, 2013). While there have been recent meta-analyses concerned with self-compassion interventions (e.g Ferrari et al., 2019; Kirby et al., 2017) the findings highlight that the quality of studies is limited, and interventions rarely focus on working populations. Given the increasing interest in self-compassion at work, particularly within healthcare settings, there is a need to understand whether the benefits transfer.

The study employed a randomised waitlist control design. 190 healthcare professionals were assigned to an intervention group (n.110) or a wait list control group (n.80). Pre and post-intervention data were collected from both groups as well as at one-month follow up. Valid and reliable outcome measures included self-compassion, mental wellbeing, stress and burnout.

The intervention explicitly focused on the three core components of self-compassion (self-kindness/common humanity/mindfulness) as defined by Neff (2003b). It consisted of a four-week online programme delivered through four pre-recorded training webinars (ranging from 43-54 minutes in duration). Each webinar included an audio feed and slide deck, accessible on any internet connected device. Accompanying worksheets to record daily reflections, brief weekly key tasks and an action plan to record progress were provided to enhance personal learning through home practice of limited duration.

Results showed a significant group by time interaction ( $d=1.46$ ,  $p<.001$ ) with a large effect size and a significant effect of the intervention on all the main study variables. Furthermore, these improvements were seen from baseline to follow up for the intervention group relative to the waitlist control group.

These include the attrition of participants, a volunteer sample with a lack of demographical diversity in relation to gender and no active control condition.

The findings of this study offer promising evidence to support a brief, self-guided online intervention as an effective and accessible option to increase self-compassion and mental wellbeing and reduce stress and burnout. Healthcare professionals operate in a demanding and challenging environment and it is essential that they are equipped to cope with the inevitable difficulties experienced in the role.

Alongside good work design and management, interventions such as this may provide an affordable and scalable approach for organisations looking to enable large numbers of healthcare professionals to stay healthy and well in work.

- **Momentary novices learning from errors in public digitalization.**  
Charlotte Jonasson; Rikke Amalie Agergaard Jensen; Sidsel Villumsen & Jette Ernst

The research goal is to investigate the inclusion of what we define as momentary novices in learning from errors in public digitalization. This is relevant because although research indicates that novices, in relation to experts, contribute with complementary knowledge on errors, little is known about the conditions for including momentary novices in learning from errors.

In the context of public digitalization, public professional experts may experience being momentary novices when working with digitalization and thus their ability to change between knowledge providing and knowledge obtaining roles may be seminal to learning from errors. We draw on theories of affordances and attention to the environment to investigate how becoming novices in the workplace environment of public digitalization influence opportunities of learning.

Qualitative methods of 1 year participant observation and interviews (expected  $N=40$ ) are conducted as they are suitable for investigating how experts, being momentary novices in digitalization, learn from errors through attending to the environment. We take departure in public healthcare focusing on implementing a digitalized care guide for patients.

Preliminary results show that professional experts being momentary novices in public digitalization engage in learning from errors through ‘an education of attention’. Such learning as attuned attention to a novel environment of digitalization involves 1) the attention to timing errors in

shifts between being expert and being novice, 2) the attention to errors related to ‘socializing affordances’ between novices and experts in a public digitalization environment, and 3) the attention to co-responsiveness of novices and digital devices in everyday work. The full results will be available by Fall 2021.

The study limitations concern the qualitative methods applied, which do not allow statistical generalization to other contexts than the investigated. However, the study’s theoretical contributions can be tested for generalization in further research.

The study holds research implications in regard to the understanding of what and how knowledge and experiences of being momentary novices are included in workplace learning from errors. This contributes to prior research having identified differences in expert and novice error knowledge and to prior calls for investigating the interchangeability of novice and expert roles for knowledge exchange. The study also contributes to research on public digitalization: Although research has investigated the causes of severe errors, little to no research has investigated learning from such errors. Finally, the research also provides novel insight into how timing and temporality affect workplace error learning, which is understudied.

The study also holds practical implications for how to learn from the implementation of public digitalization in close collaboration between public healthcare professionals, digitalization professionals, organizational consultants, and leaders. The study offers important knowledge for how to ensure that expert health care professionals as novices in digitalization become central in the ongoing development of public digitalization.

The originality of the study concerns the investigation of the conditions for inclusion of momentary novices in learning from errors and how this contributes expert complimentary knowledge. The originality of the study furthermore concerns the investigation of learning from errors in public digitalization, which to our knowledge, despite the growing research on public digitalization, has not been investigated.

- **The power of empowerment: Predictors and benefits of shared leadership in organizations.**

Charlotte M. Edelman; Katrien Fransen & Filip Boen

Leadership plays an essential part in creating competitive advantage and well-being among employees. One way in which formal leaders can deal with the variety of responsibilities that comes with their role is to share their responsibilities with team members (i.e., shared leadership). Although there is abundant literature on how high-quality peer leadership benefits team effectiveness (TE) and well-being, there is only limited evidence about the underpinning mechanisms of these relationships and how the formal leader can support this process. To address this lacuna, we conducted an online survey study with 146 employees from various organizations. The results suggest that an empowering leadership style of the formal leader is associated with higher perceived peer leadership quality (PLQ) on four different leadership roles (i.e., task, motivational,

social, and external leader). In addition, formal leaders who empower their team members are also perceived as better leaders themselves. Moreover, the improved PLQ was in turn positively related to TE and work satisfaction, while being negatively related to burnout. In line with the social identity approach, we found that team identification mediated these relationships. Thus, high-quality peer leaders succeeded in creating a shared sense of “us” in the team, and this team identification in turn generated all the positive outcomes. To conclude, by sharing their lead and empowering the peer leaders in their team, formal leaders are key drivers of the team’s effectiveness, while also enhancing team members’ health and well-being.

- **Is "turning off" the solution? The influence of boundary management preference on work–nonwork balance policy effectiveness.**  
Nicolas Mueller & Regina Kempen

In the modern workplace, employees face many challenges managing the increased blurring of work and nonwork life. Consequently, several organizations have implemented work–nonwork balance policies designed to limit work-related communication outside official working hours. The purpose of our study was to investigate the influence of individual boundary management (BM) preferences on such work–nonwork balance policies’ effectiveness. Specifically, we examined the effects of a communication restriction policy on policy satisfaction, affective organizational commitment, and emotional exhaustion. Investigating the effectiveness of work–nonwork balance policies is particularly relevant against the backdrop of expected long-term increases in telework arrangements due to the COVID-19 pandemic and the blurring of work and nonwork life.

Theories on BM suggest that people differ in whether they prefer to segment or integrate work and nonwork life (i.e., BM preference). Segmentation and integration preferences are neither good nor bad per se, but the fit between individuals’ preferences and environmental supplies concerning BM (i.e., BM supply) determines the outcomes. Based on person–environment fit theory, we hypothesized that the interaction between the communication restriction policy (i.e., a segmentation supply) and the individual BM preference predicts perceived BM fit, affecting individual outcomes.

We conducted an online vignette study and analyzed data from  $N = 257$  participants with moderated mediation analyses. Vignettes presented short descriptions about hypothetical home office situations and an organizational work–nonwork balance policy. We manipulated the intensity of work-related communication restriction, communicating either no restriction, medium restriction (on weekends), or high restriction (on

weekends and weekdays from 7 p.m. to 7 a.m.). After assessing individual BM preference, we instructed participants to read one of the vignettes and rate perceived BM fit and the outcomes as if they were in the described situation.

Our findings demonstrate that the effects on policy satisfaction, organizational commitment, and emotional exhaustion are mediated via perceived BM fit. Individual BM preference moderates these indirect effects. Specifically, restricting work-related communication is only beneficial to employees preferring segmentation. By contrast, employees who prefer integration do not benefit from the policy; they may even experience disadvantages.

Research limitations result from the cross-sectional nature of our data and the hypothetical vignette situations and outcomes. However, the experimental method allows causal inferences on the effects of organizational policies.

Regarding research implications, this study underpins the theory on person–environment and BM fit by applying an experimental and moderated mediation design to BM research. Our findings might encourage organizations to become proactive in supporting work–nonwork balance by introducing new individualized policies or implementing customized interventions. Organizations should aim to increase BM fit as the key driver of work–nonwork balance policies’ success.

- **Heteronormativity institutionalisation: Understanding its functioning in organisations.**  
Sara Corlett; Donatella Di Marco; Lourdes Munduate & Alicia Arenas

This research aims to know how heteronormativity manifests and how it is reinforced in the workplace, as a first step to understand its effects and in order to be able to create inclusive environments for gender and sexual diversity. It adds coherence to the definition of heteronormative environments allowing future research to better identify heteronormativity in the workplace and to delineate its impact.

Existing literature indicates that heteronormativity is present in the workplace and that it has an impact on both employees and people who are exposed to organisations (e.g. clients, customers, users). Heteronormativity represents a set of norms regarding gender and sexuality that privileges heterosexuality presenting it as a normality standard (Warner 1993). These norms stem from a binary conception of sex (i.e., male/female), gender (i.e., man/woman), and sexuality (i.e., heterosexual/homosexual) consisting of the idea that there are only two opposite genders, which are aligned with their biological sex and are ‘naturally’ attracted to each other (Kitzinger 2005). Under this assumption, men and women are expected to perform in stereotypically masculine and feminine ways, respectively (West and Zimmerman, 1987). Mentioned expectations likewise shape the limits of normality in relationships between men and women and those that are formed between individuals of the same gender (Rumens 2008; 2011; 2012). When these behaviors are daily reproduced and repeated, they become ritualised and are granted a benchmark status of what is ‘natural’ or normal (Butler 1999). Therefore, heteronormativity establishes what is normal to expect from people

who are assumed to be heterosexual males or females, situating those who deviate from the norm as ‘Others’. This belief system existing in our society is mirrored and institutionalised in the organisations that constitute it (Yep, 2003). Indeed, binary views of gender and sexuality are reinforced through institutional structures, daily social interactions, and individual decisions (Ward and Schneider, 2009), and organisations are a good illustration of this functioning. Research has exposed the impact heteronormativity has on people who do not align with heteronormative ways of being, showing that it has the potential to limit career opportunities (Drydakis 2015; Rumens and Broomfield 2014), reduce engagement and performance (Collins and Rocco 2018; Neary 2016), and harm individuals' well-being (Baker 2014; Priola et al. 2018). These findings may be suggesting that heteronormativity in the workplace has a deleterious potential and that it should be addressed.

In order to cover our research goal, we conducted a scoping review. Following an a priori research protocol, we systematically analyzed 74 articles that met inclusion and exclusion criteria.

The reviewed evidence revealed that heteronormativity manifests at organisational, interpersonal, and individual levels. At an organisational level, space is arranged in a gender- binary fashion and is aimed at a heterosexual audience; policies display binary notions of sex/gender reflecting heteronormative cultures and emphasise what are the standards to be followed in terms of gender and sexuality; and leaders monitor the accomplishment of heteronormative policies. At an interpersonal level, individuals in organisations may address coworkers or users assuming their (heterosexual) sexuality or gender based on gender expression; mark and expose those who do not follow heteronormative logics; and conceive acceptable only those relationships that conform with heteronormative models of human interaction. Individuals in the place of work, in turn, may assimilate heteronormativity by coming out endorsing discourses of normality and non-normality with respect to sexual minorities; putting efforts into burrowing their sexuality by, for example, overperforming in their jobs; and adopting aesthetics, discourses, and body performances that sustain the presumption of their heterosexuality and communicate gender conformity.

This work has some limitations related to the cultural context in which the majority of the studies are situated (i.e., Western countries) and to the qualitative nature of most of the included studies, which do not allow for a generalization of the results.

It has made for a more delimited understanding of the reinforcement of heteronormativity and it provides the basis for the development of instruments capable of measuring it in organizations. In addition, it provides insight into the direction in which the creation of inclusive organizations may be headed.

Going beyond eliminating discriminatory behavior towards sexual and gender minorities, it intends to detect organizational and interpersonal mechanisms that generate exclusion on grounds of gender and sexuality and proposes alternatives to such mechanisms.

- **Revisiting the frequencies of health behavior barriers & facilitators in the workplace.**

James P. Loveless; Alexander T. Jackson; Joseph J. Mazzola & Sarah E. Tucker

As of 2018, 42.4% of US adults aged 20 years or older were considered to be obese, thus representing a 6.7% increase in prevalence since 2008 (Hales et al., 2020). Contributing to this growing morbidity is a failure of individuals to consistently engage in health promoting behaviors around exercise and nutrition (Goode et al., 2018). Increased attention has been paid to the role of workplace environment in mediating the relationship between individual intentions and actual behavioral engagement (Mazzola et al., 2019). Recent work in this area has identified several specific workplace-related factors, which seem to function as common barriers and facilitators of behavioral engagement in healthful exercise and nutritional behaviors (Mazzola et al., 2017). In this study, sought to examine the frequency of barriers and facilitators using the framework established by Mazzola et al. (2019).

Data were collected from 228 working professionals using email delivered daily diary surveys across a 5-day period during the work week. These surveys included checklists of barriers and facilitators of healthful nutritional and exercise choices that were derived from earlier work (Mazzola et al, 2019; 2017).

The frequencies of barriers and facilitators of engagement in exercise and good nutritional behaviors were quantified across the entire workweek. Among exercise barriers, lack of time, heavy workload, fatigue, and temptations to remain sedentary were among the most frequent. While prior planning, time available for exercise, perceptions of feeling healthier, and appreciation of making healthy decisions were the most frequent exercise facilitators. The most frequent barriers to good nutritional behaviors included lack of time, temptations to eat poor quality foods, workload, and poor perceptions of self-control. Finally, the most frequent facilitators of good nutrition were prior planning, enjoyment of eating healthfully, perceptions of feeling healthier, and having knowledge of what constitutes healthful eating.

These data were collected in two waves. The first wave of data collection occurred right before the COVID-19 pandemic hit the United States. The second wave of data collection occurred in the Fall 2020, when the pandemic had already impacted many workplaces. Therefore, our results should be interpreted within this broader context.

Many of the frequent barriers and facilitators of exercise and healthful eating that have been observed in previous work (Mazzola et al., 2019; 2017), were observed in the present study. Unlike the previous studies, however, temptation to remain sedentary emerged as frequent barrier to exercise. These data further demonstrate that both personal and environmental workplace factors seem to be represented among the barriers and facilitators of health behaviors of working professionals. Organizations should work to reduce barriers and increase facilitators for the benefit of their employees.

To our knowledge, this is the first study to examine the frequencies of barriers and facilitators of healthy choices at work using the framework established by Mazzola et al. (2019).

- **Training, voluntary turnover, and firm financial performance.**

Kyle Steinsapir & Agustín Molina

Despite the importance of organizational practices promoting human resource development (HRD), research on training and organizational-level outcomes is predominantly built upon evidence collected using subjective measures and cross-sectional designs. Moreover, this line of research has mostly focused on general overall indicators of HRD, rather than addressing different dimensions of HRD which may help researchers and practitioners better understand the complexity of the HRD-performance link. Furthermore, previous studies have focused on uncovering simple positive direct relations between training and firm performance, whereas little attention has been given to the intricacies within such direct path. This study aimed to cover the aforementioned limitations utilizing an objective measures approach to training, organizational commitment and financial performance. Our main goal was to examine the effect of employee exposure to HRD and resource investment in HRD, on voluntary turnover. We also examined resource investment in HRD as a moderator of the link between employee exposure to HRD and voluntary turnover. Additionally, we examined the conditional indirect effect from employee exposure to HRD, to organizational financial performance, through the mediating role of voluntary turnover.

Several studies suggest that HRD (as single-facet variable) is positively associated with organizational commitment and performance, as well as enhanced levels of employees' knowledge, skills, and abilities. However, HRD is multifaceted and its core feature —training— cannot be captured by a single construct. We build upon Sung and Choi's (2014) multiple dimensions model of HRD, which includes a distinction between two quantitative dimensions: resource investment in HRD and employee exposure to HRD. The former refers to the actual amount of monetary expenditure a firm invests in training, whereas the latter refers to the amount of training hours to which employees are exposed to. We developed our hypotheses through the lenses of the organizational support literature and the job demands-resource model, which have been used to untangle the effects of training practices. These frameworks provide strong empirical evidence supporting the role of training, but this evidence is characterized by the use of self-reported variables (e.g. job satisfaction, commitment, engagement, intention to quit), rather than objectively measured organizational-level outcomes.

We tested our proposed moderated mediation model using objective firm-level data collected at three points over a three-year period, from a sample of 72 Chilean firms, representing a wide variety of industries. The data was collected by a non-profit organization between 2017 and 2019, following the recommended ethical guidelines. To test our hypotheses, we controlled for company size and industry sector.

We found evidence that employee exposure to HRD was negatively related to voluntary turnover and—indirectly—positively related to firm financial performance. Additionally, we found that these effects were amplified when the moderating variable—resource investment in HRD—was high.

The main limitation of this study is the sole focus on training practices. Future studies should consider adding other people management practices related to voluntary turnover and firm financial performance.

This research addresses two relevant organizational outcomes in the same study, while also examining the interactive and differential impact of two distinct dimensions of HRD in predicting voluntary turnover, therefore providing practitioners with clearer insights on the management of HRD in order to reduce voluntary turnover and its associated financial costs. We do so by utilizing a three-wave longitudinal research design and objective measures for every variable included in the study, thus also contributing to the SHRM literature by complementing its findings, which are predominantly built on subjective measures and cross-sectional designs.

This study adds value to the literature by utilizing a three-wave longitudinal research design and an objective measures approach to replicate previous research findings, while also offering new insights about the conditions under which organizational training practices may impact voluntary turnover and, subsequently, firm financial performance. Noteworthy, this is the first study to examine the interactive effect between employee exposure to HRD and resource investment in HRD, opening up new and important avenues for future research.

- **To tell or not to tell? A digital self-test to support an informed disability disclosure decision at work.**  
Jana F. Bauer; Veronika Chakraverty; Anja Greifenberg & Mathilde Niehaus

Because many disabilities and chronic health conditions are invisible, those affected often face the difficult decision of whether or not to disclose at work. Employees with chronic conditions need to weigh up possible positive consequences, such as receiving workplace adjustments, social support, and the relief of being authentic against potential harms like social exclusion, missed out promotions, or assignment of less rewarding job tasks (Beatty & Kirby, 2006; Munir, Leka, & Griffiths, 2005; Santuzzi et al., 2014). Anticipating whether any of these consequences will occur is not easy as it depends on a variety of contextual factors, i.e. characteristics of the health condition, organisational culture, or relationships with colleagues and supervisors (Beatty & Kirby, 2006; Munir et al., 2005; Schrader, Malzer, & Bruyère, 2014). In consequence, many affected employees feel overwhelmed and unable to make the “right” decision (Santuzzi et al., 2014). While a number of support services are available, seeking in-person counselling already requires some form of disclosure which may be a barrier for some. Therefore, the main purpose of the present project is to create easily accessible support in the form of a website featuring an evidence-based interactive self-test. In addition, we collect data that will offer new empirical insights into the (non-)disclosure decision-making process and its consequences.

We build on expectancy-value theories (e.g., Ajzen, 1985) which propose that decision-makers consider positive and negative consequences of a decision and evaluate the likelihood with which these consequences may occur to decide for an action. To well capture all relevant aspects, we conducted a literature review of past theoretical models and empirical findings. To ensure target group orientation and usability of the self-test we chose a participatory approach: an advisory board with important stakeholders and an “expert panel” of employees with chronic conditions supported the development process.

The self-test facilitates the decision-making process by presenting questions that help users reflect on factors that influence outcomes after (non-) disclosure (e.g. organizational culture, relationship with supervisors, accommodation needs or stigma associated with the chronic condition). It also helps reflect on individual values and needs that affect how users evaluate potential outcomes. After finishing, users receive an automated individualised feedback on how the factors assessed in the self-test influence the likelihood of potential outcomes in their specific situation. They are also directed to additional resources such as in-person counselling and a variety of worksheets (e.g. how to prepare for a difficult conversation). After completing the self-test, users are invited for a follow-up survey six months later.

At T1 the self-test collects data on the factors that – according to existing research – influence potential outcomes of (non-)disclosure and thus are relevant for the disclosure decision-making process. The follow-up survey at T2 provides data on the actual disclosure decision, satisfaction with the decision, the (non-)disclosure strategies and (non-)disclosure outcomes. We want to investigate whether T1 data predicts (non-) disclosure and its consequences at T2 in the expected ways. In addition, we aim at identifying the most important predictors of positive and negative (non-)disclosure outcomes and satisfaction with the decision to further improve the self-test.

Our data does not allow any conclusions about whether the use of the self-test promotes decisions with more favourable outcomes and higher satisfaction.

Past disclosure research relied mainly on retrospective data collection to investigate the factors contributing to the disclosure decision. Besides the retrospective character of the data another shortcoming of the current research is, that it is very hard to reach participants that have decided against disclosure. The self-test on the contrary only includes those that have not disclosed yet. Thus, the data collected provides in-situ information from the initially non-disclosed on the complex disclosure decision-making process and its consequences, including the decision to stay non-disclosed. The (non-) disclosure of disabilities or chronic conditions at work has far-reaching consequences for the health and workability of affected employees. The interactive web-based self-test offers easily accessible support for those who are not (yet) ready for personal counselling and supports them to make a better-informed decision.

Unlike other existing offers, the self-test is interactive, considers user’s specific situation, and provides individualised feedback. It is designed to empower users to make an informed decision that fits their situation and encourages them to seek counselling if needed. It thereby fosters the use

of existing support structures that help to adequately address the needs of employees with disabilities or chronic conditions at work and to keep them in the workforce.

- **Understanding the value of sector: A view on sector-bias in recruitment activities.**  
Liza Walter-Nelson; Joanna Yarker & Rachel Lewis

The research aimed to understand whether the sector in which an individual worked, had a negative impact on their ability to move around the labour market, between sectors. It was a subject worth following given the current state of the labour market following both economic difficulties, the as-yet unknown full implications of Brexit on the UK workforce and the recent global pandemic (Covid-19).

Mobility in the labour market, the movement of staff between roles and industries, is needed for a vibrant economy. The differences between the public and private sectors appear to be reducing; with changes in governance (UK Corporate Governance Code) and continued effects of austerity (OECD), the UK's civil service is at its smallest since the Second World War. To avoid upturns in unemployment, individuals will need to seek work in various sectors and industries. However, mobility in both the private and public sector are close to their lowest in almost 30 years (Cribb & Sibietta, 2015a). Are the two sectors so different that people just cannot transition? Or are there similarities that could support the movement between the public and private sectors? There is a propensity to focus on the differences between the sectors within the literature, particularly so in the grey literature. This narrative of difference may have far-reaching implications, and specifically, could impact the perceived suitability of individuals moving from one sector to another. With an alleged 7.4 seconds given to scanning CVs in the recruitment industry (Ladders inc., 2018), keywords, including sector, maybe being used to 'rule out' what could be good hires, highlighting a presence of 'same-as-me' bias.

This systematic literature review (SLR) builds on Boyne's work in 2002, following several workplace changes since the start of the century, to examine the differences and similarities in values, behaviours and attitudes.

This SLR identified 5331 studies, of which 12 studies across 11 countries met the inclusion criteria of being based within OECD countries, dated after 2002, published in peer-review journals and had a focus on staff attributes. These were narratively synthesised. Attention was paid to exclude those which focused on a moderator (i.e., a Union) and military studies. Staff attributes were the focus as these, rather than processes for example, as this is about understanding people's mobility across sectors.

The results show a mixed picture still in terms of differences and similarities across sectors, and several questions for recruitment practices. This review helps us understand the extant literature, demonstrating that a mixed view remains regarding perceived or actual differences between

public and private sector workers; there is no single agreement. However, a view that there are absolute distinctions to be drawn between these two sets of workers appears to persist in the grey literature used frequently by those in the recruitment sector.

The terms 'values' and 'behaviours' are used inconsistently and were found in this SLR to be measured in at least 18 different ways (reviewing the scales used). Regarding the values or behaviours of Lawfulness and Accountability, there were studies showing both similarities and differences across sectors. The consistent areas were in similarities across sectors for Honesty and Transparency. Consistent differences were found for Innovative/Imaginative and Profitability (as a driver for behaviour), where in both cases, this was more prevalent within the Private sector.

This review's main limitation is the small number of studies meeting the inclusion and exclusion criteria, and the criteria used did not specifically connect to the impact of perceived differences or similarities, particularly on recruitment processes.

The studies included in this review are predominantly survey-based, with just one qualitative interview. However, survey items do not demonstrate what these values, behaviours, or attitudes mean for decision making and the impact of those decisions. The decisions made in recruitment and selection impact the move between sectors, or not, for those looking to change.

It is essential to understand the recruitment processes as they might drive limitations in the talent pool for any one sector, where there is a belief that significant differences exist, and as such, recruitment professionals apply a broad initial screening of candidates based on sector. Practitioners may find themselves using 'values' 'behaviours' and 'attitudes' interchangeably, and there may be no consequence to this, or this may be having an impact on recruitment and selection practices in terms of both interview questions (is values-based values-based) and exercises or 'tests' designed at highlighting behaviours (again, is that really what is coming through).

- **European Social Survey (ESS) – a useful dataset for organizational psychologists.**  
Aurelija Stelmokienė

The main goal of the presentation – to introduce ESS as a useful dataset for organizational psychologists both scientists and practitioners with reference to Lithuanian project team experience.

The European Social Survey (ESS) is an academically driven cross-national survey. Every two years, face-to-face interviews are conducted with newly selected, cross-sectional samples across Europe. Each such data collection is named as a Round. Till now data from 9 Rounds is available on official website. ESS data is collected using the highest methodological standards. The survey measures the attitudes, beliefs and behaviour

patterns of diverse populations in more than thirty nations. The ESS questionnaire consists of a collection of questions that can be classified in to two main parts - a core section (the same in all Rounds) and a rotating section (the new and repeated issues in different Rounds).

ESS can be interesting to organizational psychologists for two main reasons: as a useful high quality dataset and a platform to propose organizational psychology topics. Social researchers from different fields have been publishing scientific and popular articles based on the cross-national European Social Survey since its establishment in 2001. Two areas of the core section could be interesting to organizational psychologists, as well: subjective well-being and human values. Moreover, in 2021 Round 10 special rotating section is dedicated to digital social contacts in work and family life which identifies different dimensions of digital social contact and analyzes determinants (e.g. social inequalities) and consequences (e.g. work-life balance, well-being) of it.

In 2022 call for Round 12 rotating section should be announced. Multi-national teams will be invited to apply for the opportunity to design a rotating section addressing a topic of academic and or policy relevance across Europe. International community of organizational psychologists could make its proposal, as well.

ESS data is available free of charge for non-commercial use. ESS creates new possibilities from a European country-comparative perspective for multivariate analyses of organizational phenomenon. It can also help to define the country macro context for your research or practical tasks. You can use rich dataset based on citizens' perceptions and judgements of key aspects of their societies or already prepared compilations of findings in ESS Topline Series (available indifferent languages). You can also propose your topic worth of the research in cross-national context.

- **Prognostic model of organizational commitment: universal or specific by sector?**

Aurelija Stelmokienė

With reference to job demands-resources theory (Bakker, Demerouti, 2014, 2017), job resources are related to positive employees' attitudes and job demands – to health impairment (BakkerDemerouti, 2018). In our research job resources were defined as factors that should enhance organizational commitment. On the contrary, job demands were expected to act as risk factors for this positive attitude of employees (Ahmad, 2017). The main aim of the research was to answer the question whether there were universal job demands and resources that predicted employees organizational commitment despite the sector (industry or service).

Organizational commitment is an especially sensitive question for organizations nowadays, therefore, evidence-based recommendations are welcomed in order to leverage employees' retention and productivity (Al-Jabari, Ghazzawi, 2019). It is important to test if recommendations for enhancement of organizational commitment can be generalized or should be specified by sector.

Three aspects of job demands (quantitative, emotional demands and work pace) together with three aspects of job resources (influence at work, possibilities for development, meaning of work) were evaluated by COPSOQ II (in 2018 Berthelsen, Hakanen, Westerland validated this questionnaire using job demands-resources model). Chosen job resources and job demands were related to job/ task characteristics. Short version of Meyer and Allen organizational commitment questionnaire was also used in the research. Two samples represented industry (405 respondents: 29 percent of females, 65 percent of males and 6 percent didn't indicate their gender) and service (242 respondents: 28 percent of males, 71 percent of females and 1 percent didn't indicate their gender) sector. Cross-sectional survey in both sectors was implemented in autumn 2020.

Results confirmed that service sector employees were more committed to organization in comparison to employees of industrial enterprise. Further analysis revealed that only meaning of work (job resource factor) significantly predicted organizational commitment of university employees. Organizational commitment of employees in industry sector was predicted by two job resources factors (possibilities for development and meaning of work) and one job demand (emotional demands) at work. Job resources acted as motivational factors and job demands as risk factors for organizational commitment.

