

Fun at work, job engagement, and burnout: a meta-analysis and narrative synthesis

Eva Tzioti, Anthony Montgomery, Maria Spiliou, Christos Mouratidis, Vilma Chalili, Ilias Maliousis & Olga Lainidi

To cite this article: Eva Tzioti, Anthony Montgomery, Maria Spiliou, Christos Mouratidis, Vilma Chalili, Ilias Maliousis & Olga Lainidi (2025) Fun at work, job engagement, and burnout: a meta-analysis and narrative synthesis, *Cogent Psychology*, 12:1, 2492453, DOI: [10.1080/23311908.2025.2492453](https://doi.org/10.1080/23311908.2025.2492453)

To link to this article: <https://doi.org/10.1080/23311908.2025.2492453>



© 2025 The Author(s). Published by Informa UK Limited, trading as Taylor & Francis Group



View supplementary material [↗](#)



Published online: 24 Apr 2025.



Submit your article to this journal [↗](#)



Article views: 4295



View related articles [↗](#)









View Crossmark data [↗](#)



Citing articles: 4 View citing articles [↗](#)

Fun at work, job engagement, and burnout: a meta-analysis and narrative synthesis

Eva Tzioti^a , Anthony Montgomery^b , Maria Spiliou^c, Christos Mouratidis^a , Vilma Chalili^d 
, Ilias Maliousis^e  and Olga Lainidi^f 

^aSchool of Psychology, University of Derby, UK; ^bDepartment of Psychology, Northumbria University, UK; ^cIndependent Researcher, Sweden; ^dSchool of Medicine, Aristotle University of Thessaloniki, Greece; ^eDepartment of Psychology, University of Essex, UK; ^fSchool of Psychology, University of Leeds, UK

ABSTRACT

Objective: Fun, play, and humour are accepted as integral to understanding how individuals cope with adversity at work and thrive within an organization. Far from being merely about entertainment, Fun at Work embodies strategic elements via social bonding, essential for bolstering employee well-being, fostering engagement, and enhancing productivity. However, no previous systematic review has been published on the available evidence examining the links between fun at work, work engagement, and burnout.

Methods: A systematic search was conducted to identify eligible studies reporting on the relationship between fun at work and work engagement or burnout. A random-effects model was used for the meta-analysis whereas a constant comparative approach was employed for the development of the narrative synthesis.

Results: The results of the meta-analysis showed a substantial overlap between work engagement and fun at work and a smaller overlap with emotional exhaustion. The relationship between fun at work and work engagement was stronger in non-western/non-westernized countries and studies with samples including a higher proportion of men. The narrative review led to the proposition of two primary and bidirectional categories that capture the essence of workplace fun: Organization-Driven Fun and Employee-Driven Fun, providing the basis for a new conceptual approach to fun at work.

Conclusions: The proposed framework provides clear paths to future research directions and posits interesting theoretical questions concerning the role of fun as a resource/demand and challenge/hindrance in the Job-Demands Resources model.

ARTICLE HISTORY

Received 14 January 2025
Revised 28 March 2025
Accepted 8 April 2025

KEYWORDS

Fun at work; burnout; work engagement; meta-analysis; narrative synthesis

SUBJECTS

Meta Analysis; Work & Organizational Psychology; Occupational Health and Safety



1. Introduction


1.1. Fun and the workplace

Deal and Kennedy (1983) are widely acknowledged as the researchers who initially positioned ‘fun at work’ as worthy of study in the workplace. Their seminal book *Corporate Cultures* argued that the interaction between work and play is a key factor in the success of American firms. The assumption that playfulness is simply the opposite of work has been widely refuted (Csikszentmihalyi, 1990; Csikszentmihalyi & LeFevre, 1989; Starbuck & Webster, 1991), thus ‘the opposite of play is not work; it’s depression’ (Sutton-Smith, 2001, p. 198). Fun, play, and humor are accepted as integral to work and have been

promoted as management strategies to increase work engagement among employees (Chan & Mak, 2016; Michel et al., 2019; Plester & Hutchison, 2016; Warren & Fineman, 2006).

An accurate definition of fun at work (FaW) is difficult to provide, but generally, there is an agreement that FaW is the process of incorporating fun activities into organizations, resulting in a pleasant workplace where a range of exciting and gratifying tasks such as games, social gatherings, and learning opportunities are purposefully encouraged (Ford et al., 2003). Fun at work is usually classified as either managed fun or organic fun (McDowell, 2004; Tews et al., 2014). Managed fun refers to enjoyable activities initiated formally by management such as competitions,

CONTACT Olga Lainidi  o.lainidi@leeds.ac.uk  School of Psychology, University of Leeds, Woodhouse, Leeds LS2 9JT, UK

 Supplemental data for this article can be accessed online at <https://doi.org/10.1080/23311908.2025.2492453>.

This article has been corrected with minor changes. These changes do not impact the academic content of the article.

© 2025 The Author(s). Published by Informa UK Limited, trading as Taylor & Francis Group

This is an Open Access article distributed under the terms of the Creative Commons Attribution License (<http://creativecommons.org/licenses/by/4.0/>), which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited. The terms on which this article has been published allow the posting of the Accepted Manuscript in a repository by the author(s) or with their consent.

scheduled parties, and team-building activities, as opposed to organic fun, which refers to amusing behaviors and activities initiated informally by the employees themselves, such as socializing or joking with each other. Because the management literature tends not to differentiate between employee-led and organization-led fun, it has not been systematically documented whether the two are associated with different antecedents, different outcomes and operate via different mechanisms, though such a differentiation would be reasonable to expect (Plester et al., 2015). For example, we can assume that managed fun would be associated with less autonomy and could be experienced as a mandatory, imposed activity; while organic fun could be more spontaneous (Bowen et al., 2020), and is potentially associated with the employees' sense of autonomy (e.g. Playful Work Design, Bakker et al., 2020a) as management shows trust in their employees to complete their tasks in the most enjoyable way.

1.2. Fun at work, work engagement, and burnout

While it has been suggested that FaW can be associated with lower negative affectivity (Bartzik et al., 2021) and higher positive affectivity (Abdelmotaleb, 2024; Fluegge, 2008) towards one's occupation/organization, it remains unclear how these might occur and whether the effects are stronger for negative vs positive outcomes, and how each organization interprets and uses fun for their employees. One key concept that has been used to better understand FaW is Work Engagement (WE), which is defined by Schaufeli and Bakker (2004), (p. 295) as '*a positive, fulfilling, work-related state of mind that is characterized by vigor, dedication, and absorption*'. Workplace fun has been linked to improved employee engagement, satisfaction, and performance (Georganta & Montgomery, 2022; Karl et al., 2005; Karl & Peluchette, 2006; Newstrom, 2002). Engagement is defined in terms of high energy and a positive psychological state, while FaW also includes such elements, which suggests significant conceptual overlap. Plester and Hutchison (2016), using an ethnographic approach, found that employees spontaneously use the word 'engaged' or 'engagement', when talking about fun. They also found evidence that fun was experienced as engagement at both the individual and organizational level - whereby fun at work can create positive feelings and camaraderie which stimulate engagement at the wider organizational or team level.

Work Engagement is often used as a metric of work-related well-being and organizational effectiveness. Higher WE levels have been associated with better individual and organizational performance as well as lower turnover intentions (Christian et al., 2011) and longitudinal evidence from teachers (Hakanen et al., 2008) highlighted the importance of job resources fostering sustainable work engagement. The latter is important, as high levels of WE can be difficult to maintain, increasing the risk of burnout if not balanced with appropriate support and recovery mechanisms (Junker et al., 2021).

The term burnout vividly captures the transition from initial enthusiasm and dedication to a state of fatigue and disengagement, reflecting how the initial passion and commitment to a job are eventually depleted. The most widely used definition describes burnout as a multifaceted phenomenon consisting of exhaustion, depersonalization/cynicism, a sense of ineffectiveness (Maslach & Leiter, 2016). The relationship between WE and burnout is complex and approaches include viewing the two as the opposite sides of the same coin (see e.g. Maslach & Leiter, 1997, 2016; Moeller et al., 2018; Schaufeli et al., 2006; Taris et al., 2017), as opposite ends on a continuum (Leiter & Maslach, 2017; Maslach et al., 1996) or as independent states that coexist and are not mutually exclusive (e.g. Trógolo et al., 2020). Although energy, participation, and efficacy are the direct antithesis of the three characteristics of burnout, as Maslach and Leiter (1997) describe, employees can still maintain a level of WE towards aspects of the job they find more meaningful and fulfilling while being in an overall depleted state.

There seems to be a consensus that FaW should have a positive relationship with WE and a negative relationship with Burnout. Permatasari and Riani (2019) found that FaW was significantly related to work engagement, explaining that a fun workplace stimulates an overall good mood and excitement. On the other hand, Lee et al. (2021) found that fun and play at work were associated with less reported burnout, and increased innovation behaviors, however, this relationship yielded positive results for burnout, from employees who had a positive attitude towards FaW. Lastly, some scholars argue that FaW can potentially add to burnout when employee preferences (Bowen et al., 2020), or characteristics; for example, negative attitudes towards fun (Plester & Hutchison, 2016), are not considered. Renee Baptiste's (2009) study found that senior managers resist engaging in play or fun activities at work because they already have heavy workloads. Their

reluctance and skepticism towards play can lead to increased burnout and stress, potentially worsening their overall job experience.

2. Theory and research questions

Far from being merely about entertainment, FaW embodies strategic elements via social bonding and a sense of belonging (Waller, 2020), which is essential for bolstering employee wellbeing, fostering engagement, and enhancing productivity (Fluegge-Woolf, 2014), while potentially serving as a preventative measure for burnout. In this sense, FaW represents an important resource for employees in the workplace, serving both a resource-building and resource-replenishing function.

A novel framework for understanding the relationship between FaW with burnout and work engagement is the Job Demands-Resources (JD-R) theory. JD-R theory aims to explain occupational well-being through the influence of two broad and opposing categorizations of characteristics of the job, job demands, and job resources (Bakker et al., 2023). Characteristics of the job can be defined as discrete physical, psychological, and social aspects of the job and the organizational environment that influence occupational well-being. According to JD-R theory, job demands are characteristics of the job that require effort and are associated with certain psychological/physiological costs (Demerouti et al., 2001). Job resources, on the other hand, are characteristics of the job that motivate, promote work goals, balance the impact of job demands, and inspire personal growth and learning (Bakker & Demerouti, 2017). Job demands and resources exert their influence in two distinct processes, namely the health impairment process and the motivational process. Job demands lead to increased effort, which, in turn, leads to a higher risk of burnout (Health impairment process; Demerouti et al., 2001; Li et al., 2023). Job resources satisfy basic psychological needs and, as a result, promote work engagement (motivational process; Bakker & Xanthopoulou, 2013; Bakker et al., 2023). FaW has the potential to be both a hindrance demand (e.g. imposed fun) and a social resource (e.g. employee-generated fun activities), depending on how it is introduced and managed in the workplace. In terms of employee generated organic FaW, positioning it as a social resource is consistent with viewing play-at-work activities as energy-management strategies (Celestine & Yeo, 2021) that can restore energy by 'replenishing' resources (i.e. conserving and allowing natural

replenishment; Hobfoll, 2002). Congruently, in activities initiated by employees, workers' participation is more likely to be propelled by intrinsic motivation (i.e., control and autonomy; Ryan & Deci, 2000a, 2000b), in agreement with recovery theories (Sonnentag & Fritz, 2007) that suggest that FaW may trigger recovery experiences that help workers to manage energy. A fun work environment has the potential to harness behaviours that are already occurring and act as a preventive or protective mechanism against the inevitable stress associated with increasingly demanding workplaces (Georganta & Montgomery, 2016). Conversely, imposed fun is consistent with the research on hindrance demands (Bakker & Demerouti, 2017; Tuckey et al., 2015), whereby the use of FaW may not be enough to mitigate the effects of chronic exposure to unstimulating and emotionally demanding work, thus contributing to frustrating employees by impeding personal growth and goal attainment.

To the best of our knowledge, there are no existing reviews and meta-analyses that have consolidated quantitative findings relating to the relationships between FaW, work engagement (WE), and burnout. Previous meta-analyses of work engagement and burnout have not included FaW as a variable of interest. The meta-analysis on work engagement from the perspective of the job demands-resources model (Mazzetti et al., 2023), did not include studies assessing the relationship between FaW and work engagement, and the review only covered the period 2011–2018. The meta-analytic review of longitudinal studies assessing work engagement (Lesener et al., 2020) did not include studies assessing the relationship between FaW and work engagement. Congruently, a meta-analysis of burnout and the work environment has not included studies assessing the relationship between FaW and burnout (Aronsson et al., 2017), nor has a meta-analysis assessing the relationship between burnout, job demands, resources, and attitudes (Alarcon, 2011). Finally, the only relevant study to FaW, a meta-analysis of positive humour in the workplace (Mesmer-Magnus et al., 2012), did not include work engagement. Overall, there is a significant gap in the literature concerning the relationship between FaW and work engagement/burnout.

Our study aims are threefold. First, to address the gap in the literature by providing a comprehensive systematic review of these relationships, consolidating, and interpreting the findings from related studies. Second, we employed a meta-analysis to identify

whether, across the literature, the relationships between FaW and WE and FaW and burnout are statistically significant, to delineate the direction of the two relationships and to report on the strength of their effect sizes. Moreover, we examined sample-level, design-level, and study-level moderators such as gender, country, age, study design, and journal impact factor.

Third, we supplemented the meta-analytic findings with a narrative review, to further explore how FaW was approached and measured the studies included in our meta-analysis, towards a proposed taxonomy and a framework to study FaW. Michel et al. (2019) in their review of the FaW literature highlighted the absence of a theoretically grounded framework, and their propositions (Michel et al., 2019, p. 107) are intrinsically linked to understanding what researchers chose to measure when conducting studies on the relationship between FaW, burnout and WE. The present review will build upon the Michel et al. (2019) review by addressing two key recommendations. Firstly, the review recommends that future research should be conducted to better distinguish between the different types of fun in the workplace. Our focus on burnout and work engagement will allow us to delineate the different types of fun that drive these important well-being indicators. Secondly, the review recommends that there is a need to provide a clear understanding of why organizations should emphasize fun in the workplace and how engaging in fun events benefits individuals. Burnout and work engagement represent robust indicators of organizational health and establishing their relationship with FaW is an important step in providing an evidence base for the phenomenon. Gaining a better understanding of definitions and measurements is essential to discuss evidence-based associations with significant implications for our understanding of work engagement and burnout as well.

The aim is to provide actionable insights and evidence-based recommendations for future research as well as implications for HRM practice. More specifically, the review addressed the following research questions:

1. Is there a relationship between fun at work and job engagement?
2. Is there a relationship between fun at work and job burnout?
3. How is fun at work conceptualized and measured in the included studies?¹

3. Methods

3.1. Search strategy

After completing the registration on Prospero (CRD42022339595), a search of relevant studies was conducted following the checklist recommended in the Preferred Reporting Items for Systematic Reviews and Meta-analyses (PRISMA) statement (Moher et al., 2009). Search databases included SCOPUS, Web of Science, MEDLINE (PubMed), ProQuest, ScienceDirect, and Google Scholar. The initial search was conducted to include published articles up until June 2022 and was later updated to include results up to May 2024. The search strings for each database are available in Supplemental Material A. To ensure a comprehensive yet focused search, we limited most database searches to the title and/or abstract fields. This decision followed extensive preliminary testing, which showed that full-text searches produced a large volume of irrelevant results, reducing precision and increasing screening burden without improving coverage. The final search strings were developed iteratively and validated by confirming that known, relevant studies were still captured when the search was restricted to title and abstract. For Google Scholar, given its limited functionality with long search strings and lack of abstract-level search option, keywords were searched in paired combinations (e.g. burnout AND 'fun at work', 'work engagement' AND 'fun at work') and results were manually screened for duplicates from other databases. Additionally, manual scoping/screening of the lists of references from key reviews and included studies. Our eligibility criteria were the following: (i) published peer-reviewed studies of quantitative design, (ii) studies that included a measure of fun at work and at least a measure of work engagement and/or a measure of job burnout, (iv) studies that examined employed individuals (working populations) and (v) were published in English with (vi) full-text availability. Where statistics for the meta-analysis were not provided in the manuscript or the full text could not be retrieved otherwise, authors were contacted twice to obtain this information. Exclusion criteria stated that the following would be excluded: qualitative articles, research articles and papers that are not written in the English language, review articles, conference presentations/posters, doctoral dissertations.

The combined initial and updated search of databases yielded 325 results. The data retrieved from each database was logged in Rayyan where duplicate control was conducted, resulting in 287 citations

to screen. Two reviewers independently screened all identified abstracts with a substantial agreement (Cohen's $k=0.78$). Eighty papers were retrieved for full-text screening. Disagreements were resolved by examining each paper separately against the inclusion criteria. Not relevant outcome was the most common reason for exclusion at the full-text screening stage (Figure 1, PRISMA flow diagram).

3.2. Quality assessment

Quality assessment was conducted using the Quality Assessment Tool for Observational Cohort and Cross-Sectional Studies (Feng et al., 2014). The tool contains 14 criteria, with items addressing key aspects of longitudinal research such as temporality, repeated exposure assessment, and attrition. The evaluator is asked to answer whether the study in question meets the criterion, with the possible answers being 'Yes, No, Cannot Determine, Not applicable, and Not Reported'. A score of ≥ 11

corresponds to good quality, 7–10 to fair quality, and <7 to poor quality. One reviewer conducted a quality assessment on all included studies. A second reviewer independently assessed 20% of the sample, and interrater reliability was high (Cohen's Kappa = 0.92).

3.2.1. Data extraction and coding for meta-analysis

The coding of studies was largely based on the aspect of FaW measured. Specifically, studies measuring playful work design were coded separately as 'playful work design', whereas studies using measures asking participants to report on their views on FaW were coded as 'attitudes towards FaW'; studies using measures that asked participants to rate the presence of fun activities in the organization were coded as 'fun activities'; measures 'socializing with co-workers' and 'manager's support for fun' also emerged from the studies used.

Due to the limited number of studies, it was not possible to code each dimension of work

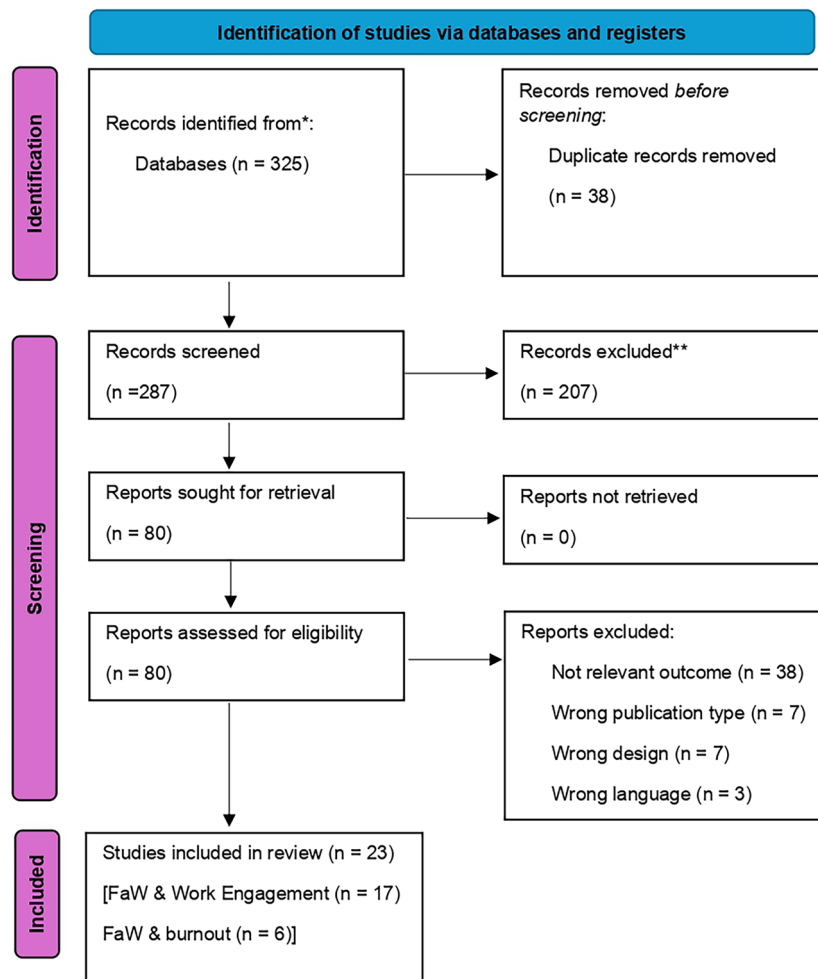


Figure 1. PRISMA flow diagram.

engagement separately. Thus, correlation coefficients were coded as 'work engagement' variables whether studies were reporting on only one dimension (e.g. vigor) or work engagement as a latent variable. Regarding burnout, as five of the six included studies measured only emotional exhaustion, burnout was coded as 'emotional exhaustion' for the meta-analysis. Two authors (OL and ET) independently coded 10% of the included studies with an acceptable agreement rate (91.2%) and the remainder was coded by one reviewer (OL).