It should be admitted that only two organizations (a producer of chemical products and a university) represented industry and service sector. Therefore, future research should be carried out to confirm the results in a broader range of organizations. Human resource managers should pay attention to the results and think about job redesign and job crafting interventions. Enhancement of subjective meaning of tasks at work should be set as a primary goal.

In our research, the prognostic model of organizational commitment was tested in different sectors. Besides, not only job resources, but also job demands were included in order to predict positive attitude of employees. Previous research underlined the separate motivational and health impairment processes while talking about job demands related to health problems and resources related to positive attitudes (Lusener, Guys, Wolter, 2019). Here, both motivational and risk factors for organizational commitment were determined.

- **Integrative model of work-family enrichment.**  
Aurelija Stelmokienė & Tadas Vadvilavičius

Work-family conflict is still a dominating topic in the research field of work-family interface (Greenhaus & Powell, 2006; Lapi-erre et al., 2018). However, for the last 15 years researchers have started focusing their attention on work-family enrichment, as well. Work-family enrichment refers to the extent to which re-sources (e.g., skills, emotions, experience) in one domain enhance the quality of life in another domain (Greenhaus and Powell, 2006; ten Brummelhuis and Bakker, 2012). Nevertheless the increasing number of work-family enrichment research,

theoretical background behind this phenomenon is still scarce. Work-family enrichment theories are incomplete or fragmented, that is why new, integrated models are required. The main goal of this study is to provide an integrative model of work–family enrichment.

A systematic literature review procedure was applied. One, database (Academic Search Complete (EBSCO)) was used for articles search using keywords combination: work-family enrichment OR work-family positive spillover OR life-work enrichment OR life-work positive spillover. The search was not limited by date of publication, research design or sample. Totally 145 full articles in English were found. The whole text of all 145 papers were analyzed. After eliminating repeating articles or the ones not analyzing work-family enrichment (only mention-ing), the final sample was left with 125 quantitative, qualitative, and theoretical papers. The first task was to identify what kind of theories were used to analyze and describe the mechanism of work-family enrichment. The second task was to identify antecedents (personal, family related and organizational) of work-family enrichment. Data from full articles was extracted manually and put in Excel table.

Twelve the most often used theories were identified and later grouped based on their similarities: 1) Work-family enrichment theories; 2) Systemic theories; 3) Resource-based theories; 4) Cognitive theories. Additionally, 44 different antecedents of work-family enrichment were identified and also grouped in broader categories. Finally, integrated work-family enrichment model was developed (see Figure I). Three main theoretical assumptions are presented as ones to broaden ten Brummelhuis and Bakker (2012) Work-home resource theory:

Assumption #1 – person`s cognitive work-family boundaries are important moderators: if person has strict boundaries that do not allow work and family to interact, the interaction between work and family is close to zero (e.g., Vaziri et al., 2020; Junker et al., 2020);

Assumption #2 – person`s self-efficacy mediates the relationship between resources and demands from different life domains, e.g., resources at home and demands at work and vice versa. Higher self-efficacy leads to higher level of resources and ability to transfer them when needed (e.g., Heskaiu & McCarthy, 2020);

Assumption #3 – higher social support from significant memebers at work and family leads to higher level of resources. A person always interacts with other people in his/her domain and these people, e.g., family members, can give additional resources to handle demands in other domain, that is why, systemic approach is needed.

This integrated work-family enrichment model is the first that presents persons` cognitive boundaries between work and family and self-efficacy as two and probably the most important personal characteristics related to work-family enrichment. Based on previous research ideas it is believed that in order to experience higher work-family enrichment flexible work-family boundaries are needed. However, further research is needed, because more flexible boundaries may also lead to higher work-family conflict. Onthe other hand, higher self-efficacy may balance it or

even lead to only positive work-family interaction. Additionally, this model analyzes work-family enrichment as a systemic process taking into account the impact of other social actors to person`s perceived work-family enrichment.

The new integrated work-family enrichment model lacks empirical support, that is why future research is needed. Also, future model development should focus more on how does instrumental and affective work-family enrichment paths (presented in Greenhaus and Powell model) work. Practitioners who want to help employees to increase work-family enrichment, should 1) focus on enhancement of employees` self-efficacy related to work-family enrichment (as Heskiu and McCarthy (2020) revealed in their experiment); 2) work with the whole system (including workplace or family), not with a single person.

- **Systemic Leadership: Development and psychometric evaluation of the multidimensional systemic leadership scale (SLI-R).**  
Vera Simone Göllner; Sandra Sülzenbrück; Kai Externbrink & Christine Sutter

Although there are numerous leadership styles and consistent research in this area, numerous studies show the weaknesses in leadership culture. The systemic approach to the leadership concept seems to fit well into our modern complex and dynamic work environment, but little research has been conducted to define and assess it. The purpose of the research is therefore to describe the development and validation of a multi-dimensional instrument to measure systemic leadership as a novel approach to leadership behavior - the Systemic Leadership Inventory revised (SLI-R).

Leadership today is characterized by uncertainty, fast pace and change. Clear hierarchies and rigid leadership constructs, as they (still) prevail in most companies, lack the adaptability to respond quickly. Leadership theory must adapt to new perspectives that meet the complex adaptive requirements of organizations, and is more than a person or a skill - it emerges through dynamic interactions that are influenced by all members. All of these components are found in systemic leadership.

Based on a comprehensive literature review, 140 items were generated. In two cross-sectional online survey studies with time interval (N = 653; N = 658) employees from various professional backgrounds were assessed. A combined exploratory and confirmatory factor analysis approach was applied to investigate the construct validity of the measure, followed by an analysis of criterion-based validity.

A robust structure of 14 first-order dimensions and three second-order dimensions (Communication, Collaboration, Interdependence) with a total of 42 items was found. The systemic leadership scale revealed good internal consistency ( $\alpha = 0.973$ ) as well as evidence for construct and criterion validity.

There may be measurement errors due to external assessments. It is essential to include the leaders' perspective in future research. Drawing firm causal conclusions about predictive validity is impossible because our data were collected in two cross-sectional surveys. Future research should use longitudinal designs to verify this.

With the SLI-R, we now have a tool to determine the impact of systemic leadership on individuals and organizations. More and better empirically based evidence is needed to alert organizations to the need to adapt to the fast pace and complexity of our world today. Through the understanding generated by this research of what systemic leadership is, it may offer a valuable starting point for training and leadership development.

The SLI-R is the first measure where the underlying factor structure was developed and confirmed. It provides a clear picture of the key systemic leadership qualities and shows where improvements can be made on the individual and organizational level. It can be used in future studies to test the underlying premises of systemic leadership theory.

Video presentation is available by following this [link](#).

- **Thriving in the home office: The role of family-work affect, exploration and ambidextrous leadership.**  
Ajda Merkuž & Katarina Katja Mihelič

The world of work has seen many employees adapting to the dynamics of working from home in the past year. With this move of the office to home the factors enabling thriving at work, a psychological state where workers feel a sense of vitality and learning at work (Spreitzer et al., 2005), may have altered as well. Our research goal was to investigate through a moderated-mediation model how family and leadership promote agentic work behavior such as exploration, which consequently enables thriving while working from home.

This study is built on the theoretical premises of broaden-and-build theory (Fredrickson, 2004) and the socially embedded model of thriving (Spreitzer et al., 2005). We propose that family-work affect (which suggests that the crossover of positive emotions received from the family help individuals be a better worker (Greenhaus & Powell, 2006)) will help broaden attention and awareness (Fredrickson, 2004), motivating remote workers to try novel solutions to work challenges and engage in more exploration (Koçak & Agun, 2019). Individuals who engage in exploration are more willing to embrace new and unpredictable situations (Kashdan et al., 2004), and this will make them feel like they are learning, which will manifest in a state of thriving (Spreitzer et al., 2005). Ambidextrous leadership which flexibly switches between opening (experimentation, risk-taking, independent thinking) and closing (routines, corrective actions, sticking to plans) leadership behaviors (Rosing et al., 2011), is recognized as an important leadership practice during the pandemic (Atiku & Randa, 2021), and it stimulates exploration among

remote workers (Zacher & Wilden, 2014). The combination of a good mood due to the family and ambidextrous leadership support will build the contextual features needed for employees to explore, which in turn will enable thriving (Spreitzer et al., 2005) when working from home.

We conducted two studies to test our hypotheses. In study 1, we examined the mediation hypothesis. The sample comprised data from 169 business students who were involved in online studies. Following previous studies (Schaufeli et al., 2002), substitution of “studies” for “work” in the case of students is insufficient, as students are experiencing study demands, the same as employees’ work demands. Study 2 was based on 314 employees who worked from home during pandemic. Here we introduced ambidextrous leadership as a moderator (hypothesis 2) in the first stage of mediation. The measures used in both studies are reliable and have been previously verified (Kacmar et al., 2014; Kashdan et al., 2004; Porath et al., 2012; Zacher & Rosing, 2015). Hypotheses were tested with the PROCESS macro, using 95% bootstrap confidence intervals (Hayes, 2019).

Study 1 confirmed H1 ( $\beta=0.12$ , 95% CI=[0.06,0.18], meaning that those who experienced more family-work affect will engage in more explorative behavior and consequently thrive more. Study 2 reconfirmed the results for H1 ( $\beta=0.04$ , 95% CI=[0.01,0.09]. Testing H2 in study 2, the results showed that when remote workers have highly ambidextrous leaders, they become more explorative along with experiencing positive emotions from their family ( $\beta=0.14$ ;  $p<0.01$ ). Conversely, when remote workers have leaders who exhibit low levels of ambidextrous leadership, they engage in exploration less. The index of moderated mediation (0.06; 95% CI=[0.01,0.11] provided evidence that for remote workers who experience higher levels of ambidextrous leadership behaviors from their leaders the indirect effect increases.

Our research contributes to the thriving literature by introducing family-work affect as novel predictor of thriving. Secondly, the research answers calls to measure family-work affect as a construct (McNallet et al., 2010). Thirdly, we introduce ambidextrous leadership to the field of thriving and family-work interface (Gerlach et al., 2020) and explore how leadership practices might promote thriving, as recently called for in the literature (Spreitzer & Hwang, 2019). Lastly, we posit our research in a novel remote work setting.

A limitation of our research is the cross-sectional design, so causality cannot be determined. To check the robustness of our findings we conducted two studies and in any investigation of a novel context across-sectional design is recommended for initial evidence (Spector, 2019) – in our case it was with participants who had previously not engaged in remote work, but worked from home due to the pandemic. The scales used are self-reported, and could produce common method bias. We addressed this by 1) reducing evaluation apprehension and 2) using a marker variable approach (Podsakoff et al., 2012).

HR professionals could prepare campaigns which showcase and promote family relationships in order to help employees become better workers, and do this by collecting stories throughout the company. Remote workers themselves could devote attention to observing how positive affective experiences from their families translate to a work context, i.e. by using journaling practices and conversations with significant others. In order

to facilitate thriving at work, we also suggest HR professionals introduce training and development for leaders on how to facilitate ambidextrous leadership behaviors.

- **Process vs. Content in performance management: How consistency and supervisor developmental feedback decrease emotional exhaustion indirectly via high-quality LMX.**

Isabeau Van Strydonck; Adeliën Decramer & Mieke Audenaert

Since Human Resource Management (HRM), and as such Performance Management (PM), is often criticized to endanger employees' health (Guest, 2017), this study investigates how the way in which PM is designed and implemented can also positively affect employees' health. More specifically, by integrating both its process and content aspects, this study investigates how PM consistency (i.e. the horizontal alignment between goal-setting, monitoring and evaluation; process) and supervisor developmental feedback (i.e. content) interact with one another in decreasing employees' emotional exhaustion, indirectly via the development of high-quality LMX relationships.

In line with the tenets of HRM system strength theory (Ostroff & Bowen, 2016) and relational leadership theory (Uhl-Bien, 2011), we propose that PM consistency is negatively related to employees' emotional exhaustion via the high-quality LMX relationships that are built through this consistent implementation process. Furthermore, we explore how supervisor developmental feedback acts as a boundary condition in determining the effectiveness of PM consistency on LMX-quality and, consequently, employees' emotional exhaustion.

The moderated mediation was tested with a sample of 189 teachers in Flanders, using a one-year time-lagged survey design. From October till December 2019, we measured teachers' perceived PM consistency and supervisor developmental feedback, as well as several control variables (gender, tenure, working hours and emotional exhaustion). One year later, we measured teachers' perceived LMX-quality and emotional exhaustion.

Data was analyzed using structural equation modeling. We found support for an indirect negative relationship between PM consistency and emotional exhaustion via high-quality LMX. Furthermore, we found a significant interaction effect with supervisor developmental feedback. Our results showed that PM consistency only affected LMX-quality and, consequently, employees' emotional exhaustion, when the feedback provided in such consistent PM process entailed a lesser developmental content. When employees already received a large extent of developmental feedback, the degree to which the PM process was characterized by consistency appeared to make no difference.

This study specifically focused on secondary school teachers (i.e. public sector). While this can be regarded as a strength, considering that most HRM research is built on evidence from private-sector employees (Knies et al., 2018), results could be replicated using samples outside the public sector.

Most employees deal with PM implemented by their direct supervisor. Nevertheless, implementing PM can be quite challenging, and might even endanger employees' well-being when not managed in the right way. Our findings suggest that, when the PM process is characterized by less consistency, supervisor developmental feedback can still act as a substitute for employees to develop high-quality LMX-relationships, and consequently to reduce their emotional exhaustion. This finding is valuable for practice, especially for organizations where PM consistency is more difficult to preserve (e.g. due to uncertainties/ambiguities in goals, or where employees' performance is more difficult to quantify and follow up/evaluate to the same extent). On the other hand, it can also be very difficult for supervisors to provide developmental feedback throughout the entire PM process, because they for example lack the knowledge or skills to do so, or because their span of control is too wide to pay attention to the professional development of each employee. Our results show that, in such case, planning, monitoring, and evaluating employees' performance in a consistent way is critical to enhance the quality of the LMX relationship, and consequently, to reduce employees' emotional exhaustion.

While its beneficial effects on satisfaction and performance outcomes are well established, this study is among the first to examine how PM consistency is also positively related to employees' health (i.e. less emotional exhaustion). By positioning LMX-quality as a mediator in this relationship, we add to previous studies that showed that LMX-quality functions as an important moderator in the relationship between PM consistency and employees' satisfaction and performance (Audenaert et al., 2019; Bauwens et al., 2019), by showing that it also serves as an important mechanism (i.e. mediator) connecting PM consistency with employee's health. Lastly, by studying how both PM consistency and supervisor developmental feedback interact with one another in affecting the quality of the LMX relationship, we address the call from Ostroff and Bowen (2016) to study HRM effectiveness in terms of both its process and content aspects.

- **"As your leader describes you, so you are": Leaders' high work expectations and performance of remote workers.**  
Diellza Gashi Tresi; Katarina Katja Mihelič & Ajda Merkuž

When leaders expect above average performance from employees, employees adapt to those expectations and their performance is enhanced. While Rosenthal's seminal study (1968) explored how teachers' high expectations result in children school grades, our research goal was to investigate how leaders' high work expectations are reflected in employees' work behavior, namely proactive behavior, social loafing and consequently individual task performance in a remote work context.

This study is grounded on the theoretical premises of the positive self-fulfilling prophecy (Merton, 1948) and more specifically the Pygmalion effect, which holds that the higher expectations of leaders regarding employee performance result in increased employee performance (Bezuijen, van der Berg, van Dam, Thierry, 2009, Livingston, 1969, McNatt, 2000, Veestraeten, Johnson, Leroy, Sy, & Sels, 2021). Building on this, we propose a conceptual model where, first, high performance expectations from the leader as perceived by the employee will increase employee

proactive behaviors and consequently increase employee performance. Leader expectations may be particularly important for employees who are separated from leaders and might lack prior preparation for working out of the office. Thus, leader expectations will help employees with being clear on what their responsibilities are. When employees who are working remotely perceive that the leader expects high performance from them, they will engage in self-initiated behavior to solve problems at work as part of their in-role behavior (Crant, 2000), which in turn results in improved task performance.

Second, we propose another path which highlights that high performance expectations will decrease employees' social loafing behaviors (a behavior which happens when individuals expend less work effort when they form part of a group than they do when working individually (George, 1992)). In a remote work setting, employees may refrain from social loafing in their wish not to disappoint their leader. Social loafing in a remote setting will in turn be negatively related to task performance.

The proposed conceptual model was tested with Structural Equation Modelling and a two-step procedure (i.e. a measurement and structural model) was employed. The MPlus program was used with data from a sample of 314 fully-remote workers from UK. The measures used were reliable and have been previously verified (e.g. Jacobsen & Andersen, 2019, Schippers, 2014, Seilbert et al., 2001, Williams & Anderson, 1991). Goodness-of-fit indices for the structural model indicate a good model fit ( $\chi^2=475.216$  (df=226;  $p=0.000$ ); CFI=0.92; TLI=0.91; SRMR=0.06; RMSEA=0.06).

The results confirmed H1, which stated that high performance expectations from a leader are positively related to employee proactive work behaviors ( $\gamma = 0.32$ ,  $p < 0.00$ ). H2, which proposed that high performance expectations from a leader are negatively related to employee social loafing, was also confirmed ( $\gamma = -0.37$ ,  $p < 0.00$ ). The results also supported H3, which states that proactive work behaviors are positively related to employee task performance ( $\gamma = 0.15$ ,  $p < 0.01$ ). Finally, H4, which proposed that social loafing is negatively related to task performance, was also supported ( $\gamma = -0.37$ ,  $p < 0.00$ ).

Our research contributes to the literature on the Pygmalion effect. While this phenomenon has been studied in settings such as training and employee learning, it appears to be understudied in a remote work setting. Additionally, proactive work behavior and social loafing have previously not been directly related to high leader expectations regarding employee performance. Further, we tested social loafing on workers who were working remotely for the first time, and to the best of our knowledge this is the first study to do this.

This research is not without limitations. Firstly, the cross-sectional design limits the ability to determine causality. However, this research design is recommended when investigating a novel context, such as ad hoc transitioning to exclusively remote work during the second wave of the pandemic, in order to gather initial evidence (Spector, 2019). Secondly, the scales were all self-reported, and thus could produce common method bias. We addressed this by reducing evaluation apprehension, but would recommend leader ratings be used in future studies.

In terms of the implications for practice, leaders could communicate high expectations through personalized meetings and management by objectives. They could also motivate employees to believe that they have what it takes to meet these expectations. Managers could also monitor their employees and provide them with regular feedback on their development.

- **Motivational aspect of work engagement.**

Elena Rodionova; Vladislav Dominiak & Andrey Kuzmin

The aim of our research was to study the relationships of employee's esteems of organization motivational possibilities with their work engagement. We hypothesized that the level of work engagement is related to the employee's esteems of organization motivational possibilities. One of the goals of this presentation is to introduce our methodology for assessing the motivational possibilities of an organization.

Topicality: The current economic situation dictates the need to find effective non- material ways of increasing employee performance, commitment and work engagement.

The theoretical basis of the research, on the one hand, relies on the concept of work engagement by W. Schaufeli and A. Bakker, who defines it as "...a positive, fulfilling, work-related state of mind that is characterized by vigor, dedication, and absorption" (Schaufeli & Bakker, 2010; Schaufeli, Salanova, Gonzalez-Roma, & Bakker, 2002, p. 74). On the other hand, we used our own concept of the possibility of realizing motives, developed for organizational loyalty prediction (Dominiak, 2006).

We relied on W. Schaufeli and A. Bakker work engagement concept (2003) and used the "Utrecht work engagement scale". To measure esteems of organization motivational possibilities, we used "The possibility of realization of motives" (PRM) method (Dominiak, 2006; Rodionova, 2013).

The study involved 140 employees of various organizations with at least six months of current working experience. The sample comprises of 37% men and 63% women, The age range is from 18 to 47 years old. They have secondary (37%) and higher education (63%), 73% are specialists, 27% are managers. We used correlation and multiple regression analysis.

We found significant correlations of the PRM indicator as a whole with vigor, dedication and absorption. Multiple regression analysis shown the contribution of PRM's estimates to individual factors of engagement. The inclusion of all motives in the regression model allowed us to explain 42% of the variance of vigor, 70% - dedication and 36% - absorption. The greatest contribution to work engagement is made by the next

PRMs: satisfaction from the work process, a sense of one's own usefulness, serving people, respect from others, social prestige, the possibility of self-realization, a feeling of freedom, a feeling of success, and an increase in one's own professional competence.

It should be noted that there was no correlation between indicators of engagement and sense of stability, material wealth and satisfaction of non-work interests. Thus, the opportunities in the organization increase employees effort into work and resistance to work difficulties. Work engagement does not depend on such motives as material wealth and sense of stability, which dispels the myth of the exceptional importance of monetary incentives. It important to take these regularities into account when building personnel incentive systems. The dedication depends more from the environment and prospects than from the employees personality characteristics, in contrast to vigor and absorption.

The limitation of this study is, first of all, its correlation nature. A more sophisticated model that includes other organizational variables is required and needs to be validated using structural equation modeling. Implication: From a practical point of view, the use of esteems by employees of the motivational possibilities of an organization allows not only to predict employee engagement, but also provides grounds for making management decisions aimed at increasing it.

In addition to practical application, the use of employees' esteems of the organization's motivational possibilities allows us to broaden our view of the correlates of work engagement, and also expands the toolkit of job crafting.

- **The effects of media and technology on cognitive control.**  
Hossein (John) Majoubi; Ken Paap & Diana R. Sanchez

Organizations are increasingly integrating various forms of technology into their regular functioning of their organization such as wearables, mobile devices, and automated systems. There is increasing evidence that digital multitasking using various forms of media & technology (e.g., television, social media, smartphones) can have a range of positive and negative effects on task performance and learning. While the cognitive processes such as visuo- spatial reasoning and task switching that accompany these effects are starting to be understood, the evidence that they occur in real job performance and learning contexts is mounting.

According to Cognitive Load Theory, individuals only have a limited amount of mental bandwidth for handling a particular task (Sweller, 2011). When individuals are inundated with information, such as handling multiple forms of technology at once, this can increase the cognitive load and decrease productivity and functioning. Our goal is to further explore this question to understand the impact of multitasking, media devices and performance outcomes.

Executive Functions (EF) consist of a set of general-purpose control processes that are central to the self-regulation of thoughts and behaviors and that are instrumental to accomplishing goals and behaving in one's long-term best interests (Miyake et al., 2000). While personality assessment (e.g., the five-factor model) is an important metric in predicting career success, EFs specific to goal orientation, problem solving, time management and task switching are vital aspects of life and career advancement. Various studies have pointed to the lack of focus on the importance of executive functioning on performance, especially in leadership and management skills (Balconi et al., 2020). Thus, technology and media engagement habits may be an important variable in choosing personnel.

Participants (n = 128) were recruited from Amazon Mechanical Turk and a University in the Western United States. The study consisted of a survey collecting demographic information, social media use, general technology habits and measures of cognitive processing (e.g., task switching, executive function, selective attention; Baron-Cohen et al., 2011; Hou, 2019; Rosen et al., 2013; Tangney et al., 2004).

The results indicated that technology use was negatively correlated with self-control in that higher use of technology was associated with lower levels of self-control,  $r = .50$ ,  $p < .001$ . Further examination using stepwise regression showed that the most substantial predictors of cognitive load and cognitive control were texting habits, smartphone usage, and social media activities. More specifically, we found that media multitasking, using two or more digital devices simultaneously, was a significant predictor of deficiencies in self-reported measures of self-control. General media use remained robust as a predictor of self-control deficits after controlling for media multitasking.

Video presentation is available by following this [link](#).

- **Understanding perceptions of feedback: Comparing ratings on feedback from an AI versus a human.**  
Mahsa Norouzi & Diana R. Sanchez

This study examined individuals' responses in terms of trust, source credibility, interpersonal justice, and feedback quality to AI as the source of feedback as well as the moderation effect of type of feedback. In this study, participants completed a situational judgment test in which they select the most effective and least effective responses to multiple workplace scenarios. They received either objective or subjective feedback from either an AI rating system or a human rater. The content of feedback held constant. Participants' evaluations of the source of feedback revealed that the human rater was considered as a more trustable source only when the type of feedback was subjective, and there was no difference between their trusting intention between AI and human rater when the feedback was objective. In addition, there was no significant difference between AI and human rater in terms of source credibility, interpersonal justice, and feedback quality regardless of the type of feedback. This potentially reveals that objective feedback may lead to more positive perceptions and intentions towards using AI as the source of feedback.

- **Examining leadership and employee wellbeing during the COVID-19 pandemic.**  
Nishat Babu; Luke Fletcher; Shaun Pichler & Pawan Budhwar

Employees across the globe are suffering from greater mental distress in the wake of the Covid-19 pandemic (Sibley, Greaves, Satherley, Wilson, Overall, and Lee et al., 2020). Research suggests that trust in leadership “may be particularly important in times of challenge and adversity” (Dirks, 2006; p. 20), as well as uncertainty (Norman, Avolio and Luthans, 2010); and can help to maintain employee wellbeing (Inceoglu, Thomas, Chu, Plans, and Gerbasi, 2018). It is therefore critical to understand the role of trust in leadership and the implications for employee wellbeing during the highly uncertain and challenging times predicated by the Covid-19 pandemic. The contextual relevance of line management’s servant leadership as well as country differences are further explored.

Using Conservation of Resources theory (COR – Hobfoll, 2002, 2011), we propose that trust in the senior leadership team’s (SLT) response to the pandemic is an important resource for employees during times of uncertainty, serving to reassure employees about the actions the organization is taking in order to deal with the pandemic effectively. This protects employees from resource-loss as well as facilitating the gain of additional (personal) resources in the form of psychological capital (PsyCap): a ‘resource caravan’ as per the COR theory. PsyCap provides employees with personal resources to cope with their pandemic-induced work circumstances, preserving their wellbeing. In addition to this, we suggest that servant leadership (a ‘resource caravan passageway’) of the line manager is an important condition resource, which combines with trust in the SLT’s response to create a resource-rich context, and reinforces the positive effects of the latter on PsyCap. However, in line with culturally-endorsed implicit leadership theory (Brodbeck, Hanges, Dickson, Gupta, and Dorfman, 2004), we propose that line management’s servant leadership is more aligned with leadership prototypes in the UK versus India, and will therefore be more effective – in terms of strengthening the effects of trust in the SLT’s response on PsyCap – in the UK.

Using a time-lagged survey design, participants across the UK (N = 210) and India (N = 212) were sampled towards the start of the first-wave (2020) pandemic restrictions (early April – time 1), three weeks later when participants were considered immersed within the constraints of the pandemic (late April – time 2), and finally when restrictions were beginning to ease (August – time 3).

Our findings indicate that trust in the SLT’s response to the pandemic serves as a key resource which encourages additional resource accumulation in the form of PsyCap. This resource-gain helps employees to protect their well-being during the unusual work circumstances predicated by the Covid-19 pandemic. This however did not transpire for the Indian sample. Our results further indicated that the positive effects of trust in the SLT’s response on PsyCap were strengthened when line management’s servant leadership was high, but again only in the UK. In India, results indicated that servant leadership in and of itself may be more important.

In the current study, variables were measured across three time points, in a time-lagged design. However, while this might minimize the risk of common method bias (Podsakoff, Mackenzie, Lee, and Podsakoff, 2003), it cannot establish firm causality which requires measurement of all variables across all time points (Taris, Kessler, and Kelloway, 2021).

Our research contributes to the leadership and trust literatures by investigating the significance of senior leadership trust in maintaining employee wellbeing during a health pandemic. We also specifically add to the servant leadership literature in various ways – by addressing calls to apply alternative theoretical perspectives (i.e., COR theory), assessing its cultural relevance, as well as moving away from the largely cross-sectional research approach (Eva et al., 2019). Finally, we advance COR theory by moving beyond a superficial focus and instead applying its principles of resource caravans and caravan passageways (Hobfoll, 2011).

With regards to practical implications, line managers can help bolster the positive effects of trust in senior leadership by displaying servant leadership behaviors, such as prioritizing employee needs and showing concern. Organizations should however bear in mind that there are likely to be differences between countries based on cultural variation in leadership norms and values.

While the focus was specifically on the Covid-19 health pandemic, the findings are arguably likely to be applicable to similar situations of crisis and uncertainty, which have a significant impact on organizations and the employees within.

Video presentation is available by following this [link](#).

- **Investigating mental health first aid (MHFA) in the workplace.**  
Susannah Robertson-Hart; Sheena Johnson & Cary Cooper

The research aimed to investigate Mental Health First Aid (MHFA) in a UK workplace setting in relation to those receiving and delivering support. MHFA has become an extremely popular workplace mental health intervention, yet there is little published research into the outcomes of MHFA in the workplace, beyond exploring MHFA trainees' mental health knowledge, confidence and intentions to provide support to someone with a mental health issue. Employers and practitioners need reliable insights into the individual and organisational outcomes of MHFA to support an informed decision about its use in the workplace.

Existing theory linking mental wellbeing and workplace outcomes was drawn on to identify the work-related constructs of interest for the study, e.g. job satisfaction, organisational commitment, absence. There is little existing research into the mechanisms by which MHFA may influence mental wellbeing at work in those delivering and receiving support. Given the aims and approach of MHFA, alongside the preliminary study

findings, the constructs of psychological capital (PsyCap) and perceived organisational support (POS) were identified for exploration in relation to mental wellbeing.

A preliminary qualitative study (n=10) supported the development of a further qualitative study of recipients of MHFA (n=13) and a quantitative pre / post-training controlled study of MHFA trainees (MHFAiders; total n=413) with a 3-month follow-up period. Participants were UK based employees in a large organisation.

Results revealed that MHFA was utilised for a variety of reasons, not limited to specific mental health conditions. Receiving MHFA was associated with perceived benefits in mental wellbeing, work-related outcomes (e.g., reduced absence and improved productivity), PsyCap, POS and reduced emotional dissonance. Previous findings have shown no change to mental health in populations with access to MHFA, but, unlike the present research, these studies have not isolated actual recipients of MHFA. MHFAiders' confidence and intentions to provide help to someone in distress significantly improved post-training compared to the control group, as well as the amount of mental health related help given to others. No change in mental wellbeing (and most of the work-related outcomes) over time was observed for MHFAiders. Results tentatively indicated a positive impact of becoming a MHFAider on PsyCap, POS and organisational citizenship behaviour (OCB). Managers who became MHFAiders were affected differently compared to non-managers in relation to job satisfaction (negative) and productivity (positive). Employees who volunteered to become MHFAiders reported higher levels of mental wellbeing, PsyCap, POS and job satisfaction at baseline compared to the control group.

The main limitations relate to generalisability of the findings (as the study was carried out in one organisation), the relatively short 3-month follow-up period in the quantitative study, the passive control group and the absence of quantitative data for recipients of MHFA.

The results suggest that MHFA has potential as a workplace mental health intervention for those supported, but further research is needed to validate and elaborate on the findings given the lack of previous studies into MHFA recipients. The balance of evidence to date suggests that becoming a MHFAider is not a suitable intervention for improving MHFAiders' own mental wellbeing, although it does not appear to be psychologically harmful and there may be other work-related benefits associated with becoming a MHFAider. The constructs of PsyCap and POS are highlighted for further exploration in the context of workplace MHFA. The results also suggest that a focus by employers on the specific risks and benefits to managers who become MHFAiders is important, as they appear to respond differently. The results imply that a self-selection approach to MHFA training may help to ensure employees who are psychologically healthy with positive attitudes become MHFAiders. Changes to the MHFA course content when delivered in the workplace are recommended to reflect the specific context and influences on mental health in the workplace. Delivering MHFA as part of an integrated approach to workplace mental health is also highlighted.

This study contributes to the very limited existing evidence on MHFA in the workplace and is the first known study to focus on actual recipients of MHFA (as opposed to those with access to MHFA). It is also the first known study of MHFA and mental health incorporating PsyCap and POS.

- **Reducing third-party work-related violence and aggression in Great Britain: COVID-19 and beyond.**  
Sheena Johnson; Kara Ng; Hamid Roodbari; Helen Beers & Anne Foster

Third-party work-related violence and aggression (WVA) describes mistreatment from non- colleague contacts, such as clients, customers, or members of the public. Workers subject to WVA often experience mental and physical health problems; these effects can go on to harm the organisation, e.g., many affected workers report higher turnover intention. The problem is particularly prevalent in sectors where employees regularly interact with the public (e.g., retail, healthcare). Worryingly, there is evidence that WVA has risen with the advent of COVID-19, which has necessitated the restructuring of work and daily life. One method to understand and address WVA is to encourage incident reporting. However, in many organisations and sectors, WVA is often normalised as ‘part of the job’, leading to low reporting rates despite encouragement from managers and sector representatives. Interventions and support measures relating to third-party WVA are in place, but to differing degrees and success across affected sectors. There is, to date, limited information and evidence available about the uptake of these, and their effectiveness. Issues relating to incident reporting and related barriers in accessing and receiving support compound this.

Social stressors, or interactions that cause psychological and physical strain, are a unique type of stressor in the workplace. While some social interactions may be beneficial, repeated exposure to negative social stressors can harm workers, especially if their job requires spending considerably more time with customers than with supervisors and colleagues, who may provide support. To address a lack of understanding of third-party WVA, we developed a collaborative research project with the Health and Safety Executive to investigate the extent of third-party WVA in Great Britain and find ways to improve reporting. Our project aims to develop ‘evidence-based stories’, which will raise awareness and influence employers to address the problem - and publish these on HSE’s violence and aggression web pages. We also aim to gather information on implementation and effectiveness of support interventions. We draw on established classifications to conceptualise interventions into primary- (i.e., prevention), secondary- (i.e., minimisation), and tertiary-level (i.e., rehabilitation) strategies. We use this framework to guide our analysis of interview and workshop data.

Our project is a three-part scoping study: First, a review of existing third-party WVA research in Great Britain, examining academic and grey literatures. Second, to hold workshops with participants, representing a range of sectors, providing regulatory and organisational insights into the scale of the problem, current reporting mechanisms, intervention and support practices, barriers to providing effective intervention and support. Finally, interviews with organisational representatives to gather more detail on workshop findings and prepare ‘evidence-based stories’ for publication.

Two workshops have been completed and review of content is underway. Initial findings suggest a rise in third-party WVA even prior to COVID-19, which has exacerbated the severity of incidents. Many representatives reported that workers fail to report incidents for several reasons, including: confusion over complex reporting systems; a lack of time at work to report; and beliefs that WVA is ‘part of the job’ and nothing will be done. Representatives shared organisational barriers and offered solutions to overcome them. Interviews will be completed soon, and findings presented at the conference.

Third-party WVA has a relatively small body of academic literature compared to other forms of workplace encounters such as bullying and aggression, with more insight available in some sectors (e.g., healthcare) compared to others (e.g., retail). Study findings will provide insight into the nature of the problem across sectors, but our project is exploratory in nature and further research is required to expand understanding of WVA.

Our findings are beneficial in helping researchers and practitioners understand the prevalence of third-party WVA in the British work force, particularly within the context of COVID-19. Findings will also provide a ‘snapshot’ of both the current state of support interventions within Great Britain and their effectiveness.

Although research into bullying and aggression within the organisation has developed rapidly in recent years, there has been less development in understanding of third-party violence and aggression. Our project addresses this gap and provides insight into the extent of WVA in Great Britain, implementation and success of support measures, and what can be done to encourage reporting of incidents.

- **How personality and demographic factors relate to perceptions of working from home during lockdown.**

John Hackston

In the early weeks of the COVID-19 lockdown, many people found themselves unexpectedly working from home; many still are. For some, this may have brought social isolation, longer working hours, increased work-family conflict, other negative effects of an ‘always-on’ working culture and (especially given wider concerns about the pandemic) increased stress and anxiety. Set against this, most will have saved time and money by avoiding commuting, and many will have appreciated the greater flexibility and informality of home working. Personality may be a factor in how people adapt. Many people already use the personality type approach to build self-awareness and understand their reaction to stress. The model looks at whether an individual has personality preferences for Extraversion (E) or Introversion (I), for Sensing (S) or Intuition (N), for Thinking (T) or Feeling (F), and for Judging (J) or Perceiving (P), and at how these preferences combine dynamically to give 16 possible types (ESTJ, ESTP, etc.). This study investigated how personality type and demographic factors related to

individual perceptions of remote working during the early months of COVID-19. The intention was to produce information and guidelines to help individuals and organizations.

An online survey was distributed to a convenience sample of individuals from a wide range of occupations who had previously taken the MBTI assessment and decided on their personality type. Respondents completed demographic information and, depending on their work status, questions on their views about being furloughed, about their job, and (if relevant) about working remotely. This research is based on a subset of 349 individuals who self-assessed as being non-furloughed remote workers.

Items relating to remote workers' views formed four scales, achieving adequate to good internal consistency reliabilities. A univariate analysis of variance was used to establish which factors had the greatest relationship with each dimension.

Enjoys working from home:

- Personality type. Respondents with INTP, ISTP (Introverted Thinking) preferences scored highest on average, ESTJ and ESFJ the lowest.
- Remote working status: those who were already remote workers scored higher than those who had recently transitioned.

Feels productive at work:

- Job level. Managers, especially executives and senior managers, scored higher.
- Personality type. Those with a Judging preference scored higher on average than those with a Perceiving preference.

Anxious and stressed:

- Employment status. Those working part-time scored significantly lower than those working full-time or the self-employed.
- Age. Younger respondents tended to score higher.
- Personality type. Respondents with Extraverted Feeling preferences (ENFJ, ESFJ) scored highest, those with ISFP and INTP preferences lowest.

Bored and disengaged:

- Age. Younger respondents tended to score higher.
- Personality type. Respondents with ESTJ preferences scored highest, ENTJ and INTP preferences the lowest.

There were also many relationships between personality and specific attitudes and behaviours. This allowed for the development of remote working guidelines for each type. These, and the supporting data, will be presented at the conference. Although other research has suggested that women working from home may have been more negatively impacted than men, there were no overall gender differences in any of the

scales. At the item level, however, female remote workers were significantly more likely than male to feel guilty about still having a job, to find it difficult to remain focused, and to agree that they were snacking and having treats a lot of the time. Amongst remote workers sharing lockdown with children or infants, women scored higher than men on the 'Bored and disengaged' scale, suggesting that the presence of children at home had a greater impact on women than on men.

The study used a convenience sample who responded to requests to complete an online survey, which therefore is not representative of the wider working population. However, there were sufficient respondents of each personality preference, gender, remote working status and other factors to make valid comparisons. Data was self-reported.

This study sheds light on how a widely used personality framework related to remote working during the pandemic, facilitating the development of personality-based guidelines for home working.

Although the pandemic has stimulated much research, relatively little has addressed the issue of remote working, in particular how this relates to personality. For individuals and organizations, adaptation to this 'new normal' remains important.

Video presentation is available by following this [link](#).

- **A meta-analysis of alcohol prevention in the workplace.**  
Lena Fellbaum; Nils Benit; Laura Bielefeld; Andreas Mojzisch & Renate Soellner

The aim of this meta-analysis was to generalize the effects of primary prevention programs regarding alcohol consumption at workplace. additionally moderator analyses are calculated. For this purpose, the international research of the last 25 years is systematically examined and meta-analytically summarized.

According to WHO estimates, alcohol consumption is highest in the European region compared to the rest of the world (WHO, 2019). In Germany about three million people show at least an abusive consumption of alcohol. Economic estimates underline that the costs caused by alcohol use, for example due to therapy or early retirement, amount to 30-40 billion euros annually (Atzendorf et al., 2019).

A comprehensive literature search in established databases served to identify relevant primary studies. A total of 19 primary studies (N = 4475) with 45 usable effect sizes could be integrated into the present meta-analysis.

The results revealed a significant overall effect in favour of the effectiveness of the analysed prevention programs ( $d = 0.17$ , 95% CI [-0.26; -0.09],  $p = 0.0005$ ).

The strict selection criteria of the primary studies (e.g., RCT) resulted in a decrease of included studies ( $k = 19$ ) but also in an increase of comparability as well as moderate homogeneity of the studies ( $I^2 = 48.5\%$ ). Moderator analyses indicated an additional increase in effects (e.g.: prevention duration  $d = .26$ ).

Even though small effect sizes could be identified, these underline a generalizable effectiveness of alcohol-related prevention approaches, which are cost-effective measures to reduce risky alcohol consumption. Because of the low-threshold access to the target group alcohol prevention in the workplace seems to be an ideal environment (Ames & Bennett, 2011; Boß et al., 2018; Webb, Shakeshaft, Sanson-Fisher & Havard, 2009). We strongly encourage companies to engage in alcohol prevention programs.

The knowledge gained is of individual, societal and economic importance, particularly due to increasing workplace-related stress.

Video presentation is available by following this [link](#).

- **Analyzing the relationship between different dimensions of empathy and components of burnout in healthcare: A systematic review and meta-analysis.**

Dolores Morera; Elena Lorenzo; Janet Delgado; Moisés Betancort; Helena Bonache; Naira Delgado & Lasana Harris

Research on healthcare shows that the relationship between empathy and burnout is complex. Some studies have shown that being empathic has a positive impact on wellbeing of healthcare professionals, whereas other scholars have shown a link between empathy and higher levels of burnout. These inconsistencies in research require a fine grain clarification of the role of different dimensions of empathy in healthcare performance and their relationship with burnout components.

The purpose of this study is to identify whether the dimensions of empathy are differently related to each of the dimensions of burnout in healthcare professionals (physicians and nurses) through a systematic review of the literature and a meta-analysis of the available data.

Search strategy: PubMed, PsycINFO, CINAHL, Scopus, and Medline. A total of 22 eligible studies reported empirical findings on the association between the dimensions of burnout (MBI: emotional exhaustion, depersonalization, and/or lack of accomplishment) and the different dimensions of empathy (IRI: perspective taking, empathic concern, personal distress; JSPE: perspective taking, compassionate care,

standing in the patient's shoes; empathic accuracy, and/or other). A correlation meta-analysis was performed with data of those studies that provide measures of associations between dimensions of empathy and dimensions of burnout ( $N = 9$ ).

MBI – IRI. Depersonalization was negatively correlated to Perspective Taking ( $n = 5$ ), and negatively correlated with Emotional Concern ( $n = 4$ ). Perspective Taking was negatively associated with reduced Personal Accomplishment ( $n = 4$ ). Emotional Exhaustion was positively linked with to Personal Distress ( $n = 3$ ). Reduced Personal Accomplishment was positively correlated with Personal Distress ( $n = 2$ ).

MBI – JSPE. Perspective Taking was negatively associated with reduced Personal Accomplishment ( $n = 3$ ). Compassionate Care and Standing in the Patient's Shoes were negatively associated with reduced Personal Accomplishment ( $n = 1$ ).

Results showed that healthcare professionals with high levels of Personal Accomplishment also display high levels of Perspective Taking, Emotional Concern and Standing in the Patient's Shoes. Results supported a negative association between Depersonalization and Perspective Taking, Emotional Concern, Compassionate Care and Standing in the Patient's Shoes. Together, these results highlight the importance of studying different components of empathy separately, since their impact on burnout components are different. Our results constitute an advance in the knowledge of the links between empathy and burnout with relevant implications.

The findings can orient the development of more focused interventions to promote those components of empathy that show a negative relationship with burnout dimensions. Results can lead to design relevant interventions to avoid burnout while promoting empathy in healthcare professionals.

- **How much do you trust your AI-teammate? The effect of trust violations on team trust in human-AI teams.**  
Anna-Sophie Ulfert-Blank & Eleni Georganta

Trust, which describes the willingness to rely on others and share information, has been supported as an essential mechanism for effective team collaboration and human-AI interaction. At the same time, trust violations have been shown to have detrimental effects on both human and human-AI relationships. With human-AI teaming being a relatively new field of research, evidence on the impact of trust violations in human-AI teams is still largely missing. Integrating work on team trust and trust in autonomous technologies, the goal of the present study is twofold. First, we explore whether perceived trustworthiness in a new team member and thereby team trust is lower when an AI compared to a human team member is introduced. Second, we investigate how trust violations impact perceived trustworthiness and team trust.

In line with theories of trustworthiness, we expect that the perceived trustworthiness of a new team member is lower when an AI compared to a human team member is introduced. This is because trust-related information from prior or similar situations is limited, and similarities among team members are relatively low. This makes the evaluation of an AI's trustworthiness more challenging. Building on Social Categorization

Theory and on research showing that team trust is multidimensional, we expect cognitive and affective team trust to be lower when having an AI than a human team member. Finally, and according to evidence on trust violation and dynamics of distrust, we expect these differences in trustworthiness and, thereby, team trust to be greater when trust is violated. Trust is fragile, especially at the initial stages of interaction, as shared experiences are still missing.

We use a 2 (AI vs. human team member) x 2 (trust violation vs. no trust violation) between-subjects design under controlled conditions. After being randomly assigned to one of four conditions, participants are informed that they are members of an interdisciplinary team. Participants further receive the information that their new team member is either an AI (condition A, condition B) or a human (condition C, condition D). Using an online team scenario, participants are then informed that the project is completed and that the team presented its results to the client. After this final presentation, participants receive the information that their new team member either made a mistake (condition A, condition C) or completed its task successfully (condition B, condition D). In the end, participants are presented with two different situations and are asked to select options that reflect different levels of trusting behaviors (low, medium, or high). Participants will complete three online questionnaires. In all three questionnaires, we will assess the new team member's trustworthiness and affective and cognitive team trust. Finally, we will also assess demographics and control variables (e.g., experience with artificial intelligence, experience with teamwork).

Data collection is ongoing and will be completed by the beginning of June 2021. First, we will test for differences in perceived trustworthiness and team trust (cognitive and affective) between having an AI or a human team member. We will perform a mediation analysis to explore whether trustworthiness mediates the relationship between having an AI or a human team member and team trust (cognitive and affective). To investigate whether a trust violation by the new team member moderates the mediating relationship between having an AI compared to a human team member, trustworthiness, and team trust (cognitive and affective), we will perform a moderation analysis.

The experimental study offers first insights into human-AI teamwork. However, the scenario is not comparable to a real team situation. Furthermore, our experiment only investigates an individual team member's perceptions and reactions and does not explore the interaction among multiple team members and the new teammate. Further experimental and field studies will be required to investigate the different trust relationships within human-AI teams fully.

Our research is a starting point for further exploring trust in human-AI teams and identifying relevant factors and mechanisms that contribute to trust development towards an AI teammate.

We contribute to trust, team, and human-AI interaction research in three ways with this study. First, we apply trust theories to explore human-AI trust relationships. Second, we combine research on trust in teams and trust in technology and provide insight into trust within a new type of team. Third, we bring team and AI research together and present initial evidence on human relationships with an AI team member.

- **Reciprocal relationships between narcissism and agentic/communal work characteristics across the first six years of the career.**  
Fien Heyde; Jasmine Vergauwe; Joeri Hofmans; Filip De Fruyt & Bart Wille

This study examines the development of narcissism in the work environment. Previous research on narcissism at work has adopted a static perspective, mainly documenting the detrimental effects of this trait on a variety of work-related outcomes. However, growing evidence suggests that narcissism continues to develop throughout adulthood (e.g., Grosz et al., 2019). Therefore, adopting a more developmental perspective when studying narcissism could help to understand its dynamic properties. Moreover, studying the development of narcissism in the work context could help to uncover the factors that may either stimulate or buffer the emergence of this trait.

In the Demands-Affordances TrAnsactional (DATA) model of personality development (Woods et al., 2019), it is outlined how work characteristics require individuals to respond adequately using their dispositions such that an optimal level of person-work fit remains safeguarded over time. In line with this model, we hypothesize that agentic work activities can foster the development of narcissism, whereas communal activities can have a diminishing effect.

This idea is tested in a longitudinal panel study in which a sample of 1,513 college alumni (64% female) were followed during their first six years of the professional career. Reciprocal relationships between work characteristics and narcissistic personality are examined across four measurement points.

Tests for measurement invariance (MI) provided evidence for partial MI of narcissism across time. First results of Bivariate Latent Change Score (LCS) modeling indicate that both agentic and communal work activities have a diminishing effect on narcissism.

The current study investigated the longitudinal interplay between narcissism and work characteristics in a relatively homogeneous sample of Belgian professionals who are all highly educated. Future research is needed to examine the generalizability of these findings.

Narcissism has been shown to be related to a range of undesirable outcomes at work. Therefore, knowledge is needed about the conditions at work that may either trigger or diminish this aberrant personality trait in employees. The current findings illustrate that stronger investment in both agentic and communal work aspects may inhibit the development of narcissistic tendencies.

Current study is one of the few longitudinal investigations of narcissism. Moreover, to the best of our knowledge, it is the first study to systematically investigate reciprocal relationships between this trait and a set of psychologically relevant work characteristics.

- **The challenges of formal leaders navigating in organisations idealising distributed leadership.**  
Jonas Holm

The goal is to investigate what the role of formal leaders in facilitating distributed leadership in the public sector is. This is relevant because while more and more organizations – public as well as private – experiment with distributed leadership structures, they tend to have people occupy formal leadership positions as well. These formal leaders play a unique role in distributed leadership processes due to their formalized responsibility to exercise leadership<sup>1</sup>. However, little is known about formal leader’s roles in contexts of distributed leadership.

In this study, distributed leadership is when either an aggregate of separate individuals, sets of small numbers of individuals acting in concert or larger plural-member organizational units undertake leadership tasks and influence collective actions towards a common goal. Importantly, distributed leadership encompasses leadership exercised by people both with and without formal responsibility to lead, some of which are prompted by a formal leader and some of which are not.

Seven month participant observation and interviews were conducted as they are suitable for investigating how formal leaders conduct themselves with regards to distributed leadership processes. Departure was taken in two different settings within public education and social work, both of which were chosen because their formal leaders were engaged in facilitating some form of distributed leadership. Furthermore, both settings were subunits of the same municipality, whose management was optimistic about the concept of distributed leadership. Consequently, the phenomenon in question was expected to appear as clearly as possible.

Preliminary findings show that in various situations formal leaders in the public sector encourage and take an optimistic view on distributed leadership. However, at the same time, they worry about leadership being distributed because they feel that the accountability remains with the formal leader. In this regard, they feel most comfortable when leadership is distributed to employees who they believe will carry it out in a manner similar to what they themselves would have done. The full results will be available by fall 2021.

The study limitations concern the qualitative methods applied, which do not readily allow generalization to other contexts than the investigated. However, the study’s theoretical contributions can be tested for generalizability in future research.

The study holds research implications regarding our understanding of what distributed leadership actually is. Other researchers in the field of distributed leadership have made calls for investigating how individual formal leaders shape the systems of distributed leadership in which they are embedded<sup>4,5</sup>. Additionally, prior research has produced inconsistent findings regarding the initiation and consequences of distributed leadership<sup>7,10</sup>. A better understanding of the unique role of formal leaders will contribute to our understanding of the reasons for these inconsistencies.

The study also holds practical implications for how formal leaders might actively be able to facilitate distributed leadership within their organizations. Understanding formal leaders' thinking and doing relating to distributed leadership is an important first step towards making recommendations for specific behaviors that are more conducive to distributed leadership.

The originality of the study consists in it being among the first to empirically investigate the role of formal leaders in the context of distributed leadership.

The intended audience is primarily academic although the study holds clear implications for practitioners as well.

- **The effects of a reflexivity-based intervention on workers' wellbeing.**  
Lorena Funcasta; Mirko Antino & Adalgisa Battistelli

In this study, we examine the effect of a reflexivity-based intervention (in which participants were required to reflect on their work routines, peer relationships) on employee health (VD1) and justice climate, in an organizational change process.

Organizational change represents a challenge in terms of the psycho-social environment of the employee's work. Some research confirms that team's reflexivity contributes to improve workers' wellbeing by means of reducing work demands, and by enhancing control and support (Chen, Bamberger, Song, & Vashdi, 2018). On the other hand, organizational (procedural) justice plays an important role in the process of organizational change (Cui & Jiao, 2019).

We used a pre-post research design and collected data from 78 employees during one year. The General health and Stress symptoms scales from Copenhagen Psychosocial Questionnaire (COPSOQ), and Formal procedures subscale from Justice Scale (Niehoff y Moorman, 1993) were self-administrated. We compared the differences on these variables between experimental group with a (pseudo) control group that was not part of the intervention.

We will present preliminary results, by comparing the first set of pre-post measures. Our preliminary findings on a partial sample of 39 workers indicate that intervention leads to positive effects on self-perceived health and stress indicators. Additionally, we found a tendence for justice perceptions (higher justice perception during and after the intervention). In one particular division of the organization, these results were significant.

The first limitation is that data collection is not completed. The second limitation is that this study does only include self-report information for all the dependent variables. The third limitation is that in this phase, we could not randomly assign the participants to the intervention/control condition. Therefore, the comparison with the (pseudo)control group should be carefully interpreted (we will offer a detailed comparison between the two groups).

Our findings will be discussed giving practical suggestions on the effectiveness of expressive writing intervention on organizational change processes in different domains. In this sense, the objective is to contribute to the debate on how the reflexivity process could generate this effect in the dependent variables.

Our findings aims to extend previous literature on the effects of reflexivity-based intervention in both the workplace related variables (like justice perception) as well as on employees' health (VD).

- **Examining the impact of mindfulness on daily well-being and performance.**

Deirdre O'Sjea; Agustin Molina; M. Gloria Gonzalez-Morales; Alexandra Michel; Anna Steidle & Annkatrin Hoppe

Drawing on theories of mindfulness-to-meaning (Garland, Farb, Goldin, & Fredrickson, 2015b), we investigate the ways in which mindfulness (trait and induced) has its effects on daily outcomes. We propose the trait mindfulness operates via the mechanism of affect and is associated with higher daily positive affect which is in turn related to higher daily concentration and lower fatigue.

Mindfulness has been defined as a state where one is “attentive and aware of what is taking place in the present” (Brown & Ryan, 2003; p. 822). Although typically defined as a state, research has also shown that individuals differ in their propensity to be mindful, and this individual difference is termed trait mindfulness, referring to the duration, frequency and intensity with which an individual tends to engage in mindfulness (Hülshager, Alberts, Feinholdt, & Lang, 2013; Jamieson & Tuckey, 2017). State mindfulness can be induced through mindfulness-based interventions, which if practiced regularly and over time will cultivate higher levels of trait mindfulness (Hülshager et al., 2013; Jamieson & Tuckey, 2017). In this research, we investigated the impact of both trait mindfulness and state mindfulness (induced via intervention).

The mindfulness intervention drew on Garland and colleagues (2015a) mindfulness-to-meaning theory, and on the previous work of Michel, Bosch and Rexroth (2014) who demonstrated that mindfulness can be used as a cognitive-emotional segmentation strategy. In order to develop

the necessary skills, our mindfulness intervention followed a self-regulation process where we first enabled participants to become aware of their emotions, then to recognize their emotions, and accept them. We contrasted this with a stringent active control condition.

Design: 237 (28.2%) employees from an Irish organisation volunteered to take part in the research. The cluster randomization resulted in 173 participants in the mindfulness condition and 63 in the active control (AC) condition. Following drop-out, the final sample consisted of 1242 daily observations nested in 186 participants ( $n_{AC} = 54$ ;  $n_{Mind} = 132$ ). After completing the baseline survey, participants were provided with training on the intervention activities. Over four week, they were sent a link via e-mail on a daily basis which provided them with access to the intervention activities in an online platform.

The intervention moderated the indirect effect from trait mindfulness to daily concentration and fatigue via daily positive affect. This study demonstrates that completing a daily mindful emotion regulation intervention provides the opportunity for trait mindfulness to positively influence daily concentration and fatigue via daily positive affect, which is boosted by engaging in daily mindfulness practice, when compared to an active control intervention that does not facilitate this process.

These findings provide some insights into the mechanisms through which mindfulness has its effects on daily well-being and performance. Furthermore, it highlights interesting findings with regard to the way in which interventions may facilitate personal strengths to unfold their beneficial impact. Our findings are contrary to the notion of apriori need diagnosis for workplace interventions (Briner & Walshe, 2015), suggesting that relatively low dose interventions may work better as self-regulatory prompts to those with already developed mindfulness skills. Thus, our research contributes to our current understanding of how and for whom mindfulness is beneficial in workplace settings.

Our study contributes to the literature by examining the mechanism through which trait mindfulness has its effect on daily outcomes. We extend past research demonstrating that mindfulness and mindful reappraisal are associated with growth in daily positive affect (Pogrebtsova, Craig, Chris, O'Shea, & Gonzalez-Morales, 2018), and by demonstrating that positive affect is a mediating mechanism through which mindfulness influences daily concentration and fatigue.

- **The mediating role of psychological safety in narcissists' responses to negative feedback in the workplace.**  
Melrona Kirrane; Deirdre O'Shea; Finian Buckley; Sara Glynn & Harrie Keane

The purpose of this study was to explore factors that affect responses of narcissists to negative feedback. While the literature reveals that narcissists generally respond aggressively to criticism, factors that may influence this reaction among vulnerable and grandiose narcissists are unclear. As feedback on performance is a critical HR practice, building understanding into how negative reactions may be reduced is worthwhile.

Increasing attention is being paid to ‘dark side’ personality characteristics in the organisational environment with the trait of narcissism receiving significant attention (Spain, Harms, & LeBreton, 2014). Narcissists demand attention and admiration, display a sense of entitlement and have an expectation of special treatment (Campbell & Foster, 2007). They respond with feelings of rage, defiance, shame, and humiliation when their self-esteem is threatened (Twenge, & Campbell, 2003). The performance feedback process (Wang, Burlacu, Truxillo, James, & Yao, 2015) is one occasion where a threat to self-esteem may be encountered, especially when that feedback is negative. Studies have shown that negative feedback can be perceived by the receiver as threatening to their self-esteem and to result in defensive (Kay & Meyer, 1965) or retaliatory behaviour (Jermier, Knights, & Nord, 1994). Recognising the distinction between grandiose and vulnerable narcissism (Dickinson & Pincus, 2003) and the noted role of personality characteristics in reactions to feedback (Smither, London, & Richmond, 2005), it is appropriate to consider how negative feedback may differentially affect the responses of narcissistic individuals. Psychological safety (Edmondson, 1999) concerns being able to present oneself without fear of negative consequences to one’s self-image. As maintaining self-image is of central importance to narcissists, we explore how psychological safety may moderate the responses of vulnerable and grandiose narcissists to negative feedback.