3.3. Data synthesis

3.3.1. Meta-analysis

A meta-analysis was conducted using the Comprehensive Meta-Analysis software (version 3) (CMA; Borenstein et al., 2021; Lipsey, 2001). Specifically, the CMA software uses Fisher's Z-transformation to weight the correlation coefficients by the reciprocal quantity of the error variance and decrease the bias further. We adopted a random-effects meta-analysis model and a weighted correlation coefficient (ρ) with 95% confidence intervals (95% CI) was used as an overall synthesized measure of effect size. For studies reporting more than one relevant correlation coefficient for the same sample, a weighted correlation coefficient was calculated whereas in studies reporting effect sizes from independent samples, each sample was included as a separate study. Forest plots were constructed to visually represent the mean effect sizes. The Q within-statistic was used to assess the heterogeneity of studies which tests the null hypothesis that all studies in an analysis share a common effect size (Borenstein et al., 2010). Following the recent proposition by Borenstein (2022) that the I^2 statistic is not a quantifier of heterogeneity, this statistic was not reported.

Subgroup analyses using mixed-effects analysis were part of the registered protocol, however, these were not performed due to the limited number of available studies for both work engagement and burnout. This is because as a rule of thumb, subgroup analyses can be probed where either a minimum number of 10 studies-per-group are available (Higgins et al., 2023) or a minimum of 20 studies in total (Belias et al., 2019). A series of meta-regression analyses were conducted only for the relationship between FaW (rule of thumb, $\geq k=10$ to probe meta regressions) testing the following continuous moderators: journal impact factor, publication year, % female participants, and mean age. In terms of categorical moderators, three were tested in the

meta-regressions after being dummy coded: Western/westernized versus non-Western/westernized countries, samples with $> 55\%$ versus samples with $< 55\%$ female participants, and type of design (cross-sectional versus longitudinal).

Three indicators of publication bias were examined: standard error funnel plots for observed only and imputed studies, Duval and Tweedie's trim and fill procedure, and Egger's regression intercept (Duval & Tweedie, 2000; Egger et al., 1997; Lipsey, 2001; Sedgwick, 2013). As Rosenthal's method has been criticized that it fails to account for the bias in the 'file drawer' of unpublished studies, and thus can give misleading results (Scargle, 1999), we also calculated Orwin's fail-safe N .

3.3.2. Narrative synthesis

The heterogeneity in measures and types of FaW encountered in the studies included in the meta-analysis highlighted the complexity and multifaceted nature of the literature. To supplement the meta-analytic findings, we proceeded to a narrative synthesis.² using constant comparative analysis (Olson et al., 2016). We first examined the scales used in the reviewed studies. In a process of constant comparison, extracted data on measures were compared item by item so that similar data were categorized and grouped inductively, and these categories were then compared to further the analysis and synthesis based on the following criteria: a) theoretical definition of FaW, b) operationalization of FaW in the specific scale, particularly whether the measures focused on organizational-driven fun or employee-driven fun. c) what specific aspects of FaW the measures are capturing (e.g. fun activities, manager jokes, use of personal music, etc.). A constant comparative analysis approach has been previously used in organizational behaviour reviews (e.g. Lainidi et al., 2023). Each study was independently analyzed and coded by ET in conjunction with one other independent reviewer (OL, AM). The coding process was reviewed until agreement was reached regarding the most meaningful criteria and categories of analysis emerging from the process.

4. Results

4.1. Descriptives

A total of 22 studies (21 papers) were included in this review ($N=6607$) and as one study reported coefficients for both the relationships between burnout and FaW and work engagement and FAW, we

have 23 coefficients from 22 unique samples; 17 of these studies reported on the relationship between FaW and WE and 6 studies reported on the relationship between FaW and burnout. (Supplemental Material B; Table with studies included in the review).

4.1.1. Quality assessment

Of the 22 studies included in the current review, one was rated as good (4.35%), 13 as fair (56.52%), and eight studies (39.13%) were rated as having poor quality.

4.2. Fun at work and work engagement

Across the 17 studies reporting on FaW and WE, the number of participants was 4871 ($n_{WE} = 4871$; 56.4% women). Of the total sample, 40.3% ($n=1961$) of the participants were employees in the Hospitality/Service industry, 19.07% ($n=929$) in Business and Finance, and 18.87% ($n=919$) in undefined/unknown organizations; the rest of the participants worked in the following sectors: Sales/Trade, Manufacturing, Education, Health Care, and Transport and Government employees. The age range of the participants ranged from 18 to 63 years old. The sample sizes of the included studies ranged from 88 to 501 with 76.47% of studies including a sample over of 200 participants.

In terms of the country where the studies were conducted, 28.5% ($k=6$) of the studies were conducted in the Netherlands, 19% ($k=4$) in the USA, 9.5% ($k=2$) in India, 9.5% ($k=2$) in Taiwan, and 9.5% ($k=2$) in China; the following countries were represented each at 4.8% ($k=1$): Hong Kong, Israel, Greece, Ghana, and South Korea. The identified studies were published between 2014 and 2023, with 41.2% of the included studies having been published in 2022.

Fun at work was measured in the following ways: 10.71% ($k=3$) of studies used the short version of the Daily Playful Work Design scale (DPWD-12S; Scharp et al., 2019, 2021), 10.71% ($k=3$) used the short version of the Playful Work Design scale (PWD-12S; Scharp et al., 2019), 10.71% ($k=3$) used the Level of Fun Experienced at Work, 5-S (Karl et al., 2007; Karl & Peluchette, 2006), 10.71% ($k=3$) used Workplace Fun, 14-S (Tews et al., 2014), 7.14% ($k=2$) used Attitudes Toward Fun, 17-S (Karl & Harland, 2005; Aldag & Sherony, 2001), and single studies (3.57%) used the following measures; the PWD-10S (Scharp et al., 2019), the Manager Support for Fun scale 5-S (Tews et al., 2014), the 5-S Fun Activities scale (Tews et al., 2014), the 12-S Fun Activities scale,

12-S (Karl et al., 2005; Ford et al., 2003), the 6-S Workplace Humour scale (Scheel et al., 2016), the 17-S Workplace Fun Scale (Tsaur et al., 2019), the 20-s Workplace Fun scale (Karl et al., 2007; McDowell, 2004), the 24-S Fun at Work scale (McDowell, 2004), the 14-S Fun at Workplace (Becker & Tews, 2016; Karl et al., 2005), the 16-S Playfulness Scale for Adults (PSA; Shaefer & Greenberg, 1997), the 10-S Fun Leadership scale (Lee & Chae, 2008), the 16-S Attitudes Toward Fun scale (Karl et al., 2005), the 6-S Play-in-Work Measurement (Abramis, 1990), the 8S Workplace Fun scale (McDowell, 2004), and the 5-S Workplace Fun (Chan & Mak, 2016; Karl et al., 2005).

Regarding work engagement, the Utrecht Work Engagement Scale (UWES) and its variations were used in 88.20% ($n=15$) of the included studies, the UWES-9S, (Schaufeli et al., 2006), 58.80% ($n=10$) the UWES-17S, (Schaufeli et al., 2002), 11.76% ($n=2$) and the 5.9% ($n=1$) the UWES-3 (Schaufeli et al., 2006). Other measures used for WE were the Job Engagement Scale-18S, (Rich et al., 2010), and one questionnaire developed as an ad hoc measure of work engagement. Concerning the design of the studies, 71.4% ($n=15$) were cross-sectional, 14.3% ($n=3$) were longitudinal, 9.5% ($n=2$) were diary studies, and 4.8% ($n=1$) utilized a cross-lagged design.

4.3. Fun at work and burnout

Regarding the studies that examined the relationship between FaW and job burnout, the total sample of participants, in the 6 studies included, was 1736 ($N=1736$, 62.96% female, 37.04% male). Of the total sample, 21.95% ($n=381$) were employees working in Health Care, 5.76% ($n=100$) in the Transport industry, 2.82% ($n=49$) in Education, 28.86% ($n=501$) in Business and Finance, and 40.61% ($n=705$) were employees of unknown Organizations. The age range of the participants was 20–59 years. The sample sizes of the included studies ranged from 142 to 501, with 66.67% of the studies including a sample of over 200 participants.

Regarding the country where the studies were conducted, 33.33% ($n=2$) were conducted in the United States of America, 33.33% ($n=2$) were conducted in the Netherlands, 16.66% ($n=1$) in Korea, and 16.66% ($n=1$) in Taiwan. Concerning the publication years, 16.66% ($n=1$) were published during each of the years 2006, 2007, 2011, and 2022, and 33.33% ($n=2$) were published in 2021. Fun at work was measured with ad hoc questionnaires developed by the researchers in ($k=3$) 50% of the six studies, and the

following were used in one study each: PSA, PAW-6, PWD-12. Regarding burnout, the Emotional Exhaustion 6-item Scale (Barnett et al., 1999) was used in 33.33% ($k=2$) of the studies; 16.66% ($k=1$) used the MBI-5, (adapted from Maslach et al., 1997), one the Oldenberg Burnout Inventory (OLBI), (Demerouti et al., 2010), one the Utrecht Burnout Scale (UBS-5), (Schaufeli et al., 1996), and one the Experienced Burnout 21-item scale, (Pines & Aronson, 1988). Concerning the design of the studies, 83.33% ($n=5$) were cross-sectional, and only 1 (16.66%) utilized a longitudinal design.

4.4. Meta-analysis

4.4.1. Omnibus analysis

The overall effect size between FaW and work engagement was moderate and positive ($\rho = .40$, 95% CI [.33; .47], $k=17$, $N=4871$), suggesting an overlap between greater fun at work and work engagement. Examining the different types of fun at work separately, a small to moderate effect positive size was found between playful work design and work engagement ($\rho = .35$, 95% CI [.27; .43], $k=7$, $N=2383$), which was of similar strength for the two components of playful work design, Designing Competition ($\rho = .38$, 95% CI [.29; .42], $k=7$, $N=2383$) and Designing Fun ($\rho = .35$, 95% CI [.23; .45], $k=7$, $N=2383$). The employee reported the presence of Fun Activities at work was also positively associated with more work engagement ($\rho = .31$, 95% CI [.15; .46], $k=7$, $N=1989$), as did greater manager's support for fun ($\rho = .37$, 95% CI [.23; .45], $k=3$, $N=1040$). The relationship between socializing with coworkers and work engagement was non-significant ($\rho = .41$, 95% CI [-.01; .79], $k=7$, $N=1299$) (see Supplemental Material C1 and C2 for a summary and Forest Plots).

The overall effect size between FaW and emotional exhaustion was small and negative ($\rho = -.20$, 95% CI [-.28; -.11], $k=6$, $N=1736$), suggesting that greater FaW is associated with lower levels of emotional exhaustion. Examining the different types of FaW separately, a marginally significant small negative effect was found between playful work design and emotional exhaustion ($\rho = -.10$, 95% CI [-.19; -.002], $k=2$, $N=803$); for the two components of playful work design, the effect was marginally significant for Designing Competition ($\rho = -.07$, 95% CI [-.14; -.001], $k=2$, $N=803$) and non-significant for Designing Fun ($\rho = -.11$, 95% CI [-.29; .08], $k=2$, $N=803$). More positive attitudes towards FaW were associated with less emotional exhaustion ($\rho = -.26$, 95% CI [-.35; -.16], $k=2$, $N=575$) and the strongest

association was recorded between higher levels of manager's support for fun and less emotional exhaustion ($\rho = -.33$, 95% CI [-.45; -.20], $k=1$, $N=207$) (see Supplemental Material C1 and C2 for a summary and Forest Plots).