Procedure: 233 employees (65.5% female, mean age 35.7 year, SD = 11.0) from a range of industries responded to an invitation to take part in 3-wave lagged research study on personality and work behaviour. Each time-point was separated by one week. 166 participants completed two or more surveys. Vulnerable and grandiose narcissism as well as demographic information were assessed at the first time-point, feedback from a supervisor and psychological safety at the second time-point and counterproductive work behaviours and withdrawal at the third time-point. Measures: Vulnerable ( $\alpha = .937$ ) and Grandiose narcissism ( $\alpha = .928$ ) were assessed at T1 using the 52 item scale by Pincus et al (2009). At T2, participants were asked if they had received feedback from a supervisor and if they indicated yes, were asked to rate the extent to which this feedback was favourable (4 items;  $\alpha = .858$ ) or unfavourable (4 items;  $\alpha = .807$ ) using the measure by Wang and colleagues (2015). For the purposes of this research we focus on unfavourable feedback only. 107 respondents indicated that they had received feedback from a supervisor in the previous week. Psychological safety ( $\alpha = .828$ ) was assessed at Time 2 with 7 items developed by Edmondson (1999). The frequency of engaging in counterproductive work behaviours (Spector et al., 2006; 32 items;  $\alpha = .910$ ) and work withdrawal behaviours (Lehman & Simpson, 1992; 17 items;  $\alpha = .866$ ) over the previous week were assessed at T3.

In terms of direct effects, higher levels of vulnerable narcissism and receiving unfavourable feedback were associated with higher counterproductive work behaviours, but only grandiose narcissism was also associated with work withdrawal behaviours. Psychological safety mediated the relationships between both types of narcissism and both counterproductive behaviours and withdrawal, but negative feedback did not moderate the path from either form of narcissism to psychological safety.

A relatively small sample size and lack of feedback provided to a number of respondents during the measurement period may limit the generalisability of our results.

Our research found some support for the role of psychological safety in mediating the relationship between narcissism and negative work outcomes such as counterproductive behaviours and work withdrawal. However, we did not find that negative feedback exacerbated this effect, although this may have been due to

Our research demonstrated that narcissism is associated with feel less psychologically safe, which in turn is associated with engaging in negative work behaviours. Future research is needed to examine what contextual and/or interpersonal variables exacerbate these effects for narcissists.

- **Harnessing motivation and self-regulation via interventions: Implications for work-related well-being.**

Deirdre O'Shea

The future of work is likely to see a much greater percentage of workers engaged in remote work or blended forms of work, resulting in more flexible working patterns, poorer boundaries between work and home, and a greater need for workers to be able to motivate themselves and self-manage their work. Although individual level interventions often implicitly train workers to change something (about themselves, their environment) and thus, inherently require motivation and self-regulation, few studies to date have formally investigated the potential of interventions to promote self-regulation and motivation. In this symposium, we discuss five studies which do just this. The first paper (Althammer, Wöhrmann & Michel) examines a comprehensive six week self-regulation intervention for flexible workers, demonstrating that it increases self-regulation, well-being and work-life balance compared to a control group. The second paper (Michel et al.) focuses on how we can design interventions to help employees create better boundaries between work and home life. It contrasts two interventions, namely mindfulness as a cognitive-emotional segmentation strategy with an intervention based on different types of segmentation strategies and transitions rituals (with a control) to see which one is more effective for work-life balance and well-being. The third paper (Steidle & Kaesmayr) specifically focuses on ways to foster awareness about the societal impact of one's job (public sector motivation, a psychological resource) in public sector workers, contrasting three daily micro-interventions. The final two papers present particularly novel methodologies and interventions. Pogrebtsova and González-Morales use appreciative inquiry to conduct a process evaluation of a job crafting intervention, highlighting how participants experience better alignment between their needs, strengths and values. Finally, Lennefer, Reis, Lopper and Hoppe combine the psychological and physical to show how the use of an activity tracker combined with an online coach can lead to increased movement and decreased strain and negative affect.

These five studies target different aspects of self-regulation (e.g., awareness, monitoring, behaviour change, reflection) and motivational resources (impact, affect, needs, values), demonstrating that there is much potential in harnessing such approaches via interventions to improve

various facets of well-being and aiding workers in managing more flexible working arrangements. Collectively they demonstrate that although such interventions can take a variety of approaches they have important implications for employees.

Combined, the research in this symposium suggests that there is scope to further explore the added value of individual-level interventions specifically targeting self-regulation and motivational resources. As the world moves into the future of work, with greater emphasis on flexible working and hybrid workplaces, employee's ability to develop their own skills and strategies to self-manage and motivate themselves will be particularly important.

- **Working flexible, staying healthy – Effects of a resource-oriented web-based training on well-being, psychological detachment, performance and work-life balance.**

Sarah E. Althammer; Anne M. Wöhrmann & Alexandra Michel

In the modern working world, more and more people are working flexibly in terms of location and time. Even before the Covid-19-pandemic, many employees had the possibility to (partly) work from home. Flexible working conditions can have benefits for employees (e.g., organization of working time according to one's needs, reduction of commuting times, balancing work and family roles). However, they entail risks such as blurring boundaries between work and private life, prolonged working hours or insufficient detachment. This can negatively impact well-being, recovery, work-life balance, and performance. Hence, we developed a resource-oriented online intervention that aims to strengthen employees' self-regulation in the context of flexible working. We evaluate whether this positively influences well-being, psychological detachment, performance and work-life balance.

With increasing flexibility, employees have to self-regulate their boundaries between work and private life, organize their daily work and rest periods more and more themselves. Self-regulation (Bandura, 1982; Kanfer, 1977) is therefore a central resource likely to help employees coping with flexible working conditions.

To evaluate the training, we applied a randomized waitlist-control group design (RCT) with four measurement points (pre-intervention, post-intervention, four-weeks follow-up, six-months follow up). The control group received the intervention after the four-weeks follow-up. About 450 participants were randomized to the intervention (N=223) or control group (N=225). The online training "FlexAbility" consists of six weekly modules as well as short daily tasks. In the online modules, participants learn various self-regulation strategies with reference to boundary management between work and private life, recovery during and after work as well as performance.

In line with our hypothesis, covariance analyses results reveal that the intervention group in comparison to the control group significantly improved their self-regulation, well-being, psychological detachment, performance and work-life balance at the post-intervention assessment. To

assess the stability of training effects, we used mixed ANOVAs. They indicated that all training effects remained stable over 4 weeks. A mediation analysis demonstrated that self-regulation mediated the intervention effect on well-being and performance.

There might be a self-selection bias in the sample because participants voluntarily chose to enroll in the training according to their personal needs and preferences. All data were self-reported.

Our study results show that a resource-oriented intervention promoting self-regulation in the context of flexible work is effective in promoting self-regulation which in turn enables workers to improve their well-being, performance and work-life-balance. Based on our findings, we propose that self-regulation might be a core resource for flexible workers.

The intervention is specifically designed for workers with flexible working conditions. It adapts the concept of self-regulation to the context of flexible work. This research will amplify knowledge on the effectiveness of a self-regulation training and thus, can provide guidance for designing flexible work conditions in an increasingly digitalized working world.

- **Discovering how to craft a personally aligned “dream future” career: A qualitative process evaluation of a job crafting intervention facilitated by appreciative inquiry.**  
Ekaterina Pogrebtsova & M. Gloria González-Morales

The modern world of work provides employees with increasing opportunity to personally design—or “job craft”—more meaningful and engaging work for themselves. However, intervention studies have shown mixed effectiveness in actually promoting job crafting behaviours and associated benefits. Past studies have also lacked exploration of the processes and contexts helpful for guiding future job crafting interventions. The goal of the current study was to present a detailed qualitative process evaluation of a job crafting intervention to progress understanding of: (1) the mechanisms behind job crafting intervention effectiveness, (2) the practical challenges in job crafting intervention implementation, and (3) how to help employees align their job crafting efforts towards desired personal resource building and subsequent wellbeing benefits. To address this last goal, we integrated appreciative inquiry theory and methods to facilitate the job crafting process. Given the past successes of appreciative inquiry in helping employees and organizations work towards a “dream future” based on discovery of their positive core—composed of intrinsically motivating, or “life-giving,” forces such as strengths, values, and stories of past peak experiences (Cooperrider & McQuaid, 2012)—there appears to be much untapped potential to improve job crafting interventions using an appreciative inquiry approach.

Over two decades of research across cultures and professions provide support for the wellbeing and organizational benefits of job crafting (e.g., Zhang & Parker, 2019; Bakker & Demerouti, 2007). However, unlike the substantial literature on job crafting outcomes, considerably less research exists on the processes behind how to effectively train and promote job crafting using organizational interventions (Gordon et al., 2018; Kooij et al., 2017; Kuijpers, Kooij, & van Woerkom, 2020). In particular, future job crafting intervention research should examine how to effectively promote personally beneficial job crafting that aligns with employees' unique strengths, interests, and developmental needs (Kooij et al., 2017; Kuijpers et al., 2020). One promising avenue for enhancing job crafting training, which we explored in the current study, is using the positive organizational change practice of appreciative inquiry. Appreciative inquiry is both a theory and set of participatory methods used to discover and harness the best in people and their organizations by focusing on what “gives life” to human systems (Cooperrider & Godwin, 2011; Cooperrider & Srivastva, 1987).

Using a reflexive thematic analysis, we explored the experiences of 24 sessional lecturers and professors from a mid-sized University who participated in a hybrid (i.e., online and in-person) 6-month job crafting intervention. Participants gained access to an online community with discussions and resources and five 2-hour in-person workshop-style sessions. The sessions guided participants through AI's 5-D cycle in which they: (1-D) Defined their job crafting purpose, (2-D) Discovered their personal “positive core” (Cooperrider & McQuaid, 2012), (3-D) Dreamed a personally meaningful vision for their work and career, (3-D) Designed a job crafting plan, and ultimately (4-D) Delivered (i.e., practiced) job crafting in their everyday lives to align their work to their dream future.

Results from interviews, surveys, and field notes spanning the full program duration show that Appreciative Inquiry components of the current job crafting intervention, such as appreciative interviewing and dream future visualizations, influenced participants to engage in job crafting initiatives aligned with their needs, interests, strengths, and values. Several challenges arose, including participants' dissatisfaction with the lack of structural changes, which will be further discussed in the presentation.

Researchers have indicated that the “gold-standard” for program evaluations is a mixed-methods qualitative and quantitative analysis (Nielsen et al., 2010). Due to practical constraints and small sample size, we were limited to a qualitative exploration only.

The implementation challenges faced in the current study exemplify the practical importance of designing and delivering job crafting interventions as part of more systemic organizational change initiatives (de Bloom et al., 2020; Saksvik et al., 2002). However, given the many perceived benefits that participants attributed to the intervention, there is promise that Appreciative Inquiry-facilitated job crafting programs can be a valuable addition to organizational-level work design initiatives.

This study progresses the nascent exploration of how researchers and practitioners alike can promote employee wellbeing and job/career satisfaction using an integrated Appreciative Inquiry and job crafting approach.

- **Fostering well-being in public servants through micro-interventions on personal resources.**  
Anna Steidle & Julia Kaesmayr

The Covid-19 pandemic has shown that effective governance and administration largely depends on public servants' commitment and engagement. To avoid loss spirals (Halbesleben et al., 2014) and deal with continually high job demands, public servants will need to increase their personal resources. Public service motivation (PSM) is a personal resource specific to the public servants. It has been shown to increase job engagement (De Simone, Cicotto, Pinna, & Giustiniano, 2016) and buffer against high demands (Potipiroon, & Faerman, 2020). Micro-interventions aimed at supporting PSM should be effective in improving engagement and well-being of public servants. Only recently, a first attempt at creating micro-interventions targeting PSM has been made. In three short experiments on PSM interventions, Vogel and Willems (2020) demonstrated that reminding public servants either about their contribution to society (societal impact intervention) or prosocial impact (helping another individual) both resulted in increased positive and decreased negative affect, reduced turnover intentions and increased willingness to recommend one's job compared to an active and passive control group. Creating awareness about the job's societal impact was particularly effective to public servant's well-being.

Accordingly, several questions regarding the potential of PSM interventions arise, which we investigate in this research. First, do societal impact interventions indeed increase the personal resource PSM? Second, micro-interventions have been shown to unfold their effect over time (Steidle et al., 2018), but we do not know whether the repeated exercise of societal impact interventions increase their effect. Third, how do societal impact interventions perform compared to other effective well-being interventions such as positive reflection or a mindfulness interventions (Michel et al, 2021)? Finally, the effectiveness of micro-interventions depends on the quantity and quality of situational demands. Organisational bureaucracy is a prominent and potentially hindering demand in the public sector, particularly in countries like Germany (Blom, Borst, & Voorn, 2020). We investigate whether a societal impact intervention is better able to prevent bureaucracy induced strain than general micro-interventions. We investigate this in the present research, considering whether the three micro-interventions will differentially fuel specific personal resources, such as positive affect, optimism, mindfulness and public sector motivation, and subsequent well-being. We additionally consider the moderating role of organisational bureaucracy.

To answer these questions, an experimental diary study with a pre- and post-survey will be conducted in Autumn 2021. Participants will be at least 150 public servants from local and regional administrations. Building on the JDR model, the pre-survey will contain baseline measures of well-being such as job engagement, exhaustion, positive and negative affect, work demands as red tape and baseline measures of three personal resources, optimism, mindfulness and PSM. Participants will allocate to one of the three intervention groups: positive reflection (PR), breathing exercise/mindfulness intervention (BE/MI), and societal impact reflection (SIR). During the following two to three weeks, participants will

receive daily notifications to engage with their micro-intervention. Additionally, daily measures of red tape, wellbeing and personal resources will be collected. Post- and a 4-week-follow-up-survey will contain the same measures as the pre-survey.

Results will be available in December 2021 which we expect will be in line with our hypotheses.

Limitation: Self-selection into the study will limit the generalizability of the findings. However, participants will be randomly assigned to one intervention group.

Micro-interventions posit a potentially effective measure to motivate public servants facing high job demands without the benefits of high external gratification.

The study will be one of the first to test the effectiveness of micro-interventions to fuel PSM.

- **COVID-19 and beyond: Challenges and opportunities for an age-diverse workforce.**  
Sara Zaniboni

This symposium combines research contributions from Australia, Europe, and USA designed to address new challenges and opportunities that workers of different ages may face in the COVID-19 era and post-COVID-19. The first three presentations focus on key work-related aspects (e.g., work characteristics, work motivation, occupational future time perspective) affected by the COVID-19 pandemic. Andrei, Chong, Parker, Zoszak, Petery, and Baird investigate the way work experiences of Australian mature employees have been impacted across the COVID-19 pandemic. Some preliminary results show negative effects on relational work characteristics, employability, and age climate, but also an increase of the meaning of work with a positive impact on employee wellbeing. Pak and Van Engen, in a qualitative study conducted in the Netherlands, explored how the COVID-19 pandemic can influence the motivation at work of employees of various ages. Some preliminary results show that social support appears to be an important facilitator of motivation at work during the pandemic; in contrast, stressful demands and lack of social contact appear to act as barriers. Zaniboni, Pfrombeck, Feierabend, and Grote, in multiple studies in Italy and in Switzerland, assess the role of occupational future time perspective in successful aging at work, before and during the COVID-19 pandemic. Results show that individuals' perceptions of their opportunity in the employment context is more important for older workers. Moreover, work autonomy seems to enhance occupational future time perspective in overcoming COVID-19 work challenges for older workers. The last two presentations focus on work ability and health issues, with a particular attention to the implications related to the pandemic. Noting that previous research illustrates that individuals' perception of their ability to continue working is a key aspect for supporting an aging workforce during the pandemic, McCarthy, Truxillo, O'Shea, Brady, and Cadiz develop and validate a multi-dimensional measure of perceived work ability to better understand the work ability construct and relationship to worker health, wellbeing, and workforce participation. Shao, Goštautaitė, Wang, and

Ng, using data from 35 European countries and USA, investigated the relationship between employee age and sickness absence mediated by physical health issues and work engagement. The results highlight the age-related resource gains and losses in a cross-national setting, with relevant implications for promoting the health and work engagement of aging workers, particularly during challenging times such as the COVID-19 pandemic.

The symposium expands knowledge and suggests fruitful strategies for supporting workers of different ages in overcoming the challenges and enhancing the opportunities raised by the COVID-19 pandemic.

The workforce is becoming more age-diverse, and researchers and practitioners are examining ways to accommodate the needs of workers of all ages. This symposium aims to contribute in understanding how to help workers of different ages in mastering COVID-19 work-related aspects.

- **The technology and age at work era.**  
Sara Zaniboni

Purpose. This symposium combines theoretical and research contributions from Europe, USA, China, and Australia, designed to increase the understanding of the relationship between age and technology in the workplace. The first two presentations focus on literature reviews and theoretical approaches to define frameworks on how technology interacts with age-related aspects. Bellotti, De Angelis, Zaniboni, and Pietrantoni, in a scoping review, deepen the knowledge on how to design inclusive technologies to create workplaces that fit the needs of workers of different ages, to keep them engaged and productive for the entire span of their working life. Findings underline the impact of technology design on workers of different ages, facilitating or hindering performance- and engagement-related outcomes. The drawn recommendations help to design age-sensitive technologies for the workplace. Xie, Fang, Wang, Sheng, and Settles develop a theoretical framework to illustrate how different digital technologies can help in facilitating older adults' successful aging in both work and non-work domains. Their results show that different actors (e.g., policy makers, technologies designers and providers) can work together in fitting digital technologies with older adults' needs. The drawn recommendations show how to maximize the beneficial impacts of digital technologies on successful aging in both work and non-work domains. The last two presentations are empirical contributions focused on older workers and how to help them keep up with technology at work. Specifically, these contributions reports results on how personal and social perceptions regarding age can affect the possibility for older employees to successfully master technology at work during their entire lifespan. Fasbender and Gerpott explore how older employees' technology use at work can be facilitated such that older employees continue to learn and use technologies throughout the lifespan. They propose that technology is perceived as more useful when employees think that they have plenty of time and opportunities ahead in their working life. Data collection is in progress. The presenters expect that there will be a negative relation between age and perceived usefulness of technology as well as future time perspective, which in turn reduces technology use. Moderators of these relations will be explored. The recommendations focus on how to facilitate older employees' usage of technology in the workplace. Iles,

Andrei, Parker, Petery, and Baird focus on science, technology, engineering, and mathematics (STEM) jobs and perceived age bias, as a mechanism explaining older worker attrition in the STEM industry. The study results suggest that the belief that older workers are untrainable and struggle with technology place them at increased risk of age bias and discrimination in technology-driven environments. Moreover, their findings provide insights into the value of supportive leadership in reducing older worker attrition through leaders' ability to manage perceptions and experiences of age bias. The recommendations drawn inform leadership intervention research in creating age inclusive environments for the STEM workforce.

The symposium expands knowledge and suggests fruitful strategies for supporting workers of different ages in interacting with technology at work. The recommendations drawn help in designing age-sensitive technologies, in maximizing the impacts of digital technologies on successful aging; finally they help older employees and leaders in successfully dealing with and managing technology in the workplace.

The workforce is becoming more age-diverse, and new technologies are progressively expanding and changing the way we work. This symposium aims to contribute in understanding how to help workers of different ages in successfully mastering workplace technology.

- **Distance makes leaders essential: How task- and relations-oriented leaders are endorsed and satisfied in remote work contexts.**  
Jian Shi

There is a strong consensus in leadership research that “one size fits all” has consistently applied to specific prototypical leader attributes and behaviours. However, these findings only have been confirmed in the conventional context of leadership built on the face-to-face interactions among leaders and followers. A handful of studies have acknowledged that exploding remote work accelerated the speed of change towards remote leadership and virtual management. No matter which concrete ideal attributes leaders possess, they have been forced to engage remotely and virtually. More importantly, the critical precondition of remote leadership that has always been ignored is the physical distance, how “distant” or “close” followers are physically from the leaders. Thus, this poses the question of if the predictors of ideal leaders also apply in remote contexts. Put differently, when there is a physical distance between leaders and followers, the same attributes that make for ideal leadership may no longer apply in a remote environment. Accordingly, we draw on the implicit leadership theory (Lord et al., 1984) and the ascription-actuality trait theory of leadership (Antonakis, 2011), we assume that relations-oriented leader prototypes would be different for leadership functions over the task-oriented one, those who are perceived to have more leader-like qualities and targeted as high potentials and endorsed for leadership. Thus, we propose that relations-oriented leader attributes become more endorsed and satisfied than task-oriented ones

when followers work remotely or face-to-face with the leader. Furthermore, we argue that task-oriented attributes that leaders actually possess will be less perceived and satisfied by followers when they work remotely than face-to-face. However, the relations-oriented attributes will be ascribed to the prototypes of ideal leaders when followers work remotely than face-to-face, increasing their endorsement and satisfaction with the leaders.

Methodologically, we manipulated both leader attributes and physical distance of leader-follower dyads in a controlled scenario-based experiment, resulting in a 2 (leader attributes: relations- oriented vs. task-oriented) x 2 (physical distance: high vs. low) between-subjects design. We finally recruited 140 working adults from one Chinese crowdsourcing platform who must have full-time employment and work with direct supervisors. As predicted, task-oriented leaders became less endorsed when participants had high-level physical distance with the leader instead of low-level physical distance. However, against the prediction, relations-oriented leaders also became less endorsed when participants had a high-level physical distance with the leader instead of a low-level one. Moreover, as predicted, there were significant differences in satisfaction with the leader for participants between leader attributes and physical distance with the leader. Also, participants were less satisfied with task-oriented leaders when they had high-level physical distance with the leaders than did low-level physical distance. Furthermore, participants were more satisfied with the relations-oriented leader than the task-oriented one when they had a high-level physical distance from the leaders.

The present research makes several important theoretical contributions to the extant literature on leader attributes, leader distance, and remote leadership. First, this research contributes to leader attributes research by revealing the superiority of relation-oriented leaders over task-oriented ones in remote work contexts. Second, this research contributes to leader distance theory by investigating the downsides of physical distance on leadership functions. Third, this research contributes to remote leadership literature by identifying the innate obstacles of leadership perceptions, particularly through underrepresented attributions. Although ideal leader attributes are generally recognized as crucial for leader selections and leadership developments in organizations, we suggest that managers should tailor their leadership behaviours associated with certain attributes, fit better for the diverse work contexts. Moreover, we recommend that managers are supposed to pay much attention to potential physical and even social distance, particularly in remote work. Last, we suggest that organizations should develop a more interactive and supportive climate among managers and employees to overcome the downsides of remote work. Admittedly, the present study has several limitations that should be discussed and addressed by future research. First, although we mirrored the manipulation materials used by Ehrhart and Klein (2002) and adapted the control condition with attribute prototypes to be more conservative, the manipulation primed overly positive impressions of leader attributes, as the overall ratings of leader endorsement for two attributes were relatively high. Second, this study merely emphasized the physical distance among direct supervisor- subordinate dyads, which may overlook the potential confounds of the structural distance with the leader (e.g., hierarchical difference). Third, despite the random assignments and nearly equal distribution for gender, the manipulation of the new supervisor neglected the gender bias of leaders. The keywords of the present study are leader attributes, leader distance, and remote work.

- **Telework satisfaction and wellbeing during COVID-19 lockdown in Spain: Are children a resource or a demand?**

Joanna Blahopoulou; Silvia Ortiz-Bonnin; Esther García-Buades; Gema Torrens Espinosa & Maribel Montañez Juan

The research goal is to study telework satisfaction in a context where the main advantages of teleworking (e.g., less work interruptions) were missing, and to analyse its effects on subjective wellbeing during the COVID-19 lockdown.

According to the spill-over hypothesis (Bakker & Demerouti, 2013), job satisfaction is one of the determinants of subjective wellbeing because positive experiences at work can influence other life spheres, which enhance wellbeing. We extend these arguments to telework satisfaction.

Our longitudinal study explores the relationship between telework satisfaction (time 1) and subjective wellbeing (time 2) during the COVID-19 lockdown, with a time lag of one month. Data were collected through an online survey in Spain (N=111). Building on Staples et al.'s work (1999), we measured telework satisfaction through a nine-item scale (i.e. facets like organization of working hours, possibility to concentrate without interruptions, supervisors' support, availability of ICT). Cronbach's alpha was .84. We measured subjective wellbeing through the WHO-5 (World Health Organization - Five Wellbeing Index) in its Spanish version (Topp et al., 2015). Cronbach's alpha was .84.

Telework satisfaction ( $b = .26, p < .01$ ) and the control variable 'children under 18 years old' ( $b = .21, p < .05$ ) had significant positive effects on subjective wellbeing. Further, telework satisfaction and 'having children under 18 years old' were significantly negatively correlated ( $r = -.34; p < .01$ ). Interestingly, employees with children felt less telework satisfaction but higher subjective wellbeing.

The generalization of the results is limited because of a highly feminized (80%) snowball sample. Furthermore, our data allowed studying only short-term effects of satisfactory telework.

Future telework studies should explore further outcomes of telework satisfaction in crisis and non-crisis times, measuring long-term effects (with children at home) and contributing to the validation of the telework satisfaction scale. Furthermore, we send a clear message to practitioners: Organisations can improve employees telework experience. The effort will not be in vain: First, teleworking is here to stay, thus designing adequate telework conditions will prepare organizations for the Post-Covid-19 era. Second, wellbeing is a widely neglected area of inquiry within the field of HRM but a relevant outcome for the success of a company (Baptiste, 2008).

First, we add to the literature by providing empirical evidence that having children at home while teleworking is likely to be both a "resource" (compensating loss of social relationships at workplace) and a "demand" (increases home demands and workload; Shockley et al., 2021). Second, the novelty of this study is that we evaluate the level of satisfaction with telework using a specific set of items. Third, our longitudinal design supports the causal interpretation of the effects moving forward from previous cross-sectional research.

- **The effect of bystander responses on target outcomes in workplace bullying.**  
Kara Ng; Karen Niven & Guy Notelaers

While research has consistently indicated that targets of workplace bullying suffer poor well-being outcomes, our understanding of bullying as a social phenomenon is still relatively lacking. There are few studies examining the role bystander responses can have on target well-being.

Workplace bullying is described as a variety of negative behaviours occurring over an extended period, repeatedly, which has a detrimental impact on a target's work. Targets often report adverse effects of bullying, such as poor mental and physical health and low work engagement. Recent work has expanded our understanding of bullying beyond target experiences, acknowledging that bystanders can enact a variety of responses that can influence the bullying situation. Researchers have conceptualised responses using several categories: active constructive (e.g., proactively defending the target or confronting the perpetrator); passive (e.g., doing nothing); and active destructive (e.g., actively joining in on the bullying). Our study draws upon the Job-Demands Resource (JD-R) Model to explain how workplace bullying, conceptualised as a demand, can decrease employees' well-being. We operationalise well-being in somatic symptoms and work engagement, which are two focal outcomes in the JD-R Model. We propose that the number of active constructive bystanders serve as a resource and can buffer the negative effects of bullying for targets. Alternatively, the number of passive bystanders serve as a further demand upon the existing bullying demand. This 'demand x demand' interaction can create a 'resource loss spiral', in which demands accumulate and worsens bullying's negative effects.

We used a multilevel design, with bystander responses captured at a group level. Our final sample consisted of 572 employees within 55 work groups, in a large Dutch university. All participants responded to a measure of workplace bullying; those who responded zero to all items, or 'non-targets', then presented with a question about their responses as bystanders. We chose to differentiate between targets and 'non-targets' in line with past work suggesting not to conflate bystander and target experiences as they may confound each other.

There were five options in the bystander question. The first two options represented an active constructive ("I tried to prevent this type of behaviour or even stop it") and passive ("I kept out; in other words, I remained passive") response, while the third and fourth options described an active destructive ("Someone else initiated this type of behaviour and I went along with it") and a perpetrator ("I initiated this type of behaviour") response respectively. Participants could also fill in a textbox if they did not feel their responses fit into the above options. These open-ended responses were coded by two members of the research team into one of the four bystander response types.

We ran a series of multilevel models in MLWiN. Findings indicate that targets reported somatic symptoms and lower work engagement. A greater number of passive bystanders in a work group worsened the negative relationship between bullying and work engagement, while a

greater number of active bystanders buffered the same relationship. There were no significant moderating effects of bystanders on somatic symptoms.

Due to the cross-sectional nature of our study, we could not definitively establish the causal direction of effects. A longitudinal design would address this and allow us to observe if bystander responses and target outcomes change over time (for example, somatic symptoms may take longer to emerge). Further, we studied only a small number of bystander responses. Future research may also seek to explore a wider variety of bystander behaviours and examine if they have different effects on target outcomes.