4.4.2. Meta-regressions

Given the limited number of studies on emotional exhaustion/burnout, meta-regressions were only examined for the relationship between FaW and work engagement. The following moderators were examined: Western/westernized versus non/Western/westernized countries, journal impact factor, publication year, design, mean age of participants, percentage of female participants (continuous), and samples with > 55% female participants versus studies with < 55% female participants. Significant effects were identified for region, with stronger effect sizes for non-Western/westernized countries compared to Western/westernized countries ($\beta = -0.20$, 95% CI [-0.34; -0.06], $k=17$) and marginally for gender, with effect sizes stronger in samples with a higher proportion of male participants ($\beta = -0.006$, 95% CI [-0.012; -0.001], $k=17$) as well as in samples with < 55% female participants ($\beta = -0.18$, 95% CI [-0.34; -0.014], $k=17$) (see Supplemental Material C3 for a summary).

4.4.3. Publication bias

Egger's regression intercept was not statistically significant for the relationship between FaW and work engagement ($p = .16$, two-tailed), suggesting no presence of publication bias. Egger's regression intercept was also non-significant for the FaW and emotional exhaustion relationship ($p = .24$, two-tailed). We also calculated Orwin's fail-safe N , which was equal to 6 for the relationship between FaW and emotional exhaustion and 53 for the FaW – work engagement relationship (using -0.10 and 0.10 as a criterion for a trivial correlation respectively).

The standard error funnel plots for the observed studies indicated a no asymmetry which can also be explained by the limited number of studies. Duval and Tweedie's Trim and Fill method suggested that there was one study missing on the right side of the funnel plot for FaW and emotional exhaustion and zero studies missing on either side of the funnel plot for FaW and work engagement using the random effects model. The adjusted standard error funnel plots with observed and imputed studies showed almost no difference from the unadjusted funnel plots (Supplemental Material D; Funnel Plots).

4.5. Narrative synthesis

The diverse data and varied measurement methodologies in our meta-analysis highlighted the need for a deeper examination through a narrative synthesis. By employing a qualitative inductive coding approach on the items of the measurements used, we delineated the multidimensional aspects of FaW and assessed construct validity across all studies included. This process aimed to refine and reconceptualize the construct of FaW in terms of a) the purpose of measurements used for FaW and b) the sources of FaW within the organizational context. This reconceptualization provides a clearer framework for future research and practice.

4.5.1. Measuring FaW

The reviewed studies included a wide range of measures assessing different aspects of FaW. The constant comparative analysis of the scale items used across the studies included in this review resulted in a first based on whether the measures reflected: a) the employees' perceptions and psychological experiences related to FaW (e.g. 'my office is a fun place to work'), b) the presence of fun activities at work (e.g. parties, a celebration of achievement), and c) employees' individual initiatives for FaW (e.g. 'I look for ways to make tasks more fun for everyone involved'). Only three studies measured all three (i.e. perception, existence, and individual initiatives). Individual Initiatives was the most commonly measured construct, assessed in eight studies. Perception of FaW was measured in seven studies, either alone or alongside other constructs. Existence of FaW was measured in six studies, but rarely on its own—often paired with other constructs. Very few studies captured multiple dimensions of FaW using distinct tools or combined approaches. Internal reliability coefficients (Cronbach's alpha) ranged from .67 to .95, (Supplemental Material E).

In the 'perceptions of FaW' category, a wide range of scales were used to assess employees' subjective experiences and attitudes towards FaW. These included items such as 'This is a fun place to work', 'My supervisor seems to recognize the need for fun at work', and 'My work is like play'. Several instruments were adapted from or synthesized using prior validated scales (e.g. Karl et al., 2007; McDowell, 2004) and qualitative studies (e.g. Chan, 2010; Strömberg & Karlsson, 2009; Georganta & Montgomery, 2019). Overall, this category reflects a strong emphasis on how employees perceive and interpret the presence of FaW. In the 'existence of

FaW' category, the focus was on identifying whether fun-related structures and events are formally present in the organization. These included items such as 'My managers try to make my work fun', 'My employer organizes public celebrations of work achievements', and 'Organization provides refreshments'. In the last category, the 'individual initiatives for FaW', the focus is on whether/how employees themselves create or bring fun into their work roles, independent of any formal structures. Measures captured self-driven actions such as 'I look for ways to make my work more fun', 'I enjoy making my colleagues laugh', and 'I play around at work'. Instruments like the Playful Work Design (PWD) scale and the Playfulness Scale for Adults (PSA) were commonly used to assess this domain (Supplemental Material F; Fun at Work Measures Classifications). It is important to highlight that 'Manager Support for Fun' and 'Socializing with coworkers', can be classified under two categories: under perceptions of fun and the existence of Fun, and under the existence of fun and individual initiatives, respectively. For example, while the item 'socializing with coworkers in work' could reflect the experience of the employee in relation to fun, it could also indicate the effort they make as an individual initiative to have fun at work. The same for 'Manager Support for Fun: 'My supervisor seems to recognize the need for fun at work', could reflect how it is perceived by the employee, but also if there is the existence of organization fun which drives the actions of managers.

4.5.2. Sources of FaW: a new conceptual framework

The comparative analysis of the measures used in the reviewed studies revealed a fragmented approach to measuring FaW, indicative of a lack of consensus on how fun at work is defined and conceptualized. The challenge was to go beyond the limitations presented by the measurement of FaW. Recognizing that measures already assess whether the workplace enables fun, whether fun activities happen, and whether tasks can be fun does not necessarily answer the fundamental question of who/what is driving the fun in the workplace. The narrative review provided the opportunity to design a new conceptual approach that delineated two distinct bidirectional categories of FaW; Organization-Driven Fun (ODF) and Employee-Driven Fun (EDF). These new categories provide a more comprehensive definition than the older managed fun/organic fun categories. The new categories reflect the fact that organizations can

manage fun in both informal and formal ways, thus a broader conceptualization is needed. Equally, managed fun can mutate into organic fun over time, and thus the distinction between managed/organic fun is unsatisfactory. Our new framework more clearly locates the source of FaW. This new framework is outlined in Figure 2, and examples are available in Supplemental Material G. This approach maps onto three specific propositions that can inform future research.

ODF refers to events initiated by the organization, such as formal activities, public celebrations of work achievements, social events, recognition of personal milestones, team-building activities, wellness, and manager support for fun. ODF dives into the collective experience, and practices initiated by the organization, focusing on the broader context, how fun is cultivated through shared experiences, established organizational practices, and the work environment at large. ODF integrates previous work on managed fun but provides a wider umbrella for the cultural phenomenon of fun in the workplace, seeing it as a whole-organization aspect of culture rather than just led by the management. On the other hand, EDF refers to activities that employees themselves initiate, organically to have more fun, such as co-worker socializing, informal and spontaneous fun, humor, gossip, and fun customer interaction. EDF primarily focuses on personal initiative and centres on individual actions and personal efforts to create fun, emphasizing the role of personal agency. EDF represents a more refined conceptualization of organic fun in that it enables a clearer link between employee individual differences (e.g. personality traits) and autonomy in the workplace. Fun driven by the organization and

fun initiated by employees can be seen as interacting elements that exist along a continuum. Congruently, there will be situations where the initial ODF will be replaced by EDF, and conversely, situations where employee-initiated fun (EDF) is adapted by the organization and evolves into a more formal EDF over the long term. Understanding organizational culture directly via climate or culture surveys can be limiting, while indirect approaches examining who (and what) drives the fun at work can provide significant new information about the culture of an organization. Thus:

Proposition 1. *Understanding FaW needs to distinguish between ODF and EDF*

The two main categories, ODF and EDF, are connected by two pathways, which are personality and autonomy. The mediational roles of personality and autonomy are based on previous research. In terms of autonomy, when activities are initiated by workers/peers, workers' participation is more likely to be influenced by intrinsic motivation (characterized by control and autonomy; Ryan & Deci, 2000a, 2000b). Thus, employees increase their feelings of autonomy through fun activities. Conversely, threats to autonomy can lead to resistance in the workplace and deviance (Lawrence & Robinson, 2007; Louw et al., 2016), we can expect extrinsic motivation to be influential when activities are organizationally mandated. In terms of personality, there is evidence that employees with fun-focused traits (e.g. humour, playfulness, and creative personality) tend to design their work activities to be more fun (Scharp et al., 2019). Meta-analytic evidence (Zell & Lesick, 2022) has shown that conscientiousness is one of the most

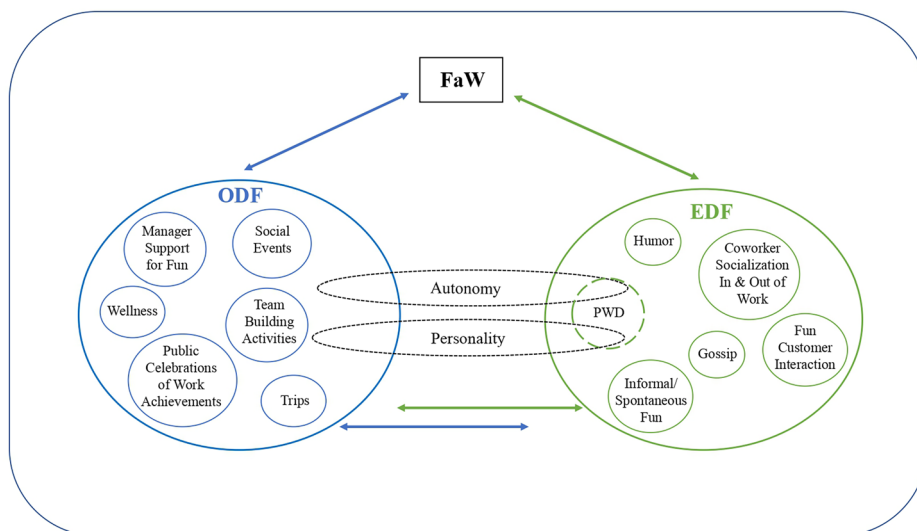


Figure 2. FaW conceptual framework of ODF and EDF.