Our study provides empirical support to a growing body of conceptual work examining target and bystander experiences. Moreover, we frame bullying as a demand within the JD-R Model and explore the interactive effects of multiple demands, a concept that has gone relatively unnoticed in the literature. Findings show the importance of bystander behaviour in the bullying process – that it is a group problem and not simply between the target and perpetrator. Practitioners can use this information to develop more comprehensive interventions against workplace bullying, such as encouraging active bystander behaviours and emphasising group responsibility.

Our study is one of the first to quantitatively examine the effect of bystander behaviours on target well-being, which expands our understanding of bullying as a social issue.

- **What factors contribute to perceptions of organizational inclusion?**

John Hackston

Previous research has shown that greater perceived inclusion is associated with higher employee engagement and job performance (Sabharwal, 2014). However, there has been little research into how an employee's personality might affect their perceptions of organizational inclusion.

This study aimed to:

- Develop short inclusion scales for use by professional practitioners and in research.
- Investigate organizational factors and individual differences, including personality, affecting perceived workplace inclusion.
- Develop evidence-based recommendations to build feelings of workplace inclusion amongst employees.

Following a review of existing scales of workplace inclusion (Mor-Barak, Cherin, & Berkman, 1998; Nishii, 2013; Pearce & Randel, 2004; Roberson, 2006), 29 items relating to perceived inclusion were developed, measuring, as four dimensions, the extent to which an individual sees themselves as:

- Valued by and at home in their organization.
- Included by their co-workers.
- Included by their manager.
- Being allowed to be their authentic self.

These were included in an online survey, along with questions on respondent gender, sexual orientation, ethnicity, age, job level, size of organization and country of employment, and regarding organizational diversity and/or inclusion programmes. This was distributed to a convenience sample of individuals from a wide range of organizations who had previously completed either the MBTI or FIRO-B personality questionnaires. Analysis was based on a final sample of 251 individuals, mainly working in the US or UK.

Respondents were largely positive about workplace inclusion, with an overall item mean of 3.5 on a 5-point scale. Each dimension held together well, with good internal consistency reliability. A univariate analysis of variance was used to establish which factors had the greatest degree of relationship with each dimension.

The specific effects of these factors were as follows:

- Respondents who described themselves as “Heterosexual or straight” had on average the highest levels of inclusion. Those who chose “Prefer not to disclose” (even though it was made clear to respondents, at several points, that the survey was anonymous and confidential) had the lowest. Individuals who feel that they cannot state their orientation (or cannot risk this) may feel significantly less included.
- Respondents working in organizations that had some form of inclusion programme or initiative in place felt more included than those working for organizations that did not.
- Respondents working in organizations that had some form of diversity programme or initiative in place felt more included than those working for organizations that did not.
- Respondents at the executive or senior management level felt more valued by their organization than middle managers, first line managers or non-supervisory employees.
- Respondents working in smaller organizations felt more included by their co-workers than those working in larger organizations.
- Respondents with Introverted Thinking personality preferences felt the most included by their manager, those with Introverted Sensing the least.
- Respondents who described themselves as “White” felt the most allowed to be their authentic self, and those who described themselves as “Latino, Latina or Hispanic” the least.

The study did not investigate how neurodiverse people or people with disabilities perceive workplace inclusion, though this may have an effect (Dobusch, 2020; Kulkarni, Boehm, & Basu, 2016; Walkowiak, 2021). Given the nature and size of the sample, and the quantitative nature of survey research, it was not appropriate to collect this data.

This study has produced four robust scales of perceived inclusion, which can be used freely in future research and by organizations wishing to carry out a confidential inclusion ‘climate check’. Seven practical recommendations for increasing workplace inclusion have also been developed, based on the detailed research results. These will be presented in full at the congress. Further research is ongoing to link the four scales with models of inclusive leadership and of well-being at work.

This study is one of very few to look at the impact of personality on perceived workplace inclusion, and the only one to apply the personality type model widely used by practitioners.

Video presentation is available by following this [link](#).

- **Does temporal or spatial distance influence willingness to strike? Test of the applicability of the construal level theory.**  
Denise Vesper; Cornelius J. König & Michelle Zwolinski

One important form of collective voice can be strikes which are a powerful tool during collective bargaining, especially for trade unions. A crucial aspect of strike preparation is employees’ willingness to strike. However, research on how to enhance (or decrease in view of employers) this willingness to strike has been sparse. Hence, we conducted two studies testing whether the spatial and temporal distance of a strike have an effect on willingness to strike. Following suggestions of construal level theory, we tested in the first study (N = 266), whether heightened spatial distance (i.e., working from home instead of the office) decreased the willingness to strike. The second study (N = 259) assessed whether the increase in temporal distance (i.e., a strike in six months compared to a strike tomorrow) increased the reported willingness to strike. Participants in both studies were randomly assigned to one of the conditions and had to read a short scenario. All participants had to work at least 15 hours per week in order to participate. In Study 1, the scenario either said that the participants should imagine to work from home or to work on-site. Then the scenario said that the trade union thought that their employer did not appreciate the Covid-19 circumstances enough and they thus called for a warning strike. In Study 1, this warning strike was to take place on the next day and was supposed to follow the Covid-19 regulations. In Study 2, all participants were told that they worked on-site, but the time of the warning strike was manipulated between the two groups. The warning strike was either planned to take place on the next day or in six months. We only found support for the spatial distance hypothesis, that is those participants who imagined to work on-site reported a higher willingness to strike compared to those who imagined working from home. Furthermore, these participants also reported a more positive attitude to this strike than the participants in the working from home condition. The hypothesis regarding temporal distance could not be supported, as both groups did not differ significantly in their

willingness to strike. A limitation of this research is that we used short, hypothetical scenarios. Hence, future research should assess whether these obtained effects can be found in the field, too. Our results hint at potential adjusting screws that trade unions (or employers) could use to influence willingness to strike. As working remotely is becoming more prevalent, trade unions and employers should consider the effects that this can have on strike participation and other aspects of collective bargaining. Our studies were the first to assess whether different distances might have effects on employees' willingness to participate in strikes. More research is needed to ensure that employees' collective voice actions such as strikes remain a powerful tool despite the changes in the working world.

Video presentation is available by following this [link](#).

- **Creativity in virtual natural environments: Virtual vastness fosters subjective creative performance.**  
Brid Karacan; Carolin Wienrich; Olga Kombeiz & Marc Erich Latoschik

Prior work indicates that virtual natural environments (VNEs) enhance creativity (Fleury et al, 2021). However, there is a lack of a structured approach to compare environment characteristics with respect to their different creativity impacts. We present such a comparison based on the construal level theory (Henderson et al., 2011). We compared two types of VNEs: vast (e.g., far objects) vs. narrow (e.g., near objects) to induce concrete vs. abstract thinking.

Previous studies demonstrated the importance of creative self-efficacy in the creative process showing a positive relation between creative self-efficacy and creative performance, especially if creativity is self-reported (Haase et al., 2018).

Integrating the research on virtual work environments, psychological distance, creative potential of the work environment (McCoy & Evans, 2002), and creative self-efficacy, we assumed:

The vast VNE (see Fig 1) activates far psychological distance in comparison to the narrow VNE (see Fig.2) and leads to a higher perceived creative potential of the environment. In turn, individual's creative self-efficacy will increase and result in higher subjective creative performance.

Participants (N = 41, female, aged 18 – 34) were randomly assigned to one of two experimental conditions for a between-subjects design. The virtual environment was built with Unity 2019.4.26f1 using the assets PolyPerfect, Photon, Vuplex and applied by the Oculus Rift S. Independent variable: Type of VR environment: vast (far objects) vs. narrow (near objects) Dependent variables: Perceived creative potential of the environment (McCoy & Evans, 2002); creative self-efficacy (Tierney & Farmer, 2002); subjective creative performance in a creativity task (Guegan et al., 2017).

As expected, results yielded a significant indirect effect of vast VNE on subjective creative performance. More concrete, the vast (vs. narrow) environment improves the perceived creative potential of an environment, which increases creative self-efficacy, and in turn leads to a higher subjective creative performance (mediation effect, see Fig.3).

The present research examined the impact of type of nature presented in virtual reality on subjective creative performance. We demonstrated that a vast VNE has an indirect effect on creativity. The vast environment enhances the perceived creative potential of the environment, increasing individuals' creative self-efficacy and in turn, promotes subjective creative performance. The present research contributes to the understanding of the impact of the VNE on creativity indicating the importance of the specific nature type and taking into account the construal level theory. Moreover, present research uncovers underlying processes of work-environment and creativity relation. These findings offer new possibilities for the design of workplaces, in which people work on new ideas.

- **Comparison of economic benefits between two approaches for decreasing sickness absence among public sector employees in Sweden.**

Jonathan Severin; Mikael Svensson & Magnus Akerstrom

The aim of this study was to evaluate the economic benefit of an organizational-level workplace program for decreasing sickness absence, by first evaluating the costs and benefits for the program compared to business as usual, and further to compare the costs and benefits between two approaches used in the program. Work-related illnesses create a vast economic burden for employers and society. Organizational-level workplace interventions are recommended to prevent these illnesses, but the knowledge about the economic benefits of such interventions is scarce.

A program was implemented in a large Swedish administrative region between 2017 and 2018, containing two different approaches: a monetary support approach (MSA) and monetary support combined with facilitator support (FSA). The costs and benefits of the program were evaluated using cost-benefit analysis. The results were compared to business as usual, using aggregated workplace data to measure benefits, and wages and invoices to measure costs. Economic benefits of reduced sickness absence were based on the value of reduced production loss and direct sick pay costs, respectively. Sensitivity analyses were used to assess the robustness of the results.

The program had a positive net benefit of MSEK1.7/year when measuring productivity loss, where the FSA had a net benefit (MSEK9.6/year) and the MSA had a net loss (MSEK-0.2/year). A negative net benefit was derived when measuring direct sick pay costs (MSEK-2.7/year). For FSA, the implemented interventions were found to fit the respective workplace challenge to a larger degree compared to MSA. The intervention effect affected the net benefit the most.

One limitation was that effects on sickness absence were estimated separately for the intervention and reference groups (workplaces within the same operational area as the intervention groups) and then compared. Besides, the total sickness absence was higher for the external support approach before the intervention, suggesting that the potential for impacts was larger for this approach. Another limitation is that the human capital approach was used, where benefits could have been overestimated.

Organizational-level workplace interventions can be economically beneficial for employers in terms of reducing the productivity loss. To achieve this benefit, implemented interventions need to fit the workplace challenge. Decision makers should not fear an initial high cost if evidence-based methods are used. A net loss was seen when only including reduced sick pay costs. However, future evaluations need to include other aspects than the value of reduced sick pay costs to fully capture the total net benefit.

This study gave an opportunity to evaluate and compare the costs and benefits for two different approaches used when implementing organizational workplace intervention, where the knowledge can help decision-makers not only to choose what measures to implement, but also knowledge on how to implement such measures.

- **Improve your work-life-balance – Effects of a resource-oriented online training on work-life balance and wellbeing.**  
Alexandra Michel; Judith Rapp; Maike Strewick; Sarah E. Althammer & Anne M. Wöhrmann

Some employees report struggles in separating life domains and detaching from work. Especially, during the Covid-19-pandemic many employees work in home office and report difficulties in separating life domains. Aim of this study was to evaluate the effectiveness of two online interventions teaching different strategies for separating life domains in order to promote work-life balance and wellbeing. Thereby, we evaluate whether teaching behavioural, temporal, physical, communicative and technological tactics (Kreiner et al., 2009), transition rituals (Ashforth et al., 2000) and mindfulness as a cognitive-emotional segmentation strategy (Michel et al., 2014) is more effective than teaching behavioural, temporal, physical, and communicative tactics and transition rituals only.

In line with boundary theory employees should be enabled to find their own way to balance roles and tasks in different life domains. Research has shown that boundary management is positively associated with work-life-balance and wellbeing.

Using a randomized waitlist control group design, we evaluated the effects of two different online self-training interventions teaching employees different segmentation strategies with the aim to promote work-life-balance and wellbeing. In three weekly modules, participants reflected on their personal boundary management and learned different segmentation strategies. At the end of each module participant were instructed to conduct short daily tasks in the following workweek. Participants in the first intervention group (IG1) focussed on behavioural, temporal, physical, communicative and technological segmentation tactics as well as transition rituals. Participants in the second intervention group (IG2)

learned in addition to use mindfulness as a cognitive-emotional segmentation strategy. About 220 participants were randomized to the two intervention groups (NIG=73, NIG2=73) and to the control group (NCG=72).

Data will be collected in May and June 2021. To test our research question and hypotheses we will conduct covariance analyses to compare the effectiveness on the two different interventions in comparison to the control group. Thereby, we will focus on work-life balance and wellbeing.

Limitation: All data were self-reported.

Our study contributes to research on boundary management interventions. It tests the proposition that boundary management trainings including behavioural, temporal, physical, and communicative tactics and transition rituals are even more beneficial when combined with mindfulness as a cognitive-emotional segmentation strategy (see Michel et al., 2014).

This study underlines the usefulness of self-training interventions teaching boundary management strategies. The study was conducted during the Covid-19-pandemic where many employees worked in home office and may had struggles in separating life domains and detaching from work. It can provide guidance for designing boundary management strategies in a working world with increasingly blurring boundaries between work and private life.

- **Daily effects of face-to-face and cyber incivility via sadness, anger and fear.**  
Karen Niven; Catherine Connolly; Christopher Stride & Samuel Farley

As much as 96% of the workforce have been directly exposed to workplace incivility (Porath & Pearson, 2010), that is, low intensity deviant interpersonal behaviors, such as putting someone down and ignoring someone, that typically have ambiguous intent to harm (Cortina, Magley, Williams, & Langhout, 2001). Not only is workplace incivility highly prevalent, but it also has substantial detrimental consequences for those exposed to it, e.g., for their daily well-being and commitment (Zhou, Yan, Che, & Meier, 2015). Although research is clear that incivility is harmful for workers, less is known about why it translates into poorer daily outcomes. This question is important, because the pathways through which incivility transmits its effects may suggest promising avenues for intervention. In addition, while research evidences the occurrence and ill-effects of ‘cyber incivility’, that is, incivility that occurs during technology-mediated interactions (Yuan, Park, & Sliter, in press), we know surprisingly little about the relative daily effects of face-to-face and cyber incivility, and whether these are elicited via the same pathways. The goals of this research are to shed light on mechanisms of the daily effects of both face-to-face and cyber incivility.

We focus on emotion as the key pathway through which face-to-face and cyber incivility transmit daily effects. According to affective events theory, emotions are feeling states experienced in relation to workplace events that shape job-related well-being and attitudes (Weiss & Cropanzano, 1996). Drawing on appraisal theories of emotion (Smith & Lazarus, 1993), we argue that both face-to-face and cyber incivility can stimulate appraisals that underlie the discrete emotions of sadness, anger, and fear. In turn, and drawing on theories of the effortful and draining nature of emotion regulation (Tice, Bratslavsky, & Baumeister, 2001) and relational outcomes of emotion (Lopez-Kidwell, Niven, & Labianca, 2018), we argue that these discrete emotions can increase workers' daily emotional exhaustion and turnover intentions.

We conducted a diary study of 69 part-time workers, who were asked to complete a diary entry on each day of work over a month-long period. In the diary, we assessed workers' experiences of incivility, sadness, anger, fear, and the outcomes of interest. In total, participants contributed 636 observations.

We analyzed our data using a sequence of nested multilevel models, using Mplus v8, controlling for lagged values to test whether incivility predicted a change in emotion and in turn a change in exhaustion and turnover intention. We found that face-to-face incivility had a pronounced daily impact on workers' exhaustion and turnover intention, and that this impact was mediated by increased feelings of sadness and anger, but not fear. In contrast, cyber incivility only affected workers' emotional exhaustion as a result of increases in sadness.

Limitations of this research include the relatively small sample size in terms of the number of participants. We also used single item indicators for our mediator and outcome variables. A further limitation is the concern for common method bias, given that all variables in the study were self-reported.

In research terms, our study contributes a more comprehensive and robust understanding of why incivility has negative daily effects. By studying multiple emotions simultaneously as mechanisms, we provide insight into which emotions play an explanatory role over and above others that may be experienced. We further expand current understanding by contrasting face-to-face and cyber incivility. The literatures on face-to-face and cyber incivility have developed quite separately and very few studies have directly compared the two. In practical terms, our findings underscore the importance of organizations dealing with incidents of incivility, especially that which occurs face-to-face. Given the strength of mediation, tackling appraisals of incivility (e.g., by introducing safe spaces to discuss behaviors that have caused unease and better reporting systems, to enhance appraisals of low coping potential that underlie sadness) could also be helpful.

Our findings add value by shedding light on discrete emotions as mechanisms of the daily effects of incivility, and by directly contrasting the effects of cyber and face-to-face incivility.

- **Toward an Understanding of Proactive Strategic Behavior from a Social Identity Perspective.**

## Matthias M. Pfisterer & Katleen De Stobbeleir

When organizations are faced with a rapidly changing environment and operate with increasingly decentralized workplaces, employees are often required to participate in shaping their organization's strategy and scholars have highlighted the need to further examine their proactive strategic behavior (Parker & Collins, 2010; Schilpzand et al., 2018). While literature predominantly focused on proactivity directed at the immediate work context (Tornau & Frese, 2013), little is known about how individuals discriminate between the various proactive behaviors and what determines their engagement in proactive strategic behavior. To answer these questions we draw from social identity theory (Tajfel, 1974) and examine the link between organizational identification and proactive strategic behavior. By examining the underlying factors of employees' efforts to shape their own work and their organization, we aim to provide insights on essential aspects that shape how individuals' work and careers will look like in the future.

To succeed and thrive in today's dynamic world of work, employees increasingly need to be proactive, i.e., anticipate and behave in self-starting ways (Ashford et al., 2018). Employees can engage in a variety of proactive behaviors, which fit into three categories (Parker & Collins, 2010): (1) Proactive work behavior, which describes efforts such as taking charge of the situation and suggesting improvements in the internal work context (e.g., Morrison & Phelps, 1999); (2) proactive person-environment fit behavior, which includes feedback-seeking and negotiating job changes, as efforts to improve the fit between the person and the organizational environment (e.g., Ashford & Black, 1996; De Stobbeleir et al., 2011); and (3) proactive strategic behavior, which consists of efforts to scan the environment and sell issues relevant to the organization's strategy and its fit with the external environment (e.g., Dutton & Ashford, 1993).

Proactivity literature has predominantly focused on proactive behavior aimed at the immediate work context, i.e., proactive work behavior and proactive person-environment fit behavior (Parker & Collins, 2010; Wu, Parker, Wu & Lee, 2018). Increasingly, however, employees also engage in proactive strategic behavior to shape their organization's strategy and its fit with the external environment (Parker & Collins, 2010), but little is known about the underlying motivation of employees to engage in this proactive strategic behavior on behalf of their organization. We draw from social identity theory (Tajfel, 1978), a lens that has been used to study why individuals exert efforts on behalf of a collective. Through identifying with their work group or organization, employees attain a sense of belonging and oneness that blurs the boundaries of their own self and the collective (Mael & Ashforth, 1992) and researchers have argued that stronger organizational identification is linked to proactive strategic behavior (Parker and Collins, 2010).

To test the relationship between organizational identification and proactive strategic behavior, we conduct a four-wave longitudinal study (from May 2020 to August 2021). Participants are 213 individuals (37% female) with a mean age of 44.86 at wave 1.

Preliminary results of a first cross-lagged panel model analysis across two waves provide support for a positive link between organizational identification and strategic scanning. The effect of organizational identification on strategic scanning was positive and significant, while the effect of strategic scanning on organizational identification was insignificant, hence not providing support for a reciprocal relationship.

Our focus lies on the link between organizational identification and proactive strategic behavior. Further research is needed to investigate other the link between other forms of identification and proactive behavior to provide a more complete understanding. Additionally, while we assume a causal relationship in our time lagged model, future research may test the causality in experimental studies.

This research contributes to the understanding of the antecedents of proactive strategic behaviors and extends research on the underlying motivational mechanisms (e.g., Parker et al., 2010) and contextual and dispositional factors (Grant & Ashford, 2008). Finally, organizational identification and its interplay with proactive strategic behavior may also have practical implications (Strauss & Kelly, 2016). For example, research shows that organizations can foster the organizational identification of their members (Reade, 2001) and thereby may also stimulate their proactivity and channel it towards the desired outcomes.

- **The influence of shared leadership on leader behavior: A longitudinal study.**  
Kai N. Klasmeyer; Amelie V. Güntner & Joyce Elena Schleu

Leadership has mostly been considered as an unidirectional process centered on leaders influencing their followers. However, recent theoretical developments indicate that followers may also have an impact on their formal leader. In this pre-registered study, we investigate the interplay between shared leadership and formal team leadership (i.e., empowering leadership). We predict that leaders interpret their team's shared leadership as an investment to reach for common goals. Accordingly, their team's effort should improve the social exchange relationship between leaders and their team, reflected in higher trust which in turn should increase empowering leadership behavior of the leader. Further, we propose that this indirect relation is first-stage moderated by leader self-efficacy. We tested our predictions in a longitudinal study with 721 team members and their leaders nested in 169 teams. Results from Bayesian cross-lagged panel modeling support our predicted mediation effect, while also pointing to a reverse effect of empowering leadership on shared leadership. The moderation effect was not supported. This study provides insights into the dynamic and reciprocal interplay between shared and formal leadership. Our findings underline that formal leaders do not perceive shared leadership as a threat, but rather value the team effort reflected in higher trust and decision latitude.

- **The best of both worlds: How qualitative and quantitative research can thrive together.**  
Annika Wilhelmy; Tine Köhler; Lillian Eby; Melrona Kirrane & Chris Woodrow

A recent review (conducted by Wilhelmy and K hler) indicates that most qualitative research published in the core WOP journals is used to support or prepare quantitative research, rather than as a stand-alone study. The panel discusses fruitful ways of using qualitative methods, either in conjunction with quantitative methods or as stand-alone method, to address unique WOP research questions. The panel will highlight the value of qualitative research methods in the advancement of WOP as a methodologically diverse and holistic science.

The session brings together prominent WOP researchers who have used qualitative methods (sometimes in conjunction with quantitative methods) for their WOP research. Panelists represent different qualitative approaches, experiences with publishing qualitative work in diverse outlets, and editorial perspectives of reviewing qualitative research for different journals. Each panelist plans to contribute a unique view on qualitative research and the methods that might prove most promising for future WOP research. Topics covered:

As a core component of the scientific research cycle qualitative research methods maximize external validity, adaptability to realistic research contexts, and research relevance and impact. This session highlights how WOP researchers can employ qualitative methods to address crucial WOP research questions and discusses challenges and opportunities for fieldwork and publication.

- **Reverse effects within the JDR-model: The role of approach and avoidance crafting.**  
Elisa Lopper; Malte Roswag; Jenny S. Wesche & Annkatrin Hoppe

Combining Job Demand-Resources model (JD-R; Demerouti et al., 2001) and Conservation of Resources Theory (COR; Hobfoll, 1989), there is evidence that the often confirmed effects of job resources and job demands on work engagement and exhaustion respectively also occur in reverse. The present study examines underlying mechanism of the reverse effects and proposed that a) approach crafting mediates the link between work engagement and job resources (i.e., job autonomy, empowering leadership) and b) avoidance crafting mediates the link between exhaustion and job demands (i.e., time pressure).

Extending the propositions of unidirectional relationships within the JD-R model, recent studies have shown that job resources and job demands not only affect work engagement and exhaustion, respectively, but that reverse effects between these variables prevail. Building on the COR theory which states that employees strive to maintain, protect or enhance their resources at work, employees can be active and change their job resources and job demands depending on their experienced level of work engagement and exhaustion, respectively. Such self-initiated changes are called job crafting. Job crafting includes employee-initiated actions with the intent to expand (i.e., approach crafting) or reduce (i.e., avoidance crafting) aspects of the job. Research suggests that engaged employees are motivated to stay engaged and generate their own resources at work. Approach crafting (e.g., increasing job resources) includes employees' actions to optimize their work environment and create their own job resources. Thus, work engagement can trigger approach crafting which further leads to higher levels of job resources. In contrast, experiencing high levels of exhaustion can signal a possible loss of resources, which – according to COR theory – stimulates employees to

conserve their resources. To preserve their resources employees can reduce aspects at work, for instances, by avoidance crafting. Although avoidance crafting is intended to help employees dealing with job demands, it might be rather maladaptive for the following reason: Avoidance crafting requires an investment of resources towards a goal that possibly cannot be achieved as job demands are given and often little changeable in today's work environment. Such a futile investment and loss of resources in turn may lead to higher levels of job demands. Consequently, exhaustion may stimulate avoidance crafting which further results in higher job demands.

Daily diary data were collected over a period of five consecutive workdays. Overall, 171 employees working from home were included in the data analyses.

Initial multilevel mediation analyses revealed that daily approach crafting mediates the link between daily work engagement and empowering leadership at the end of the working week. This result was not found for job autonomy. Furthermore, daily avoidance crafting did not mediate the relation between daily exhaustion and time pressure at the end of the working week.

Results should be interpreted and generalized with caution as data were collected under the circumstances of COVID-19 pandemic.

Results indicated that higher levels of work engagement motivate employees to expand positive aspects of their job (i.e., approach crafting) which can further increase the job resource empowering leadership. Engaged employees are able to craft their job and are, in turn, more often encouraged by leaders to act proactively. Thus, engaged employees can create their own gain spiral of resources through approach crafting. However, it seems that employees with high levels of exhaustion do not use their remaining resources to become active and try to conserve their resources by stepping away from negative aspects at work (i.e., avoidance crafting). Future research is needed to explain the reverse effect of exhaustion on job demands (e.g., Demerouti et al., 2004). For practice, job resources and job demands do not exclusively influence by managers or the organization (top-down) but can also be influenced via job crafting by employees stimulated from their work-related well-being. This can be considered when developing interventions.

The present study yields first insights into one underlying mechanism between work engagement and job resources as well exhaustion and job demands through approach and avoidance crafting.

- **Effects of digital transformation on job satisfaction and employee retention: An integrative framework.**  
Sarah Depenbusch; Mirko Schürmann; Niclas Schaper; Andreas Seifert; Jan-Philip Schumacher & Tammo Straatmann

The implementation of digital technologies can lead to technostress which refers to employees' inability of dealing with ICTs in a healthy manner (Ayyagari et al., 2011). However, not only the technology itself but also the way technological changes are carried out has an impact on

the attitude and behaviour of employees (Atanasoff & Venable, 2017). Therefore, this study investigates integratively how technological stressors and change characteristics influence employees' job satisfaction and their intention to leave.

Both research streams are combined by transferring them into an integrated framework which bases on the job demands-resources model (Demerouti et al., 2001). Therefore, we assume that technological stressors induce a health impairment process, leading to techno-exhaustion which in turn lowers employees' job satisfaction and increases their intention to leave (e.g. Maier et al. 2015). On the other hand, we postulate that change characteristics trigger a motivational process, fostering employees' readiness for change which in turn increases employees' job satisfaction and lowers their intention to leave (e.g. Holt et al., 2007; Oreg, 2006).

A research model was developed integrating the described effects of technological stressors and change characteristics on employees' job satisfaction and their intention to leave. To test the model, a longitudinal study with three points of measurement was carried out in organizations of different branches (e.g. automotive & mechanical engineering, healthcare & social welfare) (N=218 respondents). Based on the analysis results (e.g. model fit indices), the research model was reconfigured and tested again using the same methodology.

Results show that the analogy of the research model with the job demands-resources model can be partly confirmed. There exists a direct health impairment process of technological stressors on employees' intention to leave as well as a direct motivational process of change characteristics on employees' job satisfaction and intention to leave. In addition, it can be shown that change characteristics buffer the negative effect of technological stressors on employees' techno-exhaustion. The reconfigured model demonstrates that job satisfaction mediates the effect of technological stressors on employees' intention to leave. Furthermore, readiness for change and job satisfaction mediate the effects of change characteristics on employees' intention to leave. Finally, it could be shown that change characteristics buffer the effect of technological stressors on employees' techno-exhaustion.

For reasons of acceptance, the questionnaire did not include all change characteristics mentioned in the literature (e.g. Holt et al., 2007). Future research should validate the reconfigured model using a longitudinal study design with four points of measurement.

This study makes an important scientific contribution by integrating the research on technostress and organizational change. This integrative perspective supports organizations to implement new technologies in an employee-friendly way.

This study integrates research on technostress and organizational change by transferring them into an integrated framework that bases on the job demands-resources model (Demerouti et al., 2001).

- **Using Q Methodology to explore organisational culture.**

## Ashleigh Bennett

This paper will consider the use of Q methodology in conducting research on organisational culture and relate this to case study research. It will outline what Q methodology is and how it can be utilised, then describe its use and the benefits realised, when applied in a piece of case study research. It will demonstrate that Q methodology is a versatile tool that can be used by both academics and practitioners, to investigate social phenomenon, such as organisational culture.

Q methodology is a research method used in psychology and in social sciences, to investigate the subjective views of individuals, on a particular topic. Q combines qualitative and quantitative methods and has been shown to be an effective research tool when exploring and comparing shared understandings. Moreover, Q is designed to include all shared perspectives, including those that may be marginalised by more traditional methods. In a Q study, each participant is asked to sort and rank a set of statements, in a forced choice quasi-normal distribution. Factor and thematic analysis are then used to identify patterns and the most dominant viewpoints, with the intention of providing insight into the phenomenon under investigation.

The case study research was conducted in collaboration with a Police Service, to address organisational objectives around diversity and inclusion, particularly in relation to gender. The study aimed to explore the narrative of the organisational culture, in particular the basic underlying assumptions that are embedded and often unconscious and provide an examination of how roles are gendered.

A Q methodology study was used to gain insight into understandings of what makes an ideal firearms and tactical officer, for the purposes of improving inclusion and diversity. The participants (n=31) were police officers, strategically sampled to maximise diversity of gender, rank and role. Each participant was asked to sort and rank a set of statements, using online software, according to their own experiences and understandings of the ideal tactical and firearms officer. The Q sorts were then factor and thematically analysed to identify the following most dominant viewpoints: Factor 1 - The competent and knowledgeable officer; Factor 2 - The dependable and loyal officer; Factor 3 - The innovative team player and Factor 4 - The knowledgeable team player.

These most dominant viewpoints that were explored in semi-structured interviews to create a narrative of the organisational culture, and an examination of how the role is gendered. The viewpoints created a set of shared understandings between the researcher and participant and were used to guide and inform discussions. It is generally accepted that to bring about organisational change you must first understand the current culture, the different levels at which it is displayed, and how processes are created and reproduced. Q methodology provided a valuable mechanism for exploring these key elements of organisational culture.

The case study demonstrated the benefits of using Q methodology when quantifying and comparing individual experiences which is particular applicable to exploring organisational culture. Q methodology is a rigorous scientific method of studying subjectivity and a versatile tool that could be utilised by occupational and organisational psychologists, working in both academic research and applying practice in organisations.

- **Promoting diversity in teams through organisational communication.**  
Oriana de Saint Priest & Franciska Krings

Our research investigates whether prodiversity signals encourage work in diverse teams and if so, through which processes. We further analyze whether prodiversity signals foster unintended side effects, such as decreasing the deep level diversity of demographically diverse teams. Our work was worth doing as we uncovered that very short diversity policies increase the selection of age diverse teammates by an average 35% in our incentivized studies. We further show that this is likely due to diversity policies making more salient the desirability of work in diverse teams. Lastly we uncover that demographic diversity fosters less deep level diversity, but that this effect is independent of policy. Hence our research shows that prodiversity signals can be highly beneficial for fostering team diversity without yielding unintended side effects.

To encourage work in diverse teams, which has been shown to promote more creative decision making and faster problem solving, firms most frequently use prodiversity culture communication, which acts as a signal for what is valued and desirable. Yet work in diverse teams can create feelings of uncertainty, discomfort and even threat. To mitigate this stress, people might prefer to work with people who are similar to themselves. Thus prodiversity culture communication might encourage people to seek similarity on the basis of deep level traits, such as personality. This would be problematic as deep level diversity has been shown to be particularly beneficial for team performance.

We conduct three online studies (NStudy1=138; NStudy2= 156; NStudy3= 105), where younger participants have to choose other people they want to work with, from a set of different candidates varying in age and personality. Study 1 is a vignette study where participants have to imagine they will work together with the teammates they choose, while studies 2 and 3 are incentivized studies where participants are rewarded based on their team's performance on a food quiz. Participants in each study are randomly allocated to one of two experimental conditions. In one condition, there is a diversity policy encouraging work in age diverse teams and in the other condition there is not. Across our studies, we investigate how frequently people choose the older teammate and how much this can be explained by the presence of the diversity policy and by the extent to which the teammate chosen is similar to the participant in terms of personality. We also explore what drives the effect of the company diversity policy through the use of process variables, including commonly perceived advantages and disadvantages of diversity and perceived similarity with diverse teammates.

In our incentivized studies, we find that participants are 35% more likely to choose the older person when there is a diversity policy. Hence a very short diversity policy can have pervasive positive behavioral impacts. We further show that this impact is likely due to an increased salience

of the desirability of work in age diverse teams appearing through the diversity policy. Moreover, we highlight that the diversity policy does not significantly encourage people to work with teammates more similar in personality, hence avoiding undesirable side effects.

Our online studies investigate a situation in which participants are exposed to a diversity policy recommending work in age diverse teams and choose who they want to work with immediately after. Further research could investigate how long lasting the effect we find is and whether repeated exposure to the diversity policy magnifies or on the opposite fades out its initial positive impact.

Our research highlights that businesses wishing to foster work in diverse teams inside their organizations can do so in a very easy and cost efficient manner through the implementation of short diversity policies, without running the risk of reducing their team's deep level diversity. This conclusion is reassuring to both researchers and practitioners often struggling to find an impact of prodiversity signals inside organizations.

To our knowledge, we conduct the first research showing that prodiversity signals can successfully foster work in diverse teams, which is essential to reap the benefits of diversity on performance. Moreover, we target age diversity specifically, a topic that is often under-studied despite the growing presence of older workers in organizations.

Video presentation is available by following this [link](#).

- **Workplace mental health self-management questionnaire: Development and initial validation.**  
Camille Roberge & Sophie Meunier

This study seeks to develop and validate a questionnaire assessing mental health self-management strategies used by workers to promote their mental health and functioning at work: the Workplace Mental Health Self-Management Questionnaire (WMHSQ). Self-management strategies have been identified as a promising avenue to promote mental health and functioning at work. However, the absence of a validated questionnaire to assess the use of these strategies that can be adopted in the workplace limits empirical research on this topic.

The World Economic Forum forecasts that by 2030 the global annual cost of mental health disorders will represent over US\$6 trillion (Dewa, 2017). It therefore seems important to identify variables that can promote the functioning of employees experiencing psychological distress at work. Self-management, defined as behavioural, cognitive or affective strategies used by an individual to manage their symptoms, optimize their health and prevent relapse (Barlow et al., 2005; Lorigt & Holman, 2003), seems promising in this regard, yet has been little studied. Indeed, qualitative studies have highlighted the active role that workers can play by adopting strategies that allow them to continue working despite

symptoms of anxiety or depression (Bertilsson et al., 2013; Danielsson et al., 2017; Lork et al., 2019; Therrien 2020). However, a valid measure of such strategies is needed to pursue quantitative studies.

An initial list of 72 items representing self-management strategies was generated from the content of 25 interviews with workers experiencing depressive or anxiety symptoms. Experts on mental health at work (n=13) identified the 47 most relevant items. To validate the WMHSQ, workers aged 18 years and older and working a minimum of 15 hours a week were recruited through an advertisement on social media and through mental health organizations. A total of 365 workers from various job sectors completed the WMHSQ and criterion-related measures (depressive and anxiety symptoms, work functioning, self-management and coping). A total of 235 participants completed the WMHSQ again two weeks later.

Principal Component Analysis revealed a four-factor solution composed of 21 self-management strategies: Managing Thoughts and Emotions (n=6), Managing Recovery (n=4), Managing Relationships (n=6) and Managing Tasks (n=5). The WMHSQ shows adequate internal consistency, both at the scale and subscale level, and test-retest reliability. Correlational analyses support convergent and concurrent validity for all four subscales.

As this study is an initial validation of the questionnaire, its structure will need to be validated with confirmatory factorial analysis in future studies. In addition, future longitudinal studies should explore the predictive validity of the WMHSQ on variables such as well-being and psychological distress at work, work functioning, presenteeism and absenteeism.

The strategies identified in the final solution of the WMHSQ can form the basis for developing practical tools and interventions to promote mental health self-management in the workplace.

This study makes an original contribution to the organizational literature since it is, to our knowledge, the first questionnaire measuring mental health self-management strategies contextualized to the workplace.

- **Kickstart Your Soft Skills: a soft skills self-assessment tool for students, employees and job seekers.**  
Amber Hoefkens & Peter David

In a rapidly evolving labour market, companies and organisations must continuously innovate to remain competitive. At best, students make the transition to the labour market with an adequate knowledge base (hard skills). However, soft skills such as communication, problem-solving and self-management enable them to adapt to the changing demands of their job. Mere knowledge and expertise are no longer enough to build a flourishing career (Sethi, 2016).

Research shows that (young) adults tend to underestimate the importance of soft skills at the workplace and that it is necessary to pay more attention to the development of soft skills (World Economic Forum, 2015; Vandeweyer, 2016). It is therefore a challenge to better support job seekers and employees, including students transitioning into the labour market, in developing the soft skills they require at the workplace.

With the Kickstart Your Soft Skills project we aim to encourage and support (young) adults with their development regarding soft skills. We developed an online tool, containing various components. The tool starts off with a validated self-assessment questionnaire via which respondents gain insight in their soft skills. After completing the questionnaire they receive an individual feedback report including score-specific feedback and tips to strengthen their soft skills. For teachers, mentors at the workplace and job coaches the tool provides feedback reports on groups of students, employees or trainees and materials to support and coach their group.

Certain factors in particular were beneficial to this project. First of all, the tool is developed via the service design methodology which encompasses the active involvement of users and stakeholders during all stages of development. Secondly, the validated questionnaire provided a scientific foundation to the instrument which is seen as one of its biggest strengths by our project partners (in contrast to commercial instruments). Thirdly, previous experience with feedback reports helped us to develop the KYSS-report and fine-tune the feedback texts. All those factors helped resulting in a relevant and strong instrument.

- **I do not want a computer to hire me! Exploring the attitude of Italian job seekers towards an AI-recruiter.**  
Andrea Caputo; Andrea Rezzani & Claudio G. Cortese

This study is an exploration of the attitude of an Italian sample on the application of Artificial Intelligence (AI) in the recruitment and selection processes.

Recruiting with Artificial Intelligence is currently considered as one of the most promising solutions to optimize HR activities. On the one hand multinational corporations (e.g. Unilever, Adidas, Hilton, to name a few; see Van Esch & Black, 2019) are starting to ask for the services offered by digital recruitment companies in order to improve their processes, increase convenience, reduce costs and evaluate candidates more effectively. On the other hand, little empirical research has been conducted on how candidates react to AI-based recruiting.

We conducted this exploratory study by replicating the online questionnaire by Wright and Atkinson (2019). We spread it via social networks (Facebook, Instagram, Twitter) and reached a sample of convenience of Italian job seekers (N= 125), in order to obtain their opinions on engaging in a computer-based rather than human-based recruitment and selection processes.

Results showed that, when faced with a choice, candidates overwhelmingly prefer humans for activities such as CV screening (78.4%), interviewing (92.8%) and salary negotiation (88%). We discussed these results considering AI recruitment and selection technologies as a valid human- support tool and we suggested that organizations might adopt an approach that takes into account the candidate's desire to interact with recruiters, at least at the most relevant moments of the selection process. Indeed, the interview can be a crucial moment for candidates in which they have the opportunity to obtain information about the company culture that cannot be transmitted by an AI ( $\chi^2 = 8.60$ ;  $df = 2$ ;  $adj. res. = 2.9$ ;  $p < .05$ ). Following these results, the interview should be structured as a “cum loqui”, a mutual exchange made up of repartee between the candidate and the recruiter in a non-standardized way.

The exiguous number and the representativeness of the sample; the structure of the questionnaire, which imposes a forced choice between human and computer; the cross-sectional nature of study design.

Firms should take into account job seekers’ attitude about engaging in recruitment and selection processes fully managed by AI. Based on the characteristics of the firm and of the target on the job market, the attitude of acceptance or aversion towards an AI recruitment and selection process could change the candidate experience or, even earlier, the possibility that talents apply for the company. This would improve Employer Branding strategies.

Nevertheless, our research represents an initial contribution to a personnel recruitment and selection approach delivered by an AI in the Italian context. We highlighted the need for assessing the acceptance or aversion of candidates to AI tools. Future researches will be necessary to deepen the perception, acceptance, and subsequent human- computer experience in this field. Our goal is not to take a position for or against Artificial Intelligence tools in the field of HR, but to provide a contribution to find the right balance between AI performance and users expectations.

Video presentation is available by following this [link](#).

- **The relationship between educational staff coping strategies and mental health during the Covid-19 pandemic.**  
Liudmyla Karamushka; Oksana Kredentser; Kira Tereshchenko & Volodymyr Ivkin

To analyze the relationship between educational staff coping strategies and positive mental health during the Covid-19 pandemic, which will allow improving educational staff well-being during the pandemic.

The Covid-19 pandemic has effected teacher mental health (L. Aperribai et al. (2020), J. S. Daks, J. S. Peltz & R. D. Rogge (2020), L. E. Kim & K. Asbury (2020) and others), causing in some cases stress and other negative consequences. Thus the importance of studying teachers' coping strategies in relation with their positive mental health during the Covid-19 pandemic has been increased. The problem of coping strategies and their types has been addressed by E. Frydenberg & R. Lewis (2020), R.S. Lazarus (2020), N. Rodina (2011), N. Yarosh (2015) and others. The study under consideration is based on the division of coping strategies into active and passive (Lazarus & Folkman, 1984), productive, relatively productive (intermediate), and unproductive (Willi & Heim, 1986; Frydenberg & Lewis, 2000).

The coping strategies used by staff of educational organizations were studied using Coping Inventory for Stressful Situations (CISS, Endler & Parker, adaptation by Krukova, 2010), while educational staff positive mental health was studied using Positive Mental Health Scale (PMH-scale, Lukat, Margraf, Lutz, Veld & Becker, adaptation by Karamushka, Tereshchenko & Kredentser, 2020). The sample was made up of 223 secondary school teachers (89% females and 11% males) aged 26 through 65 ( $M = 41.36$ ,  $SD = 9.27$ ) from Kyiv region. The study was conducted in March-May 2020, during the first Covid-19 lockdown.

The coping strategies most frequently used by educational staff were "task orientation" ( $M = 3.61$ ;  $SD = 0.54$ ) and "seeking social support" ( $M = 3.40$ ;  $SD = 0.65$ ), followed by "avoidance" ( $M = 2.95$ ;  $SD = 0.54$ ), "emotion orientation" ( $M = 2.83$ ;  $SD = 0.58$ ), and "distraction" ( $M = 2.62$ ;  $SD = 0.61$ ). The educational staff mental health index was at the middle level ( $M = 3.12$ ;  $SD = 0.45$ ). Educational staff positive mental health had positive relationship with such active and productive coping strategies as "task orientation" ( $r = 0.242$ ;  $p < 0.001$ ), "seeking social support" ( $r = 0.317$ ;  $p < 0.001$ ), and with such passive and unproductive coping strategies in relation to solving problems faced by educational staff as "avoidance" ( $r = 0.276$ ;  $p < 0.001$ ) and "distraction" ( $r = 0.189$ ;  $p < 0.01$ ). Educational staff positive mental health had negative relationship with such passive and unproductive coping strategy as "emotion orientation" ( $r = -0.298$ ,  $p < 0.001$ ). These findings have shown that during the Covid-19 pandemic, educational staff used both active coping strategies focused on improving work performance and partnerships, and passive coping strategies promoting mental health, which could worsen because of forced temporary pauses in work and change in work activities. However, educational staff with high rates of positive mental health avoided using the passive coping strategies, which were related to manifestations of negative emotions.

It would be appropriate to conduct a similar study not only in state educational organizations, but in private ones, too. Practical Implications. The results of the study can be helpful in educational staff's psychological training and psychological counseling.

This is the first study on the relationship between coping strategies and positive mental health during the Covid-19 pandemic conducted on a sample of educational staff in Ukraine.

- **Meta-stereotyping in active sourcing—a source of discrimination in modern hiring situations.**  
Esther Kroll; Susanne Veit & Matthias Ziegler

People from marginalized groups are often discriminated against in recruitment processes. While a lot of research has been conducted about the prevalence of hiring discrimination, the mechanism of discrimination is still unclear. Our research question is what mechanism drives discriminatory decisions in contemporary recruitment processes. We focused on modern recruitment strategies, such as active sourcing and outside recruitment.

Discrimination can be driven automatically, i.e. by implicit attitudes, or controlled, i.e. by explicit propositions. According to Bargh (1994), automatic behavior starts involuntarily, needs to be stopped voluntarily, does not require a lot of resources, and is not necessarily conscious. The MODE-model (Fazio, 1990; Olson and Fazio, 2008) suggests that people need to have sufficient motivation and resources to control their (discriminatory) behavior.

In a mixed-method approach, we first conducted a qualitative pre-study with eight recruiters to explore to what extent decisions might be affected by discrimination in the modern recruitment process. We then analyzed panel data from the Institute for Employment Research (IAB) in Germany to see whether there is quantitative evidence of discrimination in modern recruitment. In a third step, we compared in an experimental design different sources of discrimination and analyzed what affects discriminatory decisions more—own prejudices or meta-stereotypical assumptions about preferred candidates.

A content analysis of the qualitative interviews identified three sources of discrimination in modern recruitment processes: recruiters' own attitudes, explicit instructions from managers, and the recruiters' assumptions regarding companies' preferred candidates. The results of mixed multilevel analyses with the company as a second level resonate with the qualitative findings: companies actively approach female employees, older employees, and employees who are born in Southern/Eastern Europe less often and offer women jobs less often (Kroll et al., 2021). Effects for gender and older people in active sourcing were also significant and robust when controlling for income, number of children, level of school completion, and educational background. The results of the online experiments show that people assume lower hiring chances for minority candidates when they conduct the recruitment for rather traditional compared to rather modern companies. This effect is bigger than the effect of people's own implicitly and explicitly measured prejudices against minority candidates. At the same time, we found no evidence of discrimination when participants assess minority candidates' qualities.

Our qualitative interview focused on outside recruitment agencies, inside recruiters are less represented here. The panel data analyses revealed that people's ethnicity was not examined very well. Our experimental study only included working people but the results are not comparable to high stake decisions.

Our findings suggest that discrimination is partly driven by recruiters' assumptions about the preferred candidates. We consider this a meta-stereotyping process and an important but under-researched driver of discrimination in hiring situations.

Our mixed method approach connects results from three separate empirical data sources. The combination of qualitative interviews with quantitative panel data analyses and quantitative experimental data provides a better understanding of the discriminatory mechanisms at work in modern recruitment.

Video presentation is available by following this [link](#).

- **Towards a better future for assessment reports: Design for efficiency in hiring decisions**  
Roxana Spinu & Dragos Iliescu

This study explores several ways of designing employee assessment reports, taking into consideration two different perspectives: the wording (trait-description vs. score-description) and the formatting of the text (paragraph vs. bullet-points). The sample consists of 247 human resources specialists with tenure between 0 and 24 years, who are used to making hiring decisions based on assessment reports on a daily basis. Participants received a job description for the role of „Key Account Manager”, as well as two personality profiles for two fictional candidates, and were asked to decide which of the two candidates is more suitable for the job. Two variables were manipulated: the difficulty of the decision (easy vs. difficult) and the type of report received. A binomial logistic regression was conducted to ascertain the effects of the difficulty scenario and of the report type on the likelihood that participants make an accurate hiring decision. The model was statistically significant,  $\chi^2(7) = 31.38$ ,  $p = .000$  and explained 18.1% (Nagelkerke R<sup>2</sup>) of the variance in hiring decision, correctly classifying 73.8% of cases. Results reveal that, in the easy scenario, all types of reports were efficient in selection decisions. In the difficult scenario, on the other hand, structuring assessment reports using both paragraph format and score-descriptions is more efficient than any of the other three conditions.

- **The roles of training and practice in asynchronous video interviews.**  
Nicolas Roulin & Khoi Anh Pham

Asynchronous video interviews (AVIs) are a new form of interview in which candidates are instructed to video-record their answers to a predefined set of interview questions (Lukacik et al., 2021). Recent AVIs research has largely focused on how they are perceived by applicants

(e.g., Basch et al., 2020). However, there is no research on how job applicants could be better prepared for AVIs. This study investigates how training and practice opportunities affect applicants' interview anxiety, use of impression management (IM), fairness perceptions, and interview performance.

Research suggests that coaching or training can improve applicant performance in structured in-person interviews (Tross & Maurer, 2008; Maurer et al., 1998; 2001). Although AVIs have become popular, no research has examined how applicants can best prepare for them. Yet, there might be various benefits to AVI training. For instance, when applicants are explained how AVIs increase the standardization and flexibility of the hiring process, their fairness and usability perceptions tend to improve (Basch & Melchers, 2019). Therefore, an applicant (video-)training including information about the standardization of AVIs could similarly positively influence perceptions of fairness. In addition, AVI training and practice could address key interview anxiety dimensions (McCarthy & Goffin, 2004). Providing applicants with sample AVI questions or tips to answer them could help tackling communication and performance anxiety. Advice on how to look professional and confident in front of the camera could help reducing appearance and behavioral anxiety. Advice on how to structure responses could help applicant engage in IM in AVIs and, ultimately, improve their performance.

Canadian and U.S. participants recruited from Prolific were randomly assigned into one of four different conditions (N=225 after screening based on attention checks). We used a 2x2 between-subjects study design (Control; Training; Practice; Both). Those in the training conditions watched a 16-minute training video, and those in the practice condition could practice on 2 interview questions, before the actual interview. All participants went through an AVI which consisted of 5 structured, past-behavioral interview questions. After the interview, all participants completed measures of interview anxiety (McCarthy & Goffin, 2004), fairness perceptions and organizational attractiveness (Basch & Melchers, 2019), and honest and deceptive IM (Bourdage et al., 2018). We also developed Behaviorally Anchored Rating Scales (BARS) for each question to rate participants' interview performance.

MANOVAs results showed that training was associated with higher use of honest IM (especially defensive tactics), but slightly less deceptive IM (only significant for slight image creation) and slightly higher fairness perceptions (only significant for perceptions of consistency). Training was unrelated to anxiety or organizational attraction, and practice (of the training x practice interaction) was unrelated to any outcomes. Interview performance scoring is still in progress.

First, we used a mock AVI, which might not fully replicate the stakes of an AVI in a real selection context where actual job applicants can be more anxious but are also motivated to perform to land a job (vs. earn research compensation). Future research should examine whether training effects are stronger with actual job applicants. Second, we used only a short training video and two practice questions. Future research should consider implementing a longer, more comprehensive training program with more practice opportunities (like in Tross and Maurer, 2008).

There are three main implications of this study. Firstly, organizations should provide candidates with some training materials and practice opportunities if they decide to use AVIs in their hiring process. This could help improve applicants' fairness perceptions of the hiring process, and indirectly improving organizational attractiveness. Secondly, even if more comprehensive training would be valuable, a short training video like the one created in this study could already help improve important outcomes (e.g., fairness perceptions or IM use, as well as interview self-efficacy - which we examined in a pilot study). Lastly, organizations should be aware that how applicants use impression management in AVIs might not be equivalent to traditional in-person interviews (e.g., less ingratiation but more defensive tactics). Organizations must ensure that this does not put applicants at a disadvantage, and might consider the impact of completely replacing traditional face-to-face interviews by AVIs.

This study is one of the firsts to design evidence-based training materials specifically for AVIs, and to provide preliminary evidence that it could benefit both job applicants in their job search and organizations wishing to improve the fairness of their hiring process. It also confirms earlier findings about the benefits of training for in-person interviews, and about providing candidates with explanations about the AVI process.

Video presentation is available by following this [link](#).

- **It is the quality that counts: An analysis of the effectiveness of employee development interviews.**  
Klaus Moser; Roman Soucek & Christiane Alberternst

Research goals and theoretical background: During the last decades, a considerable number of private and public organizations have introduced employee development interviews, which is an example of a large-scale participatory organizational intervention. Employee development interviews are annual meetings of the supervisor and a subordinate, which include (1) reviewing the strengths and weaknesses of the employee, (2) discussing the employee's professional development, (3) reflecting on the quality of collaboration between employee and supervisor (including mutual feedback), and (4) participative goal setting. They were introduced in order to improve the quality of collaboration between employees and their supervisors with participative means. We theorized that this kind of intervention – if properly conducted – should have effects on trust in the supervisor as a measure of “collaboration quality” which in turn should improve job satisfaction as a global indicator and outcome of employee participation. In addition, we were interested in whether the effectiveness of these employee development interviews would depend on specific contents and processes, or, more generally speaking, on the quality how they were conducted.

We conducted a longitudinal study over a period of five years (three measurement points) during and after the introduction of employee development interviews. Data were collected from a sample of employees at a city council in the south of Germany. We only considered data from employees who reported to the same supervisor during the study period. The final sample size consisted of 565 observations from 236 employees who participated at least at two measurement points (61% females). Mean job tenure was 18 years. We measured implementation fidelity, i.e. the degree to which the interventions included the four core features of employee development interviews, as well as instrumental

and non-instrumental voice, both as perceived by the employees. Outcome measures were trust in supervisor and job satisfaction. Data were analyzed within a multi-level framework.

Increasing implementation fidelity led to an increase of employees' trust in their supervisor (as a measure of quality of collaboration). This relation was mediated by an increase in instrumental voice. Finally, fidelity of employee development interviews had an indirect effect on the increase of job satisfaction via an increase of trust in the supervisor.

We had to rely on self-reports. In addition, in some cases we had to exclude data because of a change of the supervisor for some employees.

We demonstrate that it really counts how interventions are conducted. Moreover, we can show that it is valuable to assess the degree of intervention fidelity and thus contribute to our understanding of why and how interventions at the workplace are effective. We discuss the usefulness of employee development interviews, the importance of securing high quality of their delivery, as well as the notion of them being an “alternative” to performance appraisal interviews.

Though employee development interviews are a common HR intervention, their evaluations have previously been limited to descriptive studies and faith in their effectiveness. We can show that they can really contribute to what they are intended to achieve. More importantly, we show that it really counts how they are conducted.

- **Developing Personnel Assessments in The Digital Era and During the COVID-19 Pandemic.**  
Matias Kaasalainen, Mikael Nederström, Anita Rintala-Rasmus

Psychological personnel assessments have utilised computer-based tests (CBT) for quite some time. However, there is still quite a limited number of studies done regarding multimethod digital assessment procedures and their accuracy in real-life work settings. Previous research results indicate some variation in the predictive validity between different administration modes and the quality of the overall assessment ratings, OAR's. (Georgiou et.al. 2019; Karim 2014; McCarthy 2017; Nikolaou et.al. 2019; Tippins 2015).

Remotely conducted assessments have been implemented especially in global recruitment processes where the talent pool is scattered around the world. However, a more profound development in the psychological assessment procedures was necessitated by the COVID-19 pandemic. Even local candidates were hindered participating in office-based assessments due to pandemic restrictions. Personnel assessments were required to transfer to online platform in March 2020 with very short notice as the coronavirus lockdowns took place. The assessment field was forced to speed up the development of remote mode methods and all-digital procedures, including video interviews and virtual simulations.

The objective of this study was to examine the predictive validity of two different assessment administration modes, remote assessment vs. traditional face-to-face assessment, in psychological personnel assessment. Sustaining the validity and reliability of all personnel assessments is of utmost importance (König et.al. 2010; Robertson & Smith 2001; Schmidt & Hunter 1998; Schmidt 2016). There has been concerns about the effect of the mode of test administration on test scores, applicant experience, and the predictive validity of assessment. The impact of assessment accuracy is high for both the recruiting organisation, the applicants being assessed, and the assessment professional. Therefore, we launched a follow-up study and collected data from real-life recruitment processes to compare the predictive accuracy of remote mode psychological assessments with the traditional assessment OAR's.

This study examined how well remote OAR's predicted the job performance of a recruited person compared to a traditional f2f personnel assessment ratings. The study was carried out in real-life psychological personnel assessment center context. Multimethod assessment including a structured interview by a certified W/O psychologist was used. The predictive validity of personnel assessments was examined by comparing the OAR's of recruited persons with the work performance appraisal by the supervisors. The recruited persons had worked in their new job for at least six months at the time of measuring their work success. The sample size was 96 in the remote mode assessment and 90 in the traditional assessment mode (total N=186). The OAR's by W/O psychologists were scored on scale 1-4, and the corresponding performance appraisals by supervisors were on the same scale, 1-4. The validity of the personnel assessments was examined by computing the difference scores between the supervisor performance appraisals and assessment recommendations. In addition, the secondary analysis was conducted by comparing the score distributions between traditional and remote assessment.

The study demonstrated that remote and traditional OAR's predicted job performance equally well. In both the remote and traditional setting, over 50% of W/O psychologist assessed OAR's and supervisor's assessments corresponded fully with each other, i.e. there was no difference between the OAR and the performance appraisal. If there was a difference, it was most often one scale-point more critical OAR than performance appraisal (in 28% of the cases in the remote mode assessment, and 30% in the traditional assessment mode). Furthermore, the D-scores in each group were distributed almost identically.