important predictors of job performance, while personality traits account for 50% of the variance in work engagement (Young et al., 2018). Conscientiousness has a moderating effect on the relationship between PWD and performance (Dishon-Berkovits et al., 2024). Examining the mediational role of personality variables between FaW and various work dimensions is warranted. These pathways do not follow a straightforward, linear relationship but rather exhibit a more dynamic, multidirectional interaction. Personality refers to the individual differences, that affect how employees perceive and engage with FaW, influencing both ODF and EDF. Autonomy plays a crucial role for both ODF and EDF; for ODF to enable choice of participation in organized fun activities, and for EDF, to provide the 'freedom' to exist in the workplace. The EDF umbrella includes playful work design (PWD), humour, Socializing, Gossip, and informal interactions with colleagues and customers. For example, PWD focuses on employee initiatives to infuse fun into work and is often dependent on aspects of one's personality (McManus & Furnham, 2010; Karl et al., 2007). Self or peer-directed PWD can be work-embedded (e.g. turning work into a game) or diversionary (e.g. 'messing around') (Celestine & Yeo, 2021). EDF involves activities initiated by employees, including informal fun, humour, gossip, fun customer interactions, and co-worker socializing. These activities are influenced by individual personality traits, with personality playing a mediating role in creating a playful work design (McManus & Furnham, 2010; Karl et al., 2007). Playful Work Design (PWD) represents employees' efforts to make work enjoyable through personal initiative, independent of organizational mandates. The ODF umbrella includes management support for fun, formal social events, team building activities, social trips, and public celebrations. ODF includes initiatives by the organization such as team-building activities, social events, wellness programs, manager support for fun, public celebrations of work achievements, and contests. These activities are facilitated by organizational autonomy, which not only mediates the relationship between the organization's efforts and employee engagement in fun activities but also can create an environment enabling Playful Work design (PWD). Autonomy allows employees to participate freely in these initiatives, enhancing job satisfaction and reducing burnout (Bakker et al., 2005). Thus:

Proposition 2. *Autonomy and personality are key pathways for both ODF and EDF, to succeed.*

As highlighted in the conceptual model, the source of fun at work significantly influences its

reception and sustainability, thereby impacting company culture (Michel et al., 2019; Tang et al., 2017). EDF, which emerges organically from the interactions and interests of the employees, often signifies a robust, positive company culture where employees feel comfortable and encouraged to be authentic (Clancy & Linehan, 2019; Plester & Hutchison, 2016). This type of fun is usually perceived as more genuine and can enhance engagement and job satisfaction (Tews et al., 2015), reflecting and reinforcing an open and creative work environment. On the other hand, ODF, strategically planned and implemented by leadership or HR departments, aims to achieve specific outcomes like improved team cohesion or stress reduction and positive feelings (Michel et al., 2019). Although well-intentioned, these initiatives can sometimes feel forced or inauthentic, potentially reducing their effectiveness or even fostering cynicism among employees (Müceldili & Erdil, 2016; Plester & Hutchison, 2016; Plester et al., 2015). Employees can find ODF activities distracting, tiresome, and unpleasant, especially if they have a low preference for socializing. If employees perceive a threat to their autonomy, deviance in the form of expressive motivations (i.e. 'letting off steam') is expressed (Louw et al., 2016). Moreover, while such structured activities can help shape or shift organizational culture by emphasizing values such as teamwork, innovation, or wellness (Tews et al., 2012), their success heavily depends on how well they resonate with employees' values and needs (Karl et al., 2007). These structured activities can positively influence organizational culture, but they also require continuous effort and feedback mechanisms to remain relevant and effective (Tews & Tracey, 2009). However, these initiatives can sometimes feel forced or inauthentic, particularly if they do not align well with employees' preferences, potentially leading to reduced effectiveness or even cynicism. Additionally, the perception and adoption of these activities can be influenced by factors such as gender, culture, and age, highlighting the need to complement EDF and ODF approaches to their implementation. Thus:

Proposition 3. *The synergy of Organization-driven fun and Employee-driven fun can maximize the benefits of FaW.*

5. Discussion

This systematic review and meta-analysis provide actionable insights and evidence-based recommendations regarding the relationship between FaW with both work engagement and job burnout. To our

knowledge, this is the first systematic review examining the relationships between FaW, Work Engagement, and Burnout. The results of the meta-analysis showed a substantial overlap between Work Engagement and FaW and a smaller overlap between emotional exhaustion and FaW, whereas meta regression analyses identified that the region where the study was conducted as well as the proportion of women in the sample are significant factors influencing the relationship between FaW and Work Engagement. Specifically, studies conducted in WEIRD countries, and studies with higher percentages of women, showed lower effect sizes. To supplement the meta-analytic evidence, a narrative synthesis generated a new conceptual framework for FaW (see [Figure 2](#)). The results of the meta-analysis and narrative review are discussed in detail below.

5.1. Meta-analysis overview

Overall, the meta-analysis indicates that FaW is more closely aligned with work engagement compared to job burnout. Several other important points were identified. For work engagement, gender (man/woman), and culture (WEIRD/Non-WEIRD countries) are all seen to influence the results in different ways. In terms of gender, studies with higher percentages of women show a lower positive correlation between work engagement (WE) and fun at work (FaW), suggesting a significant role of gender in this relationship. Moreover, comparing countries, non-WEIRD countries show stronger positive correlations than WEIRD countries, highlighting the importance of cultural factors in enhancing work engagement through fun at work.

The consistently positive correlations observed in the majority of research for FaW and Work Engagement raised two important issues: a) the potential sample bias, as it raises the concern whether employees who feel engaged are more likely to participate in such studies compared to those who are burnt-out, potentially skewing the results (Fluegge-Woolf, 2014; Chan, 2019; Bakker & van Wingerden, 2021; Jyoti & Dimple, 2022); and b) the argument from some scholars that fun at work might be inherently part of work engagement rather than a separate construct, functioning as a job resource (Bakker & Demerouti, 2017; Georganta & Montgomery, 2016).

5.2. A new conceptual framework for FaW

Beyond categorizing the measurement tools used for FaW, the narrative review facilitated the development

of a new conceptual framework of the sources of FaW deriving from the qualitative analysis of items of each FaW measurement used in our meta-analysis. This analysis led to the formation of a taxonomy categorizing the sources of FaW into two primary types: ODF and EDF. Establishing a consensus and framework around these two aspects, is essential to effectively discuss evidence-based associations and impacts with important work-related variables, such as work engagement and burnout. Our conceptual approach acknowledges that fun at work is not a one-size-fits-all concept but varies greatly depending on organizational culture, individual personalities, and the interplay between the two. An important question is not only what is fun but also what is not fun at work.

The differentiation of FaW into ODF and EDF enables researchers a) to detect and measure fun that is derived by organizational initiatives b) identify and measure FaW derived from employee initiatives c) have a feedback loop where b is fuelling a, resulting in more meaningful practices that enhance FaW and make it authentically fun and enjoyable for the ultimate recipients-the employees. This highlights the need for a more tailored approach to HRM initiatives. Recognizing that different occupational groups have varying needs, FaW practices should be personalized to suit specific professional settings, whether for office workers, construction and factory workers, or healthcare professionals. The diversity of professions demands a corresponding diversity in FaW initiatives.

This enhanced clarity is invaluable for formulating specific HRM interventions aimed at optimizing workplace well-being, demonstrating the indispensable role FaW plays within the broader objectives of enhancing employee engagement and mitigating the risks of burnout. Empirical evidence suggests that allowing employees to personalize their workspaces and encouraging informal social interactions can significantly enhance their sense of fun and well-being, which in turn can reduce burnout levels (Lee et al., 2021; Jyoti & Dimple, 2022). This connection also highlights a key aspect: autonomy. Research consistently shows that autonomy in the workplace is crucial for mitigating burnout (Xanthopoulou et al., 2007; Ng & Feldman, 2015; O'Connor et al., 2018).

5.3. FaW and the JD-R theory

The role of autonomy/personality in the new conceptual framework is consistent with the most recent developments of the JD-R model which gives prominence to personality, which is proposed to moderate

the daily effects of job demands and resources on well-being and outcomes (Bakker et al., 2023). For example, extraverted individuals may flourish most on the days on which they have access to many social job resources (e.g. FaW) because they have the strongest need for relatedness and social exchange. In the latest developments of the JD-R theory (Bakker et al., 2023) Playful work design (Scharp et al., 2022) is considered a new proactive work behaviour; 'self-initiated, anticipatory action aimed at changing either the situation or oneself' (Bindl & Parker, 2011, p. 567), aimed at satisfying the basic need for autonomy. The evidence to support its inclusion is linked to the part of designing work to be more fun, fulfilling the employees' fundamental need for relatedness, and similarly, the part of designing their work to be more competitive, and satisfying their basic need for competence. Additionally, both dimensions of playful work design also met the basic need for autonomy (Scharp et al., 2023). Interestingly, Scharp et al. (2021) found that when employees designed fun on days when there were social or emotional challenges present (communication hindrance demands), and when they designed competition on days when tasks were repetitive or uninteresting (agency hindrance demands), their levels of performance and work engagement were not negatively affected. Lesener et al. (2020) identified 55 longitudinal studies (including 57 samples) examining the impact of various job resources on work engagement and found that autonomy/job control was the most studied resource at the organizational level. According to the boost hypothesis of the JD-R theory, job resources may alter the perceptions and cognitions evoked by job demands, which may moderate responses that follow the appraisal process, or may reduce the health-damaging consequences of such responses (Bakker et al., 2005). FaW represents an instrumental job resource within the JD-R framework. Moreover, the distinction between ODF and EDF has the potential to contribute to research on hindrance demands and challenging demands. Good fun should be challenging and enhance well-being, while mandated fun has the potential to hinder authentic engagement and increase burnout and anxiety.

6. Theoretical contributions and research implications

The conceptual framework delineating ODF and EDF within the broader discourse of FaW has significant implications for the field of organizational behaviour and human resource management. By categorizing

fun initiatives into those driven by the organization and those initiated by employees, the framework advances our understanding of how fun can be strategically integrated into the workplace to enhance employee well-being, engagement, and productivity (Celestine & Yeo, 2021). This differentiation can also add depth to the literature by highlighting various dynamics, impacts, and considerations that affect the overall effectiveness and reception of fun at work. Social interaction and bonding emerge as not only outcomes but central aspects of both ODF and EDF, contributing significantly to the overall experience of Fun at Work (FaW) (Fredrickson, 2001; Bakker & Leiter, 2010). In terms of productivity and performance, FaW has been identified as a key component of knowledge sharing in an organisation (Pereira & Mohiya, 2021). Knowledge-sharing processes are linked with psychological safety that both foster and enable team creative performance (Kessel et al., 2012).

This framework underscores the importance of future research toward balanced approaches to cultivating fun at work, integrating both organizational support and personal agency. This integration reflects a more bottom-up approach, acknowledging employee agency as a crucial factor in shaping workplace culture (Welzel & Inglehart, 2010). Extending this idea to job design theories, fun emerges as a critical component that could significantly increase job satisfaction and intrinsic motivation (Bakker et al., 2012; Tims et al., 2012). This suggests that fun should be considered alongside traditional motivational factors like task variety, autonomy, and feedback (Scharp et al., 2022; Bakker et al., 2020b). Furthermore, this new framework broadens the scope of organizational commitment theory by providing a fresh lens through which to view affective commitment; engaging in fun activities can strengthen employees' emotional attachment to the organization (Ugheoke et al., 2022). Additionally, leadership theories incorporating transformational, charismatic elements, and servant leadership elements can also be expanded to include the facilitation of fun. Servant leadership, characterized by a focus on serving and supporting colleagues with compassion and necessary resources, aligns closely with promoting FaW. Leaders who adopt a servant leadership style empower employees to thrive, fostering trust, creativity, and stronger relational ties within teams (Jaiswal & Dhar, 2017). Leaders who actively promote or endorse fun activities can enhance their influence and improve relational ties within their teams, offering a novel perspective on leadership effectiveness and team dynamics (Chan, 2019).