There is increasing research interest in CBT. However, research still needs to catch up practise where remote procedures have become prevalent during the pandemic. Previous research focuses mostly on individual test methods, digitalisation, gamification or utilisation of AI (artificial intelligence) in test development, and applicant reactions. The objective of this study was to look at the comparability of two different assessment administration mode OAR's, remote assessment vs. face-to-face assessment, in psychological assessment of personnel. The sample size in this study was limited, and further research is needed with more data. Remote assessment is likely to become a prominent mode for delivering test processes in the future, replacing many face-to-face assessment situations. It is of utmost importance to sustain the predictive validity of the assessment – regardless of the mode of administrating the test process.

- **Can we predict the success of implementing a participatory organizational intervention? A study of the implementation process and contextual factors.**

Heidi Lahti & Virpi Kalakoski

An intervention only has the potential to produce the desired effects when it is properly implemented. However, despite the growing number of studies reporting workplace intervention process evaluations in recent years, few studies have uncovered how contextual factors, already existent before the intervention, predict the success of implementation. The first goal of this process evaluation study was to assess the degree of success of implementing a participatory organizational intervention, whose key change mechanism was based on new working methods that employees and supervisors mutually created and agreed on. The second goal was to determine whether different contextual factors prospectively contribute to the success of implementation. As the theoretical background, we draw upon approaches that emphasize organizational intervention implementation as a participatory process.

The studied intervention was a participatory organizational intervention that sought to improve workflow and well-being in offices [1]. A total of 36 work units participated in the study. The data were collected via online surveys and 631 participants responded at baseline (contextual variables) and 366 during implementation (implementation variables). The success of implementation was operationalized as five components that previous studies on the implementation of organizational interventions have emphasized: 1) perceived importance of intervention goals, 2) unit supervisor activity, 3) questionnaire activity in the intervention phase, 4) discussion on intervention goals, and 5) adherence to working methods [2]. These components were combined to form the main dependent variable – the overall success of implementation at the unit level. We then used hierarchical linear regression and commonality analysis [3] to study which contextual factors predict the success of implementation. The studied contextual variables (a total of 19 variables) represented four categories: I) demographics and work history, II) quantitative work demands, III) cognitive working conditions and demands, and IV) psychosocial strain.

Our results revealed great variation in the success of implementing the intervention among the participating work units. The results indicate that, on average, the intervention goals were perceived as important in the participating units but despite recognizing the need for the intervention, supervisor's and participants' activeness during the intervention remained low. The final regression model with five significant predictors explained nearly 10% of the variance of the overall implementation success [ $r^2 = .098$ ,  $F(5, 577) = 13.62$ ,  $p < .001$ ]. Quantitative work demands were the primary contextual variables that prospectively predicted the degree of success of implementation, whereas the more individual-level factors only marginally contributed (see Table 1).

Our study suggests that successful implementation of participatory organizational interventions can be anticipated already before the intervention. The results have practical implications: organizations should ensure, before implementing a participatory intervention, that the demands of work allow employees to spend enough time on the intervention activities. In line with many previous studies our results also emphasize the important role of supervisors in facilitating active participation [5]. Our results highlight an obvious need to develop theories that bring together a variety of contextual factors that are essential for the successful implementation of participatory organizational interventions.

- **A scoping review of Q-method studies in organizational behavior.**  
Lise A. van Oortmerssen; Albert W.T. Kampermann; Ellen R. Peeters & Ira van Montfoort

Q-method is a mixed-method approach suitable for research purposes directed at advancing theory, conceptualization, and operationalization in the social sciences. Nevertheless, scholars in organizational behavior (OB) rarely choose to conduct Q-studies. This scoping review is aimed at showing to what extent, regarding what kind of topics, and in what ways Q-method has been applied within the research area of OB so far, and at identifying reported weaknesses and strengths of this method for OB research. This study may inspire scholars in OB to consider making use of this often-overlooked research method.

Organizational behavior refers to the study of, and application of knowledge on, the behavior of individual employees, of groups of employees, and of organizations' employees in general (e.g. Heath & Sitkin, 2001). Behavior is complex and, therefore, studying behavior in organizations ideally requires an integration of quantitative and qualitative methodological techniques (Spector & Meier, 2014). Q-method inherently combines quantitative and qualitative techniques into one single method. The focus within Q-method is on the subjective viewpoints of participants: on how and why people think about a certain topic the way they do (Watts & Stenner, 2012). This subjectivity is studied in a systematic way: participants sort statements according to their individual point of view, most often into a quasi-normal distribution. The results of a Q-study are based on correlations between the viewpoints of participants, and on qualitative interpretations of the clustered correlations found, revealing a limited set of distinct perspectives within the studied population.

In order to address the objectives of this paper, a systematic literature review was conducted on a systematically collected sample of scholarly sources reporting on studies addressing organizational behavior using the Q-method. Sources included in the review sample were peer-reviewed journal articles, reporting on an empirical study, and written in English. Sources that addressed organizational behavior in very specific organizational sectors, or in very specific organizational domains, not resulting in conclusions relevant to organizations in general, were excluded from the sample. We conducted multiple searches in the Web of Science core collection as well as on Google scholar, and we conducted hand searches in various ways. We used the search terms 'q-sort', 'q-sorting' and 'q-method', with or without a hyphen, and in combination with certain research topic categories or in combination with 'management' or 'organization'. The final review sample included 44 sources. From these sources, we extracted and synthesized various data.

The results of this study include a description of topics and aims of the studies in the sample, and a description of weaknesses and strengths of Q-method as indicated by the authors of the sources in the sample. The studies in our sample addressed the following OB topics: organizational culture (11 articles); leadership (11 articles); HRM (10 articles); group decision making (5 articles); organizational change and development (4 articles); and collaboration (3 articles). Within the sample, Q-method is used in various ways. In many of the studies, it is used as single method in order to reveal viewpoints, values, or behavioral patterns among a certain population of, for example, professionals, managers, or applicants. In other studies, the position of the Q-study within the research design could be described as supporting research goals that are primarily addressed by a different method. In some studies, Q-method was applied in relation to the construction or validation of a conceptual model. In addition, in several studies, the Q-study formed a step towards the composition of a questionnaire. Multiple studies made use of previously developed Q-instruments, especially the Organizational Culture Profile and the Group Dynamics Q-sort. More descriptive details on the sample are available and will be presented.

Although we attempted to capture all OB studies that use the Q-method, we may have missed some studies that do meet the inclusion criteria for our sample. Nevertheless, our study has been able to identify several trends among OB studies using Q-method. One of the strengths of Q-method for OB research is that it can connect researchers and practitioners as well as different disciplines. The method allows for engaging stakeholders in theory building processes. Moreover, studies using this method can meet academic and professional aims at the same time.

This study gives insight into the, still limited, application of Q-method in OB research and identifies opportunities of this method for future OB research.

- **Navigating labyrinths of academic leadership.**

Katerina Machovcova; Katerina Cidlinska, Katerina Zabrodska & Jiri Mudrak

The goal of the paper is to explore complex experiences of academics who became academic middle managers (heads of departments) at public universities in the Czechia. The initial data collection via interviews was conducted in 2016 and currently (2/2022) respondents are being recruited for the second interviews.

On the background of changes within higher education, such as increased marketization, and performance pressures, academic middle managers need to deal with rising bureaucratic and managerial workload. Such development is deemed to be harmful to their academic career (Floyd, 2012). Floyd and Dimmock (2011) explain that on the background of current performance criteria in academia, academic middle managers are risking their academic career capital. Such trends contribute to the perception that academic middle management positions are deemed rather unattractive among academics, who remain a primary group from which these managers are recruited. The need for management of strong

professional groups gives rise to a demand to adapt professionals as managers who can thus engage in the effective management of their subordinates, professionals themselves (Pekkola et. al. 2018). In the situation where increased demands on both quality and quantity of academic performance require strong academic middle management, it is crucial to understand their experience, understand the motives why they eventually become managers, what demands the role brings, and how they evaluate its impact on the career.

First phase of research encompassed 32 semi-structured interviews with academic middle managers, between 1 to 17 years in position, most typically determined to serve for a limited period, which would range around 4-8 years. 7 respondents achieved the academic ranking of professor, 9 of docent, 19 were with Ph.D. It indicates that our sample tended to consist of academics at earlier career stages. Most of the departments would be under 30 staff members, all placed at public research-intensive universities. Interviews typically lasted 60 minutes and followed a list of open-ended questions on: HoDs' perceptions of their leadership roles, job satisfaction, and perceptions of the current transformation of the Czech higher educational system. The interviews were recorded and transcribed verbatim by a professional transcriber and analysis was facilitated by MAXQDA software. The analysis method was thematic analysis (Braun, Clarke, 2013). In the second phase we are contacting all of the participants for a second interviews and explore their further career development, decision to (not) continue in managerial position and evaluation of the leadership experience. 12 interviews are collected at the moment, 8 people confirmed their availability for interview and we are preparing a second call in order to reach the rest of the group.

In the analysis we will focus on the impact of the taking up leadership position on the further academic career. First, we will look at the decisions around leaving the leadership post. It is clear that the model of rotating mandates prevail thus end of the term is expected for many. However, in some of the institutions it is acceptable to hold the position for a longer period and there the theme of continuity is debated. Second, we will look at the characteristics that were presented as crucial for a leadership position. Respondents reflected their experience in a sense of why they thought they were the good choice for the leadership position, which often has to do with organizational and people skills. This could be seen as perhaps contrary to an expectation of academic leaders as senior academic, and we will explore the interaction of managerial and senior academic individual capitals. Third, we will specifically explore the differences between those who are mature academics or even nearing end of their academic career, to those in early/mid-career phases and what were the advantages and disadvantages that the leadership career phase brought to them and how it had influenced their career development. We will particularly focus on motivations towards possible re-entry to the managerial position, ranging from will to promote further structural changes to reaction on how previous managerial duties derailed academic career, which now seems to be very limited and managerial post might be seen as viable option.

Our research can inform institutional policies on support towards academics who are considering applying for middle management positions (e.g. Head of Department).

Our study contributes to the research on academic middle management, adding a specific perspective with its longitudinal design and geographical context.

Video presentation is available by following this [link](#).

- **My colleagues accept it – that’s reason enough: Privacy threat, reactance, and compliance towards electronic monitoring at work?**

Mauren Wolff & Cornelia Niessen

With intelligent algorithms and sensors, digitalization makes it possible to continuously monitor and evaluate not only work processes, but also cognitive, emotional, and behavioral activities of employees. In their private life, individuals often tolerate that companies record their personal data (location, bio-physiological data) for example through apps and smartwatches. However, at work, electronic monitoring can have benefits for both, the employer and employee (e.g., increasing safety), but there is also considerable evidence that monitoring employees’ activities not only threaten employees’ performance and well-being, but also employees’ privacy. Privacy refers to an individual’s desire to maintain boundaries between the individual and its environment, thus, having control over personal information. In the present study, we aim to investigate how and when electronic monitoring threatens employees’ privacy with negative consequences for employee reactance and compliance towards this kind of electronic monitoring. Thereby, we focus on the role of social norms (i.e., shared expectations of acceptable behavior and attitudes by groups) of the work team which are expected to shape privacy perceptions.

Various characteristics of electronic monitoring such as the target of monitoring (ways and degree to which people are monitored, e.g. tracking of working time or emotions) or given purpose of electronic monitoring practices (e.g. preventing counterproductive behavior) have been identified to foster privacy concerns. Less research has been conducted on interaction effects with the social context, e.g. social norms of the work team. Social norms are known as a particularly powerful factor of the social context, as they move people to act by what is likely to be adaptive in a setting. We expect that the target of electronic monitoring (tracking of working time, screen activities, and social interactions) promotes employees’ privacy concerns and that social norms of the workgroup can strengthen or mitigate these privacy concerns.

Privacy concerns that reflect the (anticipated) experience of loss of control over personal relevant aspects in this situation, in turn, are expected to result in employee reactance and compliance. (State) reactance refers to an aversive motivational state resulting from a perceived threat of freedom, directed toward restoring this threatened freedom. Therefore, we propose if coworkers show acceptance towards electronic monitoring (acceptance norm), invasive electronic monitoring (screenshots, monitoring of social interactions) causes less reactance. Moreover, we investigate reasons, why employees might comply with a social norm; through external motivation (fear of peer pressure) or internal motivation (consistency with one’s beliefs, and values).

To test our hypotheses, we used a scenario-based design (N = 219 German office workers). After reading short situations in which the employer introduces an electronic monitoring software at the workplace, participants answered questionnaires measuring the dependent variables privacy invasion, state reactance, and compliance with the social norm towards electronic monitoring. This 3 x 2 between-subjects design varied the target of electronic monitoring (screen time, screen activity, social interactions) and the descriptive norm (coworkers' acceptance or rejection of electronic monitoring).

The manipulation checks showed significant differences between the acceptance and rejection norm. Hierarchical regression analysis revealed that compared to monitoring of screen time, monitoring of screen activity and of social interactions (target of electronic monitoring) caused more privacy threat and reactance. However, data did not support a moderating effect of social norms on these relations. We found that employees strongly agreed with the rejection norm (not with the acceptance norm) as it was consistent with their own values and beliefs towards electronic monitoring. Moreover, the data revealed, that experience with electronic monitoring devices in private life, but not in working life, was related to higher privacy invasion and reactance.

One study limitation is that employees may perceive and react to the hypothetical situation differently than they would have in a “real world” context.

Our study gives insight into the impact of various kinds of electronic monitoring on privacy concerns and reactance in Germany. The data indicated that the employees complied more with the norm to reject the new technological devices which aim to monitor employee performance. The question is whether the negative attitude towards electronic monitoring is also true in more ambiguous situations when electronic performance monitoring has also strong benefits for the employees (e.g., safety and health protection).

Electronic monitoring in the workplace is on the rise and with it comes a discussion about privacy. Considering the great power of social norms this study helps to build a broader perspective on employees' privacy perceptions as well as on handling employees' privacy under electronic monitoring.

Video presentation is available by following this [link](#).

- **Consequences of work design on organizational citizenship behavior: The mediating role of job satisfaction.**  
Maribel Montañez-Juan; María Esther García-Buades; Silvia Ortiz-Bonnín; Beatriz Sora & Amparo Caballer

Organizational citizenship behaviors (OCB) refer to employee acts, not formally rewarded, that support the broader social and psychological environment in which tasks are carried out in organizations (Bolino et al., 2013). Behaviours such as mutual support, collaboration, and sharing

of knowledge create cohesion in the workplace and improve productivity (Koys, 2001). The research goal is to investigate antecedents of OCB, in particular, to explore how different aspects of work design - related to task, knowledge, and social characteristics - lead to increased OCB directly or indirectly through increased employee's satisfaction.

Our research builds on the contemporary model of work design (Morgeson & Humphrey, 2006), self-determination theory (SDT; Deci et al., 2017), social exchange theory (Blau, 1964), and the happy-productive worker thesis (Riketta, 2008).

Through a longitudinal design, we collected data at three points. The sample consisted of 209 employees from nine Spanish organizations. Most participants worked in the service sector (80.4%), the mean age of participants was 40.33 years ( $SD= 7.87$ ), 60,8% were women, 55% had a job tenure of more than five years and worked full-time (81.1%).

Structural equation models showed that autonomy, information processing, and social support had a positive effect on job satisfaction, which subsequently increased OCB, thus supporting the mediating role of job satisfaction. Further, information processing directly predicted OCB.

The data relied on self-reported measures of OCB. We recommend future research uses OCB measures from third parties such as co-workers, supervisors, and customers.

This research provides useful knowledge to human resources professionals about work design and its effects on job satisfaction and OCB. Overall, this study suggests that by designing flexible, challenging, and supportive jobs, organizations can significantly increase employees' job satisfaction over time, which, subsequently, increases OCB. Given the prominent role of information processing in our results, organizations should promote a work environment in which employees share their knowledge and help each other. In conclusion, our results show that designing work appropriately is relevant both for employees' attitudes and for positive behaviors, which ultimately benefit organizational effectiveness.

We contribute to the field in three ways: (1) by simultaneously analysing the effects of task, knowledge, and social characteristics on OCB; (2) by clarifying the mediating role of job satisfaction in the relationship between work characteristics and OCB; (3) by allowing causal conclusions based on longitudinal data collected at three points in time.

- **Towards a deeper understanding of students' perceived employability: The role of support from teaching staff.**  
Gerardo Petruzzello; Rita Chiesa; Dina Guglielmi & Marco Giovanni Mariani

Our main goal is to expand the empirical knowledge about the antecedents of university students' Perceived Employability (hereafter, PE), a major career-related personal resource that prospective new entrants in the labour market may need to have in their assets (Clarke et al., 2018). More precisely, we seek to understand whether and how a supportive teaching style (namely, Support from teaching staff) raises students' PE, as it may help students approach the world of work. Altogether, our empirical work is intended to provide novel insights into the theoretical notion of PE. Moreover, our study offers evidence-based indications about enhancing students' PE and facilitating their transition to work.

PE is the perceived ability and opportunity to attain employment appropriate to one's qualification level (Vanhercke et al., 2014). It can be interpreted as a personal resource within the Conservation of Resources theory framework (hereafter COR; Hobfoll et al., 2018). Indeed, it promotes a sense of control, motivation and adjustment to stressful circumstances in career endeavours (Fugate et al., 2004; Vanhercke et al., 2016), leading to favourable career outcomes (De Vos et al., 2011; Kirves et al., 2014). In line with the COR tenets, PE is amenable to be influenced not only by the appraising of personal skills or attributes but also by contextual factors (Vanhercke et al., 2014). Herein, we posit that Support from teaching staff (STS) may raise students' PE (Hypothesis 1). Beyond imparting knowledge, university teachers may help students to understand the usefulness of their learning in dealing with real workplaces. This could be done through supportive behaviours like engaging students in discussions and activities (i.e. work-based exercises and examples, group work) to reflect upon what they learn and self-regulate to deal with work-related issues (Liu et al., 2020). Moreover, teachers may involve students in dialogues about their professional future (Kuijpers & Meijers, 2012). In line with the COR framework, we also contend this relationship to be indirect, mediated by students' self-efficacy (Hypothesis 2a), career identity (Hypothesis 2b) and social capital (Hypothesis 2c). Indeed, STS may increase students' faith in their abilities to compete in the labour market (Liu et al., 2020), students' self-awareness as future workers (Jackson, 2016), and the network of valuable contacts to look for opportunities (Donald et al., 2018). Relying on these resources, students may perceive a higher likelihood to get a job, namely increased PE.

Data were collected with a sample of final-year University students of several master's degree courses from different Italian Universities. Participants were invited to complete an online questionnaire three times between November 2019 and September 2020. They were granted confidentiality and acknowledged the right to participate upon their informed consent and withdraw at any time. At the end of data collection, 169 students (mean age=26 years; mostly women; 83,4%) completed the questionnaire three times.

We tested the conceptual model (direct and indirect effect hypotheses) with the macro PROCESS of the SPSS package. We observed that STS increases PE directly (Hypothesis 1 confirmed) and indirectly through students' self-efficacy, career identity and social capital (Hypotheses 2a, 2b, and 2c confirmed).

A larger sample may be required to test these relationships. Moreover, our empirical work may be replicated with longer time lags to better investigate the causal chain between our study variables. Lastly, collecting all variables at all points in time may produce more precise insights into the hypothesised relationships.

Our study contributes to the understanding of the PE concept empirically. Indeed, we remark on the impact that contextual factors may have in helping people to feel employable, somewhat neglected by research (Forrier et al., 2018). In a practical sense, our findings suggest that universities may encourage teachers to adopt a student-centred approach, using work-based and career-oriented pedagogical methods. Thus, they can help prospective new entrants feel prepared for the upcoming transition.

This study extends the knowledge of the students' and graduates' PE, which Universities may exploit to facilitate access to the labour market.

Video presentation is available by following this [link](#).

- **Inclusive enrolment: Predictive validity and adverse impact of various admission instruments used in a higher education bachelor programme.**

Pieter van Lamoen; Annemarie M.F. Hiemstra; Marieke Meeuwisse, Lidia Arends & Sabine E. Severiens

Good admission procedures show good predictive validity (i.e., admission results are related to the outcome of interests) and are fair (i.e., unbiased against minorities). Research shows, however, that traditional and often-used admission procedures in higher education, consisting of standardized cognitive tests and high school GPA, tend to adversely impact students with a migration background and first-generation students, as they show systematic differences in scores between sub-groups, and thus in chances of acceptance (Stegers-Jager et al., 2015). First-generation students and students with a migration background do, for example, have lower chances of acceptance when only cognitive indicators are assessed. Universities are seeking for ways to make their admission procedures more inclusive, by reducing adverse impact of their admission procedures. The aim of this study is therefore to assess the effects of various admission instruments on the socioeconomic and ethnic diversity of the student population. Particularly, we will assess the use of curriculum sample tests and non- cognitive criteria.

First, curriculum sample tests usually consist of studying college-level domain-specific material and taking an exam, thereby mimicking what is often required in Bachelor programmes (Niessen et al., 2019). As such, these tests apply a content-matching approach to predictors and outcomes, based on the theory of behavioural consistency (Sackett et al., 2016). Second, non-cognitive, or 'character-based' admission criteria include a wide range of indicators of personality, motivation, and other behavioural tendencies. The inclusion of these criteria in admission procedures offers the possibility to compensate for lower cognitive scores, which may reduce adverse impact on selection decision for minority students (i.e., first generation students and students with a migration background) (Stegers- Jager et al., 2015). The extent to which both

curriculum sample tests and non-cognitive criteria are indeed strategies to reduce adverse impact of admission procedures is, however, yet unclear. The current study aims to contribute to this literature by studying the adverse impact and predictive validity of various admission instruments (cognitive, non-cognitive, and a curriculum sample test) that are simultaneously used in one admission procedure of a Psychology Bachelor programme, offering the possibility to compare the effects of these different instruments.

The adverse impact and predictive validity of the admission instruments were studied by using student administration data of approximately 267 applicants on demographics and academic achievement (e.g., grades and retention). First results indicate that the inclusion of curriculum samples and non-cognitive criteria next to pre-university GPA may indeed offer a possibility to reduce adverse impact. Regarding predictive validity, the curriculum sample test is related to first-year academic achievement success of students, while this is not the case for the non-cognitive criteria. Further analyses need to be and will be conducted to draw further conclusions on the possibility of these instruments to make admissions in higher education more inclusive.

- **Dual-earner couples' parental leave decisions: A longitudinal study on the impact of domain- and gender-specific role attitudes.**  
Anna M. Stertz & Bettina S. Wiese

Caring for a newborn child and balancing work and private life during the child's first years is as a crucial challenge for many mothers and fathers. Especially in dual-earner couples, spouses have to coordinate their work and family-related behavior to manage work demands and increased parental responsibilities. An important work- and family-related decision (expectant) parents have to make is whether or not to take parental leave. Past research confirmed relationships between individual gender-role attitudes and individual use of parental leave but mostly neglected a dyadic perspective in terms of reciprocal influences between the mother and the father. Given that the work and family life courses of couples are interdependent ("linked lives", Elder, 1994, p. 6), focusing on the individual consequently represents a limited perspective. There is first evidence from a dyadic longitudinal study that mothers, but not fathers, are influenced in their parental leave decisions by gender-role attitudes of their partner (Stertz et al., 2017). However, in this study only attitudes toward the mother role were taken into account and not also attitudes toward the father role. In order to predict mothers' but also fathers' parental leave, we suggest a differentiation of attitudes toward roles, namely into the ideal parent role of women and men (e.g., belief that mothers are better at identifying a child's needs than fathers are) as well as the ideal worker role of women and men (e.g., expectation that men should focus on career advancement whereas this should be less important for women). The present research aims at investigating the impact of expectant couples' gendered parent and worker role attitudes on mothers and fathers' parental leave decisions by taking interdependencies between couples into account – both theoretically and methodologically.

Gender-role attitudes might be particularly relevant to explain differences in leave-taking behavior. They represent personal beliefs about women's and men's ideal behaviors and responsibilities (Eagly, 1987) ranging from traditional to egalitarian. Traditionally, woman's role is being the homemaker with caretaking responsibilities. In contrast, the man's traditional role is being the breadwinner who is ideally occupying

an authority position at work. Attitudes toward gender roles coexist with specific roles defined by family relatedness and occupation (Eagly & Wood, 2012). Thus, gendered attitudes towards the parent and the worker role may shape mother's and father's parental leave decisions. From a system-theoretical perspective (e.g., Bronfenbrenner, 1979) and a life course perspective (e.g., Elder, 1994), couples do not act in isolation from each other and their life courses are interwoven. Becoming parents constitutes one life transition in which the linkage of both partner's life courses is illustrated most prominently. Consequently, besides intraindividual influences, the impact of one partner's attitude on the other partner's parental leave decision must be taken into account.

We conducted a longitudinal study with heterosexual dual-earner couples that expected their first child at the first measurement point. The last measurement point of the study took place 18 months after childbirth. Expectant mothers' and fathers' gendered parent and worker role attitudes were assessed during pregnancy (T1). Information on their length of leave was assessed in the postnatal questionnaires. The analysis using the Actor-Partner Interdependence Model are based on  $N = 365$  couples.

Regarding intra-individual influences, the results indicate that fathers with traditional attitudes toward men's worker role took shorter leaves and that mothers with traditional attitudes toward women's parent took longer parental leaves. With respect to inter-individual influences, our results indicate that attitudes toward men's role as worker were of importance for couples' parental leave decisions. Fathers with female partners who held more traditional attitudes toward men's worker role took shorter leaves and mothers with male partners who held more traditional attitudes toward men's worker role took longer leaves.

Due to the research design, the last measurement point took place 18 months after childbirth. In the country in which the study was conducted (i.e., Germany), parents can take parental leave beyond this period. In the case that longer parental leave is taken, only information on the expected total leave length can be taken into account in the analysis. Macrosystemic characteristics (e.g., legal parental leave regulations, gender-specific norms) can have an impact on mothers' and fathers' use of parental leave. Such contextual influences may also be reflected in gender-specific partner effects. Accordingly, future research should investigate the role of couples' gendered parental and worker role attitudes for couples' parental leave decisions in contexts other than the German one.

Role attitudes have to be differentiated with regard to the gender of the role occupant as well as the domain (work, family). Based on this and by including the couple level, new insights into the decision-making dynamics of dual-earner couples emerge, which should also be taken into account in career counselling. Originality/Value: By differentiating role attitudes according to gender and domain, it was possible to show that – contrary to previous findings – not also women but also men are influenced in their work-family decisions by the attitudes of their partners.

- **Perceptions of charismatic leadership, work-unit motivation and team performance: a dynamic model for conditional mediation.**  
Gea Eman; Vicente González-Romá & Ana Hernández

We investigated whether changes in charismatic leadership perceptions are related to changes in team motivation, changes in homogeneity in leadership charisma perceptions and changes in team performance over time. We have also explored whether changes in homogeneity in charismatic leadership perceptions over time moderate the indirect effect of changes in charismatic leadership perceptions on changes in team performance via changes in team motivation.

In contemporary organizations team leaders have become key agents of goal achievement (Weberg, Weberg, 2014; Gardner et al., 2012; Salas, Sims & Burke, 2005) and new questions regarding the mechanisms functioning behind team level constructs have become more relevant (Antonakis, 2012; Yammarino, Atwater & Spanler, 2004). One key characteristic of leaders that has shown an influence on team performance is charisma (Avolio & Tammarino, 2013; Nohe, Michaelis, Menges, Zhang, Sonntag, 2013; Seibert, Wang & Courtright, 2011; Waldman & Yammarino, 1999; De Groot, Kiker, & Cross, 2000; Conger & Kanungo, 2000). Following the call made by different authors about the need to gain more knowledge about the mechanisms by which perceptions of charisma exert an influence on team performance (Antonakis, 2012; Yammarino, Atwater & Spanler, 2004) we incorporate team motivation as one of the mechanisms that links charismatic leadership with team performance. We find that the Job Demands-Resources (JD-R) model serves as a good reference to explain some of the mechanisms behind the relationship between charismatic leadership and team performance (Bakker et al., 2003c; Schaufeli and Bakker, 2004). The JD-R model assumes that the effects of job resources on team outcomes are motivational in nature, both intrinsic (since they inspire growth and sense of shared development) (Bakker & Demerouti, 2007) and extrinsic (since the mere availability of adequate job resources have shown to inspire willingness to use them (Meijman & Mulder, 1998)). Motivation and team performance have been repeatedly linked in the past (Weaver, Bowers, Salas & Cannon-Bowers, 1997; Bass, 1990; Bass and Avolio, 1994; Densten, 2002; Dionne, Yammarino, Atwater, & Spangler, 2004). We are taking a dynamic approach, observing the relationships between the changes in variables over time. Also, since charismatic leadership is validated only by the perceptions of followers, the within-team variation in those perceptions should not be considered just error variance (e.g. Mathieu, Maynard, Rapp & Gilson, 2008), and we are factoring in the changes in homogeneity in charismatic leadership perceptions as a variable.