7. Practical implications

The findings of this study have important practical implications for organizations seeking to leverage the use of FaW. First, by categorizing fun initiatives into those driven by the organization and those initiated by employees, as a management strategy this framework can advance the knowledge of organizations on what approaches represent best practices for them. Categorizing fun initiatives into ODF and EDF helps HRMs identify which practices best suit their workforce. For example, this framework can be used to decide when to organize company-wide events versus supporting spontaneous, employee-led activities.

First, it is crucial to ensure that employees- the primary beneficiaries- have a voice in planning fun activities. HR can implement regular feedback loops, such as surveys or focus groups, to tailor activities to employee preferences, enhancing their relevance and effectiveness. Co-production research supports this approach, showing that involving employees in the decision-making process leads to higher satisfaction and better outcomes (Voorberg et al., 2015).

Second, and in addition, for feedback loops to work, the existence of psychological safety, is crucial to enable honest meaningful conversations. Research has shown that psychological safety is a critical factor in enhancing team dynamics and overall organizational effectiveness (Edmondson, 1999). To successfully integrate fun into the workplace, HRM must cultivate an environment of psychological safety, where employees feel secure in expressing their ideas and feedback without fear of negative consequences. This can be achieved by establishing clear communication channels, such as regular anonymous surveys or dedicated employee committees focused on workplace culture. Creating such a climate encourages openness and honesty, which are essential for the successful implementation of fun activities.

Third, this review categorized the measurement tools for FaW into three broad categories: employees' perceptions and psychological experiences, the presence of fun activities, and individual initiatives for fun. HRM practitioners can leverage these insights to select the most appropriate tools based on their specific objectives. This differentiation enables more precise measurement and application of FaW strategies, enhancing overall workplace well-being (Table 1).

8. Future research

Several opportunities for future research have emerged from our study. First, there is a need to

develop and validate new measurement scales that distinctly capture the perception, existence, and individual initiatives of FaW in alignment with specific organizational goals. For instance, organizations focused on enhancing employee engagement could benefit from a scale designed to measure the perceived authenticity of fun activities. Such tailored tools would enable researchers to quantitatively assess the effectiveness of fun initiatives, leading to more precise evaluations of their impact on work-related outcomes, including engagement and burnout. By creating reliable and valid measurement instruments, future research can provide deeper insights into the role of fun in the workplace, ultimately helping to optimize its contribution to organizational success.

Second, the majority of previous research on FaW and the measures were developed for the non-digital era. With the rise of remote and hybrid work arrangements, investigating how FaW can be effectively implemented and its effects in these settings becomes crucial. This research area could address challenges and opportunities for fostering a fun work environment outside the traditional office space.

Third, there is a need to better understand the dynamic interactions between different sources of FaW and how they influence one another. For instance, how ODF might enable or inhibit EDF, and vice versa, remains underexplored, and warrants further exploration.

Fourth, it is essential to examine the relationship between these sources of fun in the workplace and key work well-being factors such as work engagement, burnout, and autonomy. For instance, future

Table 1. Implications for practice and research.

Practical implications	
Categorization of fun initiatives	Categorizing fun initiatives into Organization-driven and Employee-driven helps HRMs identify which practices best suit their workforce.
Employee involvement in planning fun	Ensuring that employees have a voice in planning fun activities by implementing regular feedback loops.
Cultivate a psychological safe climate	For feedback loops to work, the existence of psychological safety is crucial to enable honest meaningful conversations.
Research implications	
FaW in remote and hybrid work Settings	Address challenges and opportunities for fostering a fun work environment outside the traditional office space.
Gender differences in FaW	Examine potential gender differences in how FaW is perceived and its effects on work engagement and burnout, as well as their underlying factors.
Playful work design (PWD) and Autonomy	Explore how PWD is linked with autonomy in different occupational groups, such as office workers versus healthcare providers, to address their unique needs.

studies should explore how EDF and ODF interact to either enhance or diminish work engagement, mitigate burnout, or impact the sense of autonomy. These complex relationships need to be disentangled to provide a clearer understanding of how fun at work contributes to overall employee well-being. Additionally, imposed FaW approaches run the risk of negatively impacting the well-being of staff. FaW is likely to be attractive as a way to influence motivation and performance, but researchers need to investigate whether it comes to be viewed as an extra burden rather than a respite.

Fifth, an important area is to investigate potential gender differences in the perceptions and impacts of FaW on work engagement and burnout. Future studies should explore whether there are nuanced differences in how men and women perceive and are affected by fun activities, as well as the underlying mechanisms involved. Additionally, research should examine the factors contributing to the lower participation rates of men in FaW research to ensure more balanced and representative findings across genders.

Sixth, future research should explore whether FaW is genuinely embedded in organizational culture or if it functions more as a strategic tool or even as a form of 'well-being washing'. This investigation could examine whether FaW initiatives are authentically integrated into the organizational values or are primarily used as a superficial strategy to enhance employer branding. Understanding how employees perceive these initiatives and, whether they represent a true reflection of culture or are merely tokenistic can provide critical insights into their effectiveness and impact.

Lastly, Playful work design was the most representative tool used in our systematic review, there is a need for further research to investigate how is PWD linked with autonomy in different occupational groups for example, office workers vs healthcare providers or line workers, with different occupational needs (Table 1).

9. Limitations

While the paper has significant implications for theory and practice, the limited number of studies available on the examined relationships affects the accuracy of the meta-analytic results. Moreover, five of the six studies reporting on burnout focused solely on the dimension of emotional exhaustion. Similarly, most work engagement studies report overall scores, potentially overlooking specific facets of engagement. The limited number of available

studies also means that any assumptions on the direction of the relationship between FaW and work engagement remain purely theoretical, and more research is required to substantiate arguments that work engagement is an outcome of FaW as proposed in previous literature (Georganta & Montgomery, 2022). Also, with the exception of ProQuest, searches were restricted to titles and/or abstracts. Although these constraints may have limited the total number of studies retrieved, our strategy was validated through preliminary scoping and supplemented by manual checking of key reviews and reference lists, supporting the overall comprehensiveness of the review.

It is also important to note that the proposed conceptualization is not an attempt to integrate all the available literature on fun at work but to use key psychological mechanisms that are considered to drive work engagement to better understand when and why fun at work might be more effective for employee and organizational wellbeing. For example, a limitation of this review is the exclusion of qualitative studies, which may have provided valuable contextual insights into how fun at work is experienced and enacted. While our framework distinguishes between organizational and employee-driven sources of fun, the dynamic and often reciprocal interaction between these sources, might not be adequately captured. The fluidity and evolving nature of FaW suggest that the boundary between ODF and EDF can be blurred, with activities sometimes encompassing elements of both, resulting in a mixed category.

10. Conclusions

FaW is an important organisational topic, in that it reveals the boundaries between the permissible and prohibited in the workplace and is a thermometer of staff wellbeing. The systematic review and meta-analyses revealed robust relationships between FaW and burnout/engagement. The stronger path to engagement raises the question as to whether it represents a component of engagement – meaning that it may reflect internally motivated engagement (i.e. it's a pleasure to work here) versus more externally motivated engagement (i.e. it's important to exhibit enjoyment in this workplace). The narrative review provided a new conceptual framework for FaW. The distinction between EDF and ODF can help explain how burnout and engagement can co-exist, whereby misaligned ODF becomes a work demand. The new framework provides clear paths to future research

directions and posits interesting theoretical questions concerning the role of FaW as a resource/demand and challenge/hindrance in the Job-Demands Resources model. Ultimately, fun is a serious business.

Notes

1. Aim number 3 was not included in the original PROSPERO registration. It was included after the review of the literature was completed and the decision to supplement the meta-analysis with a narrative synthesis was made, due to the limited number of studies available for meta-analysis.
2. The narrative synthesis was not part of the review protocol as registered on PROSPERO. It was included after the review of the literature was completed and the decision to supplement the meta-analysis with a narrative synthesis was made, due to the limited number of studies available for meta-analysis.

Authors' contribution

Conceptualization – ET, MS, AM, OL; Data curation – ET, MS, CM, VC, IM, OL; Formal analysis – ET, OL; Investigation – ET, MS, CM, VC, IM, OL; Methodology – ET, OL, AM; Project administration – ET, OL; Resources – ET, OL; Supervision – ET, OL, AM; Visualization – ET, OL; Writing – original draft – ET, OL, AM; Writing – review & editing – ET, OL, AM.

Disclosure statement

No potential conflict of interest was reported by the author(s).

About the authors

Eva Tzioti is a psychologist (BSc in Applied Psychology, University of Derby, UK) and post-graduate student in I/O Psychology, whose research interests focus on the interplay between organizational factors and individual differences for employee wellbeing.

Anthony Montgomery is Full Professor of Occupational and Organizational Psychology at Northumbria University, UK. His research focuses on burnout, organizational culture, and healthy workplaces.

Maria Spiliou is a psychologist (BSc in Applied Psychology, University of Derby, UK) and an experienced School Counsellor currently based in Sweden, whose research interests focus on mental health and developmental trajectories.

Christos Mouratidis is a psychologist (BSc in Applied Psychology, University of Derby, UK) and post-graduate student in Clinical Psychology, whose research interests focus on PTSD, burnout as well the costs of moral distress among healthcare workers.

Vilma Chalili a postgraduate student in Neuroscience at the Aristotle University School of Medicine, with a


background in psychology and biological sciences. Her research interests focus on neurodegeneration and the relationship between cognition and burnout.


Ilias Maliousis is a psychologist (BSc in Applied Psychology, University of Derby, UK) and a post-graduate student in Clinical Psychology whose research interests focus on depression, anxiety, and the effects burnout on individual mental health.

Olga Lainidi is a Post-Graduate Teaching Assistant and Researcher at the School of Psychology, University of Leeds, UK, whose research interests focus on workplace silence, voice and burnout in healthcare settings.