The sample consisted of 115 bank branches of a bank located in Uruguay. We used panel data analysis. We based the analytical approach on Finkel's Casual analysis with panel data to analyze how changes in leaders' charisma (as perceived by teams) indirectly relate to changes in team performance through changes in team motivation. The moderating role of changes in within-team homogeneity in perceptions of charismatic leadership is assessed too. Different hierarchical regressions were conducted by means of the software SPSS Statistics 23.0, to test our mediation and our moderation hypotheses.

The results obtained showed that, after controlling for team size and team tenure, changes in charismatic leadership perceptions related to changes in team motivation over time. We have also found that changes in team motivation related to changes in team performance over time. The relationship between changes in charismatic leadership perceptions and changes in team performance over time were partially mediated by

changes in team motivation. Our assumption that changes in homogeneity in charismatic leadership perceptions moderated the relationship between changes in charismatic leadership perceptions and team motivation were not supported.

Practical implications relate to the transfer of research results into cutting edge leadership training programs. Because charismatic behaviors can be trained (Conger & Kanungo 1988.; Richardson and Thayer 1993.; Antonakis, Fenley, & Liechti, 2011), successful training programs may be used to foster homogeneous and high perceptions of leader's charisma among team members. Another approach, on the other hand, utilizes the trainability of the mediator. Considering that charismatic leadership is communicative and that communication can be trained (De Vries, Bakker-Pieper, Oostenveld, 2010). it is reasonable to expect many leadership training programs will focus on good quality communication as a part of their leadership training.

This study deepens the understanding of the mechanisms that relate changes in leadership perceptions with team performance over time. As an additional value, it includes homogeneity of team perception, a dispersion variable, proving that differences in options are not mere error variance.

- **Being a videoconference swim coach.**

Giuseppe Scavo; Marc-Éric Bobillier Chaumon ; Jean-Luc Tomás & Jean-François Robin

The goal of this research is to show how an impediment to activity could generate a completely new activity through an instrument switch. This is a work psychology intervention based on a French-specific clinical approach to activity (Clot, 1999, 2008), with major references to Lev Vygotsky's historical-cultural theory.

A swim coach had been observed in distance mode throughout the Covid-19 2021 lockdown in France. He figured out a way to stay in touch with his swimmers and “practice” through videoconferences: dry land training, swimming-related theoretical courses and swim champions video analysis. The development of this activity had been documented for two months, with observations, video recording and interviews, all in teleconference. It resulted in a visual elaboration of the clinical approach three-poles model, where the rise of a new activity from an instrument switch (from pool to videoconference software) is showed. In a regular swim coach activity, the three-poles model is Subject (S)-Swim coach, Object (Ob)-Swim practice and Others (O)-Swimmers. These three poles are linked to each other through direct and instrument-mediated relations. Pool is the instrument (I). As pool became unavailable, a new instrument is discovered: (I’)-videoconference software. So, the three poles shift to new places and became: (S’)-Teacher, (Ob’)-Staying in touch with swimming, (O’)-Pupils. Some back-and-forth tensions exist between the former and the present activity, partly in an active form (“Going towards new activity”) and partly in a passive form (“Going back to former activity”). The French clinical approach to activity identifies these tensions with Spinoza's affectus.

In the end passive form wins, as swimming practice become available again and because this is the more stabilized and grounded of the two activities. The hypothesis is that support from organizations and colleagues is necessary in order to stabilize a new activity. There was a lack of this kind of support, as the coach was isolated and alone in this new activity. Some aspects like difficulty of body language detection limited this distance psychological intervention. However, this mode allowed the psychologist to do a grounded observation, as he and the subject shared similar work conditions.

This research showed how a new activity could rise from the impediment of the previous one. This process is formalized through the clinical approach three-poles model. Pursuing this kind of research could help understand how professionals, in contexts such the Covid- 19 pandemic, find out unexpected ways to pursue their work.

Video presentation is available by following this [link](#).

- **The shift in engagement drivers due to hybrid and remote work setups.**  
Ali Fenwick; Viktor Nilsson & Nadine Page

The COVID19 pandemic has significantly impacted how and where we work. Flexible work arrangements have become, and will continue to be, the norm in many industries (Gratton, 2021). However, working from home for long periods of time can affect employee engagement and feelings of connectedness in both positive and negative ways (Emmett, Schrimper & Wood, 2020). As such, it is important for business leaders and people managers to know how hybrid work and full-time remote work setups affect employee attitudes and behaviours. As organisations redefine how work is conducted in the post-pandemic era, managing a workforce across a continuum of flexible work arrangements will be paramount to effective talent management and organisational performance.

The objective of this study is to investigate the impact of performance drivers on employee engagement (intellectual, social and affective) and a sense of belonging when working in flexible work arrangements. The aim of this research is to advance the existing work psychology/engagement literature with novel insights on how performance drivers impact employee outcomes differently within flexible work arrangements. This research will also help to inform organisational practitioners how to improve their remote workforce management practices.

Employee engagement is an important driver of employee behaviours and performance outcomes (Anitha, 2014). The engagement literature explains how various organisational factors and business practices impact performance through employee engagement (e.g. Bakker and Demerouti, 2014). A sense of belonging is also an important predictor of work performance and retention, and should be considered in future studies where a loss of connection can occur due to the changing nature of work (e.g. Fenwick, 2018; Waller, 2022). Recent studies highlight that working from home for long periods of time can lower engagement in work and feelings of connectedness due to lack of physical proximity

with other colleagues, lack of direction, and feelings of isolation and loneliness (Oakman, Kinsman, Stuckley, Graham & Weale, 2020). In this study, we focus on the variables that might support employee engagement and a sense of belonging when working remotely. We hypothesize that organisational collaboration, growth opportunities, and purpose will have a positive impact on the work engagement and sense of belonging of employees with flexible work arrangements but will differ in effect depending on the type of flexible work arrangement.

This paper examines how different performance drivers affect employee engagement, sense of belonging, and performance of employees working full-time from the office (0 – 1 days a week working from home), in a hybrid work setup (2 to 4 days a week working from home), and in a fully remote work setup (5 days a week working from home). Employee engagement was measured using the ISA engagement scale which captures intellectual, social, and affective engagement (Soane, Alfes, Shantz, Rees & Gatenby, 2012). Sense of belonging was measured using a scale designed by the researchers (after running reliability and validity tests). The sample consisted of 399 working professionals. Statistical analysis in SPSS and structural equation modelling in R were applied to test the hypothesized relationships for the three groups.

The results obtained show that collaboration, growth opportunities, and purpose affect employee engagement and sense of belonging differently when working in different work arrangements. Results show that collaboration affects employee performance and retention through unique pathways. For full-time office, hybrid and full-time remote workers, collaboration positively impacts employee outcomes mainly through a sense of belonging. While for hybrid and full-time remote workers, collaboration also positively impacts employee outcomes through engagement (specifically cognitive and social engagement), but not for full-time office workers. Interestingly, purpose positively impacts employee outcomes through a sense of belonging only for full-time office workers and not for hybrid or full-time remote workers. While engagement (specifically affective engagement) positively impacts employee outcomes for hybrid and full-time remote workers, but not for full-time office workers.

Video presentation is available by following this [link](#).

- **Sickness presenteeism in UK prison officers: the risk factors.**  
Gail Kinman & Andrew Clements

Although there is some evidence that prison officers frequently work while sick (Kinman et al. 2019), little is known about the reasons why they do so or the implications for their wellbeing and perceptions of the workplace safety climate. We examined these issues by drawing on qualitative and quantitative data from two cross-sectional online surveys of UK prison officers.

This mixed methods research examined the extent of sickness presenteeism (frequency and number of days worked) and the reasons why officers engage in such behaviour (study 1, n = 1,682), as well as were the most common reasons for presenteeism and how they relate to self-reported mental health and job satisfaction (study 2, n = 1,956). The themes obtained from a content analysis of the study 1 data were used to

develop a 12-item scale that was piloted with 60 prison officers before administration to respondents in study 2. The reasons for presenteeism were scored on a five-point scale where 1 = ‘strongly disagree’ and 5 = ‘strongly agree’. The General Health Questionnaire (GHQ-12: Goldberg & Williams, 1988) assessed mental health and workplace safety climate was measured by a scale developed for the survey.

Most respondents to the earlier survey (84%) reported working while sick at least sometimes, with 53% indicated that they always did so. Nearly six out of ten respondents (59.1%) who reported presenteeism had worked for ten days or less, 22.6% between 11 and 20 days and 17.4% 21 days or more. Analysis of the qualitative data identified several themes: punitive absence management systems; pressure from management; short-staffing and fear of letting colleagues down; job insecurity; fear of disbelief and shaming; and duty and professionalism.

The most common reasons provided for working while sick related to a sense of duty and professionalism ( $M = 4.29$ ,  $SD = 0.87$  on a five-point scale), concerns about letting colleagues down, feelings of guilt, concerns about being subjected to disciplinary action, and worries about unsafe staffing levels. The presenteeism items explained 30% of the variance in self-reported mental health. The items that made the strongest contribution to the variance related to heavy workload ( $\beta = .17$ ,  $p < .001$ ), pressure from management ( $\beta = .16$ ,  $p < .001$ ), concerns that illness would not be seen as genuine ( $\beta = .14$ ,  $p < .001$ ), feelings of guilt ( $\beta = .13$ ,  $p < .001$ ), fears of job loss ( $\beta = .12$ ,  $p < .001$ ), and expectations of others ( $\beta = .11$ ,  $p < .001$ ). For perceptions of safety climate, the presenteeism items accounted for 17% of variance, with pressure by management ( $\beta = -.27$ ,  $p < .001$ ), insufficient staffing ( $\beta = -.19$ ,  $p < .001$ ), not wanting to let colleagues down ( $\beta = -.13$ ,  $p < .001$ ), not wanting to let managers down ( $\beta = -.11$ ,  $p < .001$ ), workload ( $\beta = -.10$ ,  $p < .001$ ) and heavy workload ( $\beta = -.11$ ,  $p < .01$ ), making the strongest contributions.

This research suggests that presenteeism is common among UK prison officers with negative implications for their mental health and the workplace safety climate. Reasons provided for working while sick include external factors, such as workload and management pressure, internal factors, such as maintaining personal standards and feelings of guilt, as well as fears about job security. The findings can be used to inform interventions at the organisational and individual levels to encourage a ‘healthier’ approach to sickness absence, with likely benefits for staff wellbeing and the health and safety of colleagues and prisoners. As previous research has highlighted the risks of presenteeism for the health and safety of others (Niven & Ciborowska, 2015; Kinman & Grant, 2021), future studies should examine links with job performance, particularly errors and incidents in human service sectors, as well as other key factors such as job performance and retention.

The findings were based on cross-sectional correlational data. Longitudinal research is needed to examine the impact of working while sick on the physical and mental health of prison officers over time. A wider range of outcome measures should be included, such as job performance and retention, to highlight the costs of sickness presenteeism to employers and encourage the implementation of interventions to reduce this risky behaviour.

- **Interdisciplinary work design in interactive service work.**

Anne Steputat-Raetze; Julia Friedrich; Kristin Gilbert; Ulrike Pietrzyk; Vanita Roemer & Christian Zinke-Wehlmann

In interactive service work, work activities are centered around people (e.g., customers, clients, patients, students). Thus, work is characterized by interpersonal processes which require high ethical and quality standards. Depending on the service branch, clients expect help, advice, solidarity and empathy from service providers. In contrast to production work, interactive service work has specific work demands such as cooperation with clients, dealing with own and the client's emotions and spontaneous needs for action. In addition, interactive service work is subject to constant pressure to economize. In order to design efficient, customer-oriented service work, the approach of service engineering is used. However, this approach is technology-driven and focuses on the customer's perception of service quality and economic efficiency. Thus, it bears the risk of neglecting the work requirements of employees in interactive service work. High-quality and empathic human care needs time, which often conflicts with business activities based on economic considerations. Therefore, it is the goal of our interdisciplinary research project to enrich the efficiency-oriented service engineering approach with employee-oriented psychological work design solutions, in order to address the special demands of interactive service work. A sub-goal is to create more time for employees working with clients, for example by facilitating routine tasks (e.g., documentation and information management) through implementing digital solutions.

A cooperation of work psychologists and service engineers is applied in the research project. As a first step in the development of this interdisciplinary approach to service work design, the work and service processes in elderly care and childcare facilities were examined as use cases. The selected service institutions comprised an outpatient elderly care facility with 37 employees and two childcare facilities with 66 employees. Analysis methods included document analyses, surveys, semi-standardized interviews with service providers (e.g., employees) and service recipients (e.g., parents), and process analyses, as well as touchpoint and stakeholder mapping. While experts from each scientific discipline carried out the analysis, both disciplines assessed the results and derived joint goals of service work design, considering the viewpoints of employees and clients. These steps are followed by the ongoing development process of integrative design solutions. The design solutions will be applied and evaluated in the use cases of elderly care and childcare.

The analysis of work and service processes revealed challenges that call for solutions. Several fields of action for joint design approaches emerged for each use case. The fields of action of both use cases overlap in the following dimensions: design of information flows and documentation processes, idea and change management, qualification and training, process design, social relations within the teams, and occupational health and safety. As the design of information flows and documentation processes has been found to be especially challenging for practitioners in the childcare facilities, the researchers prioritized this field of action in the design process. Currently, the informational demands of both, employees and clients, are not met satisfactorily, and information flows turned out to be complex, inefficient and susceptible to errors (e.g., double structures of analog and digital documents). As a solution for this field of action, a redesign process of the information flows and

documentation procedures will be leveraged. Through means of well-considered digitization, processes can be simplified, and information can be transferred easily. This allows more time for direct interaction between employees and clients. Work psychologists accompany the process of re-design and digitization in order to maximize positive effects for employees in terms of work facilitation and improved working conditions, contributing to employee well-being and health.

Currently, the results of the service work analysis and the development of design solutions are limited to three use case facilities. An employee survey with an expanded sample is in preparation. The implementation and evaluation of the design solutions remain to be carried out during 2022. Research/Practical Implications. By combining the expertise from work psychology and service engineering, synergetic effects arise for the practical design of interactive service work.

A novel approach for the design of interactive service work is being developed, which combines design solutions from the field of work science with the efficiency- oriented approach of service engineering. The scientifically based, field-tested and transferable approach forms the basis for a sustainable, human-centered and economical design of interactive service work in times of digitalization.

- **Responding to the pandemic - Delivering virtual assessment.**  
Philip Wilson; Sonia Pawson & Natalia Thomas

This paper outlines the transition from a face to face graduate Assessment Centre (AC) and Final Selection Board, in a public sector context, to a virtual delivery format. This conversion was driven, above all, by Covid-19 restrictions. The AC design involved replacing an existing iPad tablet-based app, developed in 2019, that was run face to face, with a fully virtual experience - administered remotely.

The shortlisting stages of the graduate assessment process, prior to the AC stage, had been online for a number of years, comprising online tests, work based scenarios and a video interview. The virtual AC app was therefore a continuation of an online candidate experience.

The assessment design was also shaped by a number of strategic objectives:

1. Identifying candidates with the highest potential for future senior leadership.
2. Strengthening the flow of diverse talent into the pipeline for senior leadership roles that reflects UK society.
3. Providing fast, flexible, and more modern, graduate assessments.
4. Offering an engaging and positive candidate experience using multimedia elements.
5. Improving scheme retention.

A digital agency was secured to support the AC update. This agency had originally been commissioned to create the previous iPad app, which they were then contracted to adapt for virtual provision.

The assessment process was developed by occupational psychologists, according to best practice and aligned with the UK's British Psychological Society's Standards on Assessment Centres (2015), the International Taskforce on Assessment Centre Guidance (1989), and the International Test Commission's (2005) International Guidelines on Computer-Based and Internet Delivered Testing.

The assessment process itself comprised:

- A leadership roleplay exercise conducted with a 'colleague' (played by the assessor) – with information presented via the app, and with the discussion on Google Meets.
- A group stakeholder exercise within a fictitious scenario – again presented via the app, with the discussion on Google Meets.
- A written analysis exercise, presented on the app, requiring the generation of ideas around an initiative – with the response recorded on a computer by the candidate.
- A Final Selection Board virtual interview, following the AC, for the Commercial graduate scheme.

The creation of the virtual app involved a series of digital and non-digital user trials to learn about candidate experience and build quick prototypes to test hypotheses. Web analytics and other data was used to enhance understanding of any emerging user/accessibility issues.

The assessment experience – supported by a fully trained operational team - was evolved in a number of ways, by providing:

- The capacity to easily activate exercises for candidates in an accessible way.
- A virtual candidate common room, allowing real time updates and support during the process.
- An easy to use tutorial for candidates; a preview of exercises; exercise instructions and password access.
- Ability to browse exercise items with easy navigation; a note and highlight facility; an FAQ Help screen; capacity to lock exercises and allow candidates to offer feedback about their exercise experience, including incorporation of reasonable adjustments.

The virtual assessment was delivered to 3,449 candidates. In developing the app, user (candidate) testing offered positive metrics:

Leadership Exercise:

'I found the app easy to use overall in the exercise': 91% positive.

'I preferred doing the exercise on the app compared to paper version': 82% positive

Group Exercise:

‘I found the app easy to use overall in the exercise’: 89% positive.

‘I preferred doing the exercise on the app compared to paper version’: 83% positive

Written Exercise:

‘I found the app easy to use overall in the exercise’: 91% positive.

‘I preferred doing the exercise on the app compared to paper version’: 82% positive

Candidate satisfaction data during the live virtual process was also positive:

- Leadership Exercise: 91%
- Group Exercise: 87.6%.
- Written Exercise: 90%

Assessor testimonial included: ‘It was really impressive how arrangements were made so effectively to support online assessments’.

In addition, diversity outcomes exceeded previous year metrics, including for the Final Selection Board:

- Female: 45% (4% increase on 2020)
- Ethnic minority: 28.2% (120% increase)
- Lower socio-economic background: 6.7% (34% increase)
- Disability: 27.8% (63% increase)

The case study provides an example of a successful transition of a volume assessment centre process to a virtual delivery format. Candidate reaction and diversity outcomes were positive. Future assessment plans will build on this experience, with new, even more diversity focused content, utilising similar virtual architecture.

- **Organisational support is what remains in the prediction of key post-pandemic work attitudes.**  
Duncan Jackson; George Michaelides & Amanda Jones

The change in working conditions precipitated by the covid19 pandemic raises important questions about the effectiveness of organisational practices on employee attitudes. Of particular interest is the mediating role of empowerment in the relationship between perceived working environment and their work-related attitudes. However, such predictions are only relevant to the extent that they control for baseline pre-pandemic perceptions. We sought to examine how empowerment enables individuals to cope in the context of the pandemic whilst controlling

for pre-pandemic perceptions. In doing so, we add to the theoretical literature on the psychological conditions that act as antecedents to key work attitudes during lockdown.

Previous research has associated organisational, managerial, and collegial support (e.g., Matusik et al., 2021), with empowerment (Emery et al., 2019; Yogalakshmi & Suganthi, 2020), and key work attitudes such as job satisfaction, well-being, and affective commitment (Avolio et al., 2004; Carless, 2004; Gong et al., 2020). In the pandemic, employees have had to navigate the technical requirements associated with remote working, raising the importance of “technological readiness” (e.g., Parasuraman & Colby, 2015). Little is known about how the pandemic has affected the prediction of work attitudes based on key organisational perceptions, whilst controlling for pre-pandemic conditions.

We applied structural equation modelling to test a model controlled for pre- and post-pandemic attitudes in 1072 working adults. In this model, technological readiness, organisational, managerial, and collegial support were related to empowerment. In turn, empowerment predicted job satisfaction, well-being, and affective commitment. Post-pandemic attitudes were controlled for pre-pandemic attitudes as well as for age and gender.

Results suggested an acceptable model fit ( $\chi^2 = 4054.03$ ,  $df = 46$ ,  $p < .001$ ; CFI = .99; TLI = .97; RMSEA = .048; SRMR = .009). When controlling for pre- and post-pandemic responses, a clear pattern of specific relationships (all  $p < .01$ ) emerged in that organisational support related to job satisfaction (standardized  $\beta = .31$ ), affective commitment ( $\beta = .35$ ), and well-being ( $\beta = .24$ ). Organisational support moreover related to empowerment ( $\beta = .28$ ), which in turn showed small relationships with job satisfaction ( $\beta = .15$ ) and well-being ( $\beta = .13$ ).

We were limited in the extent to which we could measure pre-pandemic attitudes and requested that participants recalled their experiences. Also, the only indirect effects observed in the model were those linking organisational support and empowerment and job satisfaction ( $\beta = .04$ ,  $p < .01$ ) and well-being ( $\beta = .04$ ,  $p < .05$ ). But these effects were small.

We contribute to the literature on work attitudes by modelling a statistically controlled perspective on pandemic-related variables. Perceived organisational support was the key predictor of key work attitudes when accounting for pre-pandemic attitudes and overshadowed any prediction based on perceived conditions of colleague support, manager support, and technological readiness. These findings inform theory on employee perceptions in a forced remote-working environment by raising the criticality of perceived organisational support in a pandemic. They also contribute to the literature on forced homeworking by indicating that organisational interventions aimed at enhancing empowerment among employees may foster the positive work attitudes required to cope both during the ongoing pandemic, and, more generally, in extreme circumstances.

Ours is the first known study to model pandemic-related work attitudes whilst attempting to offer control for pre-pandemic perceptions. The perspective thus offered is novel and provides insights into predictions that are of importance once baseline attitudes are controlled.

- **Introducing the social identity model of organizational change.**

Neela S. Mühlemann; Niklas K. Steffens; Johannes Ullrich; S. Alexander Haslam & Klaus Jonas

Organizations have to constantly change in order to survive in today's competitive markets. While some employees adjust well to the organizational changes, a number of employees have great difficulties to adjust and experience organizational changes as highly stressful events. One reason for this is that major organizational changes, such as mergers and acquisitions, imply changes to the organizational identity and put at risk employees' ability to maintain a sense of 'who we are as an organization'. The present study aims to introduce and provide empirical evidence for an integrative model for understanding employees' responses to organizational changes. More specifically, the model explains how and when organizational changes impact employees' adjustment, health and well-being.

Based on the social identity approach, we developed the Social Identity Model of Organizational Change (SIMOC), which proposes two pathways to adjustment to organizational change: the identity maintenance pathway and the identity gain pathway. A key proposition of SIMOC is that the two pathways are interdependent and that negative consequences for post-change identification and adjustment are likely to arise from employees' pre-change identification if neither of the two pathways is accessible (i.e., if employees can neither maintain old identities nor gain new ones).

We examined our model in a survey study with a predictive design. We surveyed 225 employees of a pharmaceutical company before and one and a half years after an acquisition. We used multi-group structural equation modelling to test the key propositions of SIMOC.

Findings supported the SIMOC by indicating that as long as employees experienced a sense of continuity or their supervisors supported them in gaining a new organizational identity, employees' pre-change identification was a valuable resource that contributed to employees' adjustment to the change by increasing employees' identification with the new organization. As predicted, if both pathways (identity continuity and identity gain) were not in operation, pre-change identification had a detrimental effect on employees' organizational citizenship behavior, job satisfaction, level of depression, and post-traumatic growth.

The study was entirely based on self-report survey data. Although common method bias cannot account for the interaction, future research using objective data on turnover and employees' stress level (e.g., Cortisol) could further test SIMOC. Qualitative interview data would also complement our initial findings by providing interesting insights into employees' experiences of the different pathway.

When undergoing change processes, change success depends on employees' ability to develop a shared sense of belonging to the newly emerging organization after the change. We showed that leaders can facilitate employees' adjustment, particularly under high identity discontinuity, because they provide employees with an understanding of what it means to be a member of the new organization.

The model advances our understanding of the identity processes that determine employees' responses to organizational change. By examining both identity continuity and identity gain pathways to post-merger identification and adjustment, it extends previous merger studies. Moreover, the presented study further contributes to a growing body of research showing the influence of identity leadership on employees' health and well-being. Extending previous studies, our findings provide evidence for the crucial role of leaders and their identity management in a dynamic change context. In this, the present study provides insights into how leaders can manage change successfully by helping employees to negotiate the identity transition and influencing subordinates' sense of self in times of change.

Video presentation is available by following this [link](#).

- **Attribution bias and perceptions: Examining the impact that gender and credit taking behavior have on performance perceptions of virtual teams.**

Kathya Garcia; Diana R. Sanchez; Clifton Lee; Yucheng Lu & Maria Chavez

A visual presentation is available by following this [link](#).

Video presentation is available by following this [link](#).

- **Can dynamic indicators of insufficient recovery predict stress-related psychological health problems?**

Aleksandra Bujacz; Leo Kowalski & Anna Finnes

A visual presentation is available by following this [link](#).

Video presentation is available by following this [link](#).

- **Get away from suffering: The relationship between different components of empathy, sense of purpose and intention to quit in healthcare.**

Elena Lorenzo-Sánchez; Helena Bonache; Dolores Morera; María Elisa de Castro-Peraza; Yurena Morera & Naira Delgado

A visual presentation is available by following this [link](#).

Video presentation is available by following this [link](#).

- **The use of DIARY mobile application for tracking stress reactions and promoting stress recovery in everyday experiences.**  
Leo Kowalski; Aleksandra Bujacz & Anna Finnes

A visual presentation is available by following this [link](#).

Video presentation is available by following this [link](#).

- **Meaningfulness buffers the effect of red tape: A day reconstruction study among dutch detectives (previous working-title: Daily job characteristics and the experience of red tape: A day reconstruction study among among dutch detectives).**  
Lina Lioba Rachow; Evangelia Demerouti & Sonja Rispens

A visual presentation is available by following this [link](#).

Video presentation is available by following this [link](#).

- **Examining the potential impact of dialectical thinking on policy decision making.**  
Hana Zimman & Diana R. Sanchez

Full text is available by following this [link](#).

- **Systematically induced delivery in healthy women: For which co-activity between women and carers?**  
Schalck Claudine & Gagnon Raymonde

Full text is available by following this [link](#).

- **Routine induction at 39 weeks' gestation, in healthy women: A revival of patriarchal ideology in health care?**  
Schalck Claudine & Gagnon Raymonde

Full text is available by following this [link](#).

- **Remote working: Friend or foe to your employees?**

Shaun Biggs

Full text is available by following this [link](#).

- **A critical examination of the labour policy discourse on economically inactive people with a disability and their potential.**  
Ann-Sophie Baeken; Anneleen Forrier & Nele De Cuyper

Full text is available by following this [link](#).

- **Effects of constructive controversy instructions on online group decision-making.**  
Anthony Cherbonnier; Brivael Hémon; Estelle Michinov; Eric Jamet & Nicolas Michinov

A visual presentation is available by following this [link](#).

- **Illegitimate tasks: make you feel insecure, exhausted, and hurt!**  
Maria U. Kottwitz; Wolfgang Kälin & Kathleen Otto

A visual presentation is available by following this [link](#).

- **How the past shapes the present: the role of previous unemployment experiences on reactions to later economic stressors.**  
Maïke E. Debus; Tahira M. Probst; Hyun J. Lee & Andrea Bazzoli

A visual presentation is available by following this [link](#).

- **The use of algorithm vs. human being in a sourcing process, involving a gay vs a straight candidate: Reluctance and implicit homophobia.**  
Alan Hasselberger & Marie-France Agnoletti

Video presentation is available by following this [link](#).

- **Five research-based tips for developing your management team.**  
Henning Bang

Video presentation is available by following this [link](#).

- **Three-way interaction effect of enriched job design, formalization and individual characteristics on work-life balance.**  
Amadeja Lamovšek; Matej Černe; Ivan Radević & Katerina Božič

Video presentation is available by following this [link](#).

- **Too old for the job? Choice framing effects shown to increase gender diversity in hiring decisions fail to increase age diversity.**  
Daniel Jolles; Marie Juanchich & Beatrice Piccoli

Video presentation is available by following this [link](#).

- **Developing leaders for a complex world: Evaluation of a charismatic leadership training.**  
Simon Liegl; Thomas Maran & Marco Furtner

Video presentation is available by following this [link](#).

- **Send in the psychologists? A latent class analysis on psychological support seeking behavior among healthcare workers during the Covid-19 pandemic.**  
Sophia Appelbom; Aleksandra Bujacz; Anna Finnes & Rikard Wicksell

Video presentation is available by following this [link](#).

- **Overcoming learned automaticity through meditation practice.**  
Sebastian Moder; Sebastian Moder; Thomas Maran; Martin Woznica; Elias Jehle; Marco Furtner & Simon Liegl

Video presentation is available by following this [link](#).

- **The BPS guidelines on the design & delivery of virtual assessment centres.**  
Helen Baron; Max Choi; Charlie Eyre & Natalia Thomas

Video presentation is available by following this [link](#).

*Honorable mention:*

**Applied relaxation in everyday work routine: Individual online training and trainer-guided group training.**  
Carlo Strehlau; Linda Hilla; Hanna Kische; Lars Pieper & Katja Beesdo Baum