ORCID

Eva Tzioti  <http://orcid.org/0009-0009-3396-0861>

Anthony Montgomery  <http://orcid.org/0000-0002-1118-7398>

Christos Mouratidis  <http://orcid.org/0009-0002-3408-8250>

Vilma Chalili  <http://orcid.org/0009-0007-1592-781X>

Ilias Maliousis  <http://orcid.org/0009-0001-4031-5504>

Olga Lainidi  <http://orcid.org/0000-0002-7149-7902>

Data availability statement

The correlation coefficients extracted for the meta-analysis are available on OSF, <https://osf.io/ygf95/>

References

- Abdelmotaleb, M. (2024). Exploring the effect of perceived fun at work on hospitality employees' behaviors in and out of work. *International Journal of Contemporary Hospitality Management*, 36(7), 2214–2231. <https://doi.org/10.1108/IJCHM-02-2023-0139>
- Abramis, D. J. (1990). Play in work: Childish hedonism or adult enthusiasm? *American Behavioral Scientist*, 33(3), 353–373. <https://doi.org/10.1177/0002764290033003010>
- Alarcon, G. M. (2011). A meta-analysis of burnout with job demands, resources, and attitudes. *Journal of Vocational Behavior*, 79(2), 549–562. <https://doi.org/10.1016/j.jvb.2011.03.007>
- Aldag, R., & Sherony, K. (2001). A spoonful of sugar: Some thoughts on 'fun at work'. *Current Issues in Management*, 1(1), 62–76.
- Aronsson, G., Theorell, T., Grape, T., Hammarström, A., Hogstedt, C., Marteinsdottir, I., Skoog, I., Träskman-Bendz, L., & Hall, C. (2017). A systematic review including meta-analysis of work environment and burnout symptoms. *BMC Public Health*, 17(1), 264. <https://doi.org/10.1186/s12889-017-4153-7>
- Bakker, A. B., Demerouti, E., & Euwema, M. C. (2005). Job resources buffer the impact of job demands on burnout. *Journal of Occupational Health Psychology*, 10(2), 170–180. <https://doi.org/10.1037/1076-8998.10.2.170>
- Bakker, A. B., & Leiter, M. P. (2010). *Work engagement: A handbook of essential theory and research*. Psychology Press.

- Bakker, A. B., Tims, M., & Derks, D. (2012). Proactive personality and job performance: The role of job crafting and work engagement. *Human Relations*, 65(10), 1359–1378. <https://doi.org/10.1177/0018726712453471>
- Bakker, A. B., & Xanthopoulou, D. (2013). Creativity and charisma among female leaders: The role of resources and work engagement. *The International Journal of Human Resource Management*, 24(14), 2760–2779. <https://doi.org/10.1080/09585192.2012.751438>
- Bakker, A. B., & Demerouti, E. (2017). Job demands–resources theory: Taking stock and looking forward. *Journal of Occupational Health Psychology*, 22(3), 273–285. <https://doi.org/10.1037/ocp0000056>
- Bakker, A. B., Scharp, Y. S., Breevaart, K., & De Vries, J. D. (2020a). Playful work design: Introduction of a new concept. *The Spanish Journal of Psychology*, 23, e19. <https://doi.org/10.1017/SJP.2020.20>
- Bakker, A. B., Hetland, J., Olsen, O. K., Espevik, R., & De Vries, J. D. (2020b). Job crafting and playful work design: Links with performance during busy and quiet days. *Journal of Vocational Behavior*, 122, 103478. <https://doi.org/10.1016/j.jvb.2020.103478>
- Bakker, A. B., & van Wingerden, J. (2021). Rumination about COVID-19 and employee well-being: The role of playful work design. *Canadian Psychology / Psychologie Canadienne*, 62(1), 73–79. <https://doi.org/10.1037/cap0000262>
- Bakker, A. B., Demerouti, E., & Sanz-Vergel, A. (2023). Job demands–resources theory: Ten years later. *Annual Review of Organizational Psychology and Organizational Behavior*, 10(1), 25–53. <https://doi.org/10.1146/annurev-orgpsych-120920-053933>
- Barnett, R. C., Gareis, K. C., & Brennan, R. T. (1999). Fit as a mediator of the relationship between work hours and burnout. *Journal of Occupational Health Psychology*, 4(4), 307–317. <https://doi.org/10.1037/1076-8998.4.4.307>
- Bartzik, M., Bentrup, A., Hill, S., Bley, M., von Hirschhausen, E., Krause, G., Ahaus, P., Dahl-Dichmann, A., & Peifer, C. (2021). Care for joy: Evaluation of a humor intervention and its effects on stress, flow experience, work enjoyment, and meaningfulness of work. *Frontiers in Public Health*, 9, 667821. <https://doi.org/10.3389/fpubh.2021.667821>
- Becker, F. W., & Tews, M. J. (2016). Fun activities at work: Do they matter to hospitality employees? *Journal of Human Resources in Hospitality & Tourism*, 15(3), 279–296. <https://doi.org/10.1080/15332845.2016.1147938>
- Belias, M., Rovers, M. M., Reitsma, J. B., Debray, T. P., & IntHout, J. (2019). Statistical approaches to identify subgroups in meta-analysis of individual participant data: A simulation study. *BMC Medical Research Methodology*, 19(1), 183. <https://doi.org/10.1186/s12874-019-0817-6>
- Bindl, U. K., & Parker, S. K. (2011). Proactive work behavior: Forward-thinking and change-oriented action in organizations. In S. Zedeck (Ed.) *APA handbook of industrial and organizational psychology, Vol 2: Selecting and developing members for the organization*. (pp. 567–598). American Psychological Association.
- Borenstein, M., Hedges, L. V., Higgins, J. P., & Rothstein, H. R. (2010). A basic introduction to fixed-effect and random-effects models for meta-analysis. *Research Synthesis Methods*, 1(2), 97–111. <https://doi.org/10.1002/jrsm.12>
- Borenstein, M., Hedges, L. V., Higgins, J. P., & Rothstein, H. R. (2021). *Introduction to meta-analysis*. John Wiley & Sons.
- Borenstein, M. (2022). Comprehensive meta-analysis software. In M. Egger, J. P. T. Higgins, & G. Davey Smith (Eds.), *Systematic Reviews in Health Research* (pp. 535–548). <https://doi.org/10.1002/9781119099369.ch27>
- Bowen, J. T., Tews, M. J., & Baloglu, S. (2020). Yielding the benefits of fun in the workplace: The devil's in the details. *Organizational Dynamics*, 49(3), 100720. <https://doi.org/10.1016/j.orgdyn.2019.04.006>
- Celestine, N. A., & Yeo, G. (2021). Having some fun with it: A theoretical review and typology of activity-based play-at-work. *Journal of Organizational Behavior*, 42(2), 252–268. <https://doi.org/10.1002/job.2444>
- Chan, S. C. (2010). Does workplace fun matter? Developing a useable typology of workplace fun in a qualitative study. *International Journal of Hospitality Management*, 29(4), 720–728. <https://doi.org/10.1016/j.ijhm.2010.03.001>
- Chan, S. C., & Mak, W. M. (2016). Have you experienced fun in the workplace? An empirical study of workplace fun, trust-in-management and job satisfaction. *Journal of Chinese Human Resource Management*, 7(1), 27–38. <https://doi.org/10.1108/JCHRM-03-2016-0002>
- Chan, S. C. (2019). Participative leadership and job satisfaction: The mediating role of work engagement and the moderating role of fun experienced at work. *Leadership & Organization Development Journal*, 40(3), 319–333. <https://doi.org/10.1108/LODJ-06-2018-0215>
- Chen, C.-Y., Ni, J.-J., Kuei-Hsien, C., & Ming-Way, L. (2022). Does workplace humour influence work engagement? The role of workplace fun. *Current Issues in Tourism*, 26(15), 2543–2558. <https://doi.org/10.1080/13683500.2022.2090907>
- Christian, M. S., Garza, A. S., & Slaughter, J. E. (2011). Work engagement: A quantitative review and test of its relations with task and contextual performance. *Personnel Psychology*, 64(1), 89–136. <https://doi.org/10.1111/j.1744-6570.2010.01203.x>
- Clancy, M., & Linehan, C. (2019). Modelling the subjective experience of fun at work. *Employee Relations: The International Journal*, 41(3), 520–537. <https://doi.org/10.1108/ER-10-2017-0251>
- Csikszentmihalyi, M., & LeFevre, J. (1989). Optimal experience in work and leisure. *Journal of Personality and Social Psychology*, 56(5), 815–822. <https://doi.org/10.1037/0022-3514.56.5.815>
- Csikszentmihalyi, M. (1990). Literacy and intrinsic motivation. *Daedalus*, 119(2), 115–140. <http://www.jstor.org/stable/20025303>
- Deal, T. E., & Kennedy, A. A. (1983). *Corporate cultures: The rites and rituals of corporate life*. Addison-Wesley, 1982. ISBN: 0-201-10277-3. \$14.95. *Business Horizons*, 26(2), 82–85. [https://doi.org/10.1016/0007-6813\(83\)90092-7](https://doi.org/10.1016/0007-6813(83)90092-7)
- Demerouti, E., Bakker, A. B., Nachreiner, F., & Schaufeli, W. B. (2001). The job demands-resources model of burnout. *Journal of Applied Psychology*, 86(3), 499–512. <https://doi.org/10.1037/0021-9010.86.3.499>
- Demerouti, E., Mostert, K., & Bakker, A. B. (2010). Burnout and work engagement: A thorough investigation of the independency of both constructs. *Journal of Occupational*

- Health Psychology*, 15(3), 209–222. <https://doi.org/10.1037/a0019408>
- Dishon-Berkovits, M., Bakker, A. B., & Peters, P. (2024). Playful work design, engagement and performance: The moderating roles of boredom and conscientiousness. *The International Journal of Human Resource Management*, 35(2), 256–283. <https://doi.org/10.1080/09585192.2023.227920>
- Duval, S., & Tweedie, R. (2000). A nonparametric ‘trim and fill’ method of accounting for publication bias in meta-analysis. *Journal of the American Statistical Association*, 95(449), 89–98. <https://doi.org/10.2307/2669529>
- Edmondson, A. (1999). Psychological safety and learning behavior in work teams. *Administrative Science Quarterly*, 44(2), 350–383. <https://doi.org/10.2307/2666999>
- Egger, M., Smith, G. D., Schneider, M., & Minder, C. (1997). Bias in meta-analysis detected by a simple, graphical test. *BMJ (Clinical Research ed.)*, 315(7109), 629–634. <https://doi.org/10.1136/bmj.315.7109.629>
- Feng, S., Shu-Xun, H., Jia-Liang, Z., Dong-Feng, R., Zheng, C., & Jia-Guang, T. (2014). Quality assessment tool for observational cohort and cross-sectional studies. *PLOS One*, 9(11), e111695. <https://doi.org/10.1371/journal.pone.0111695>
- Fluegge, E. R. (2008). *Who put the fun in functional? Fun at work and its effects on job performance*. University of Florida.
- Fluegge-Woolf, E. R. (2014). Play hard, work hard: Fun at work and job performance. *Management Research Review*, 37(8), 682–705.
- Ford, R. C., McLaughlin, F. S., & Newstrom, J. W. (2003). Questions and answers about fun at work. *Human Resource Planning*, 26(4), 18–33.
- Fredrickson, B. L. (2001). The role of positive emotions in positive psychology: The broaden-and-build theory of positive emotions. *The American Psychologist*, 56(3), 218–226. <https://doi.org/10.1037/0003-066x.56.3.218>
- Georganta, K., & Montgomery, A. (2016). Exploring fun as a job resource: The enhancing and protecting role of a key modern workplace factor. *International Journal of Applied Positive Psychology*, 1(1-3), 107–131. <https://doi.org/10.1007/s41042-016-0002-7>
- Georganta, K., & Montgomery, A. (2019). Workplace fun: A matter of context and not content. *Qualitative Research in Organizations and Management: An International Journal*, 14(3), 317–336. <https://doi.org/10.1108/QROM-06-2017-1541>
- Georganta, K., & Montgomery, A. (2022). Workplace fun is not enough: The role of work engagement and trust. *Cogent Psychology*, 9(1), 2060603. <https://doi.org/10.1080/23311908.2022.2060603>
- Hakanen, J. J., Perhoniemi, R., & Toppinen-Tanner, S. (2008). Positive gain spirals at work: From job resources to work engagement, personal initiative and work-unit innovativeness. *Journal of Vocational Behavior*, 73(1), 78–91. <https://doi.org/10.1016/j.jvb.2008.01.003>
- Higgins JP, Thomas J, Chandler J, Cumpston M, Li T, Page MJ, Welch VA, editor(s). *Cochrane Handbook for Systematic Reviews of Interventions Version 6.4 (updated August 2023)*. Cochrane. (2023). Available from training.cochrane.org/handbook
- Hobfoll, S. E. (2002). Social and psychological resources and adaptation. *Review of General Psychology*, 6(4), 307–324. <https://doi.org/10.1037/1089-2680.6.4.307>
- Jaiswal, N. K., & Dhar, R. L. (2017). The influence of servant leadership, trust in leader and thriving on employee creativity. *Leadership & Organization Development Journal*, 38(1), 2–21. <https://doi.org/10.1108/LODJ-02-2015-0017>
- Junker, N. M., Kaluza, A. J., Häusser, J. A., Mojzisch, A., van Dick, R., Knoll, M., & Demerouti, E. (2021). Is work engagement exhausting? The longitudinal relationship between work engagement and exhaustion using latent growth modeling. *Applied Psychology*, 70(2), 788–815. <https://doi.org/10.1111/apps.12252>
- Jyoti, J., & Dimple, D. (2022). Fun at workplace and intention to leave: Role of work engagement and group cohesion. *International Journal of Contemporary Hospitality Management*, 34(2), 782–807. <https://doi.org/10.1108/IJCHM-06-2021-0704>
- Karl, K., & Harland, L. (2005). *What’s Fun and What’s Not: An Examination of Age, Gender Differences, and Attitudes toward Fun Activities at Work*. In *Proceedings of the Midwest Academy of Management 2005 Meeting, Chicago, IL*.
- Karl, K., Peluchette, J., Hall-Indiana, L., & Harland, L. (2005). Attitudes toward workplace fun: A three sector comparison. *Journal of Leadership & Organizational Studies*, 12(2), 1–17. <https://doi.org/10.1177/107179190501200201>
- Karl, K. A., & Peluchette, J. V. (2006). Does workplace fun buffer the impact of emotional exhaustion on job dissatisfaction?: A study of health care workers. *Journal of Behavioral and Applied Management*, 7(2), 128–142. <https://doi.org/10.21818/001c.16553>
- Karl, K. A., Peluchette, J. V., & Harland, L. (2007). Is fun for everyone? Personality differences in healthcare providers’ attitudes toward fun. *Journal of Health and Human Services Administration*, 29(4), 409–447. <https://doi.org/10.1177/107937390702900403>
- Kessel, M., Kratzer, J., & Schultz, C. (2012). Psychological safety, knowledge sharing, and creative performance in healthcare teams. *Creativity and Innovation Management*, 21(2), 147–157. <https://doi.org/10.1111/j.1467-8691.2012.00635.x>
- Kim, A., Gabriel, A. S., Kim, Y., Moon, J., & Rosen, C. C. (2023). How does workplace gossip benefit gossip actors? The impact of workplace gossip on power and voluntary turnover. *Group & Organization Management*, 10596011231203758. <https://doi.org/10.1177/10596011231203758>
- Lainidi, O., Jendeby, M. K., Montgomery, A., Mouratidis, C., Paitaridou, K., Cook, C., Johnson, J., & Karakasidou, E. (2023). An integrative systematic review of employee silence and voice in healthcare: What are we really measuring? *Frontiers in Psychiatry*, 14, 1111579. <https://doi.org/10.3389/fpsy.2023.1111579>
- Lawrence, T. B., & Robinson, S. L. (2007). Ain’t misbehavin’: Workplace deviance as organizational resistance. *Journal of Management*, 33(3), 378–394. <https://doi.org/10.1177/0149206307300816>
- Lee, A. Y. P., Wang, Y. H., & Yang, F. R. (2021). Feeling exhausted? Let’s play—How play in work relates to experienced burnout and innovation behaviors. *Applied Research in Quality of Life*, 16(2), 629–648. <https://doi.org/10.1007/s11482-019-09794-1>

- Lee, Y. J., & Chae, M. S. (2008). An empirical study on the influence of fun management and fun leadership behavior on job stress and job attitude. *Korean Academic Association of Business Administration journal*, 21(3), 1029–1058.
- Leiter, M. P., & Maslach, C. (2017). Burnout and engagement: Contributions to a new vision. *Burnout Research*, 5, 55–57. <https://doi.org/10.1016/j.burn.2017.04.003>
- Lesener, T., Gusy, B., Jochmann, A., & Wolter, C. (2020). The drivers of work engagement: A meta-analytic review of longitudinal evidence. *Work & Stress*, 34(3), 259–278. <https://doi.org/10.1080/02678373.2019.1686440>
- Li, Y., Tuckey, M. R., Bakker, A., Chen, P. Y., & Dollard, M. F. (2023). Linking objective and subjective job demands and resources in the JD-R model: A multilevel design. *Work & Stress*, 37(1), 27–54. <https://doi.org/10.1080/02678373.2022.2028319>
- Lipsey, M. W. (2001). *Practical meta-analysis*. Thousand Oaks.
- Louw, K. R., Dunlop, P. D., Yeo, G. B., & Griffin, M. A. (2016). Mastery approach and performance approach: The differential prediction of organizational citizenship behavior and workplace deviance, beyond HEXACO personality. *Motivation and Emotion*, 40(4), 566–576. <https://doi.org/10.1007/s11031-016-9551-0>
- Maslach, C., Jackson, S. E., & Leiter, M. P. (1996). *Maslach burnout inventory manual*. Consulting Psychologists Press.
- Maslach, C., Jackson, S. E., & Leiter, M. P. (1997). *Maslach burnout inventory*. Scarecrow Education.
- Maslach, C., & Leiter, M. P. (1997). *The truth about burnout: How organizations cause personal stress and what to do about it*. Jossey-Bass.
- Maslach, C., & Leiter, M. P. (2016). Understanding the burnout experience: Recent research and its implications for psychiatry. *World Psychiatry: official Journal of the World Psychiatric Association*, 15(2), 103–111. <https://doi.org/10.1002/wps.20311>
- Mazzetti, G., Robledo, E., Vignoli, M., Topa, G., Guglielmi, D., & Schaufeli, W. B. (2023). Work engagement: A meta-analysis using the job demands-resources model. *Psychological Reports*, 126(3), 1069–1107. <https://doi.org/10.1177/00332941211051988>
- McDowell, T. (2004). *Fun at work: Scale development, confirmatory factor analysis, and links to organizational outcomes*. Alliant International University.
- McManus, I. C., & Furnham, A. (2010). 'Fun, fun, fun': Types of fun, attitudes to fun, and their relation to personality and biographical factors. *Psychology*, 01(03), 159–168. <https://doi.org/10.4236/psych.2010.13021>
- Mesmer-Magnus, J., Glew, D. J., & Viswesvaran, C. (2012). A meta-analysis of positive humor in the workplace. *Journal of Managerial Psychology*, 27(2), 155–190. <https://doi.org/10.1108/02683941211199554>
- Michel, J. W., Tews, M. J., & Allen, D. G. (2019). Fun in the workplace: A review and expanded theoretical perspective. *Human Resource Management Review*, 29(1), 98–110. <https://doi.org/10.1016/j.hrmr.2018.03.001>
- Moeller, J., Ivcevic, Z., White, A. E., Menges, J. I., & Brackett, M. A. (2018). Highly engaged but burned out: Intra-individual profiles in the US workforce. *Career Development International*, 23(1), 86–105. <https://doi.org/10.1108/CDI-12-2016-0215>
- Moher, D., Liberati, A., Tetzlaff, J., & Altman, D. G. (2009). Preferred reporting items for systematic reviews and meta-analyses: The PRISMA statement. *Annals of Internal Medicine*, 151(4), 264–269, W64. <https://doi.org/10.7326/0003-4819-151-4-200908180-00135>
- Müceldili, B., & Erdil, O. (2016). Finding fun in work: The effect of workplace fun on taking charge and job engagement. *Procedia - Social and Behavioral Sciences*, 235, 304–312. <https://doi.org/10.1016/j.sbspro.2016.11.034>
- Newstrom, J. W. (2002). Making work fun: An important role for managers. *SAM Advanced Management Journal*, 67(1), 4–10.
- Ng, T. W., & Feldman, D. C. (2015). Ethical leadership: Meta-analytic evidence of criterion-related and incremental validity. *The Journal of Applied Psychology*, 100(3), 948–965. <https://doi.org/10.1037/a0038246>
- O'Connor, K., Neff, D. M., & Pitman, S. (2018). Burnout in mental health professionals: A systematic review and meta-analysis of prevalence and determinants. *European Psychiatry*, 53, 74–99. <https://doi.org/10.1016/j.eurpsy.2018.06.003>
- Olson, J., McAllister, C., Grinnell, L. D., Gehrke Walters, K., & Appunn, F. (2016). Applying Constant Comparative Method with Multiple Investigators and Inter-Coder Reliability. *The Qualitative Report*, 21(1), 26–42. <https://doi.org/10.46743/2160-3715/2016.2447>
- Pereira, V., & Mohiya, M. (2021). Share or hide? Investigating positive and negative employee intentions and organizational support in the context of knowledge sharing and hiding. *Journal of Business Research*, 129, 368–381. <https://doi.org/10.1016/j.jbusres.2021.03.011>
- Permatasari, Y. A., & Riani, A. L. (2019). The role of fun at work towards job satisfaction of employee with work engagement as mediator. *Sebelas Maret Business Review*, 3(2), 31. <https://doi.org/10.20961/smb.r.v3i2.16800>
- Pines, A., & Aronson, E. (1988). *Career burnout: Causes and cures*. Free press.
- Plester, B., Cooper-Thomas, H., & Winqvist, J. (2015). The fun paradox. *Employee Relations*, 37(3), 380–398. <https://doi.org/10.1108/ER-04-2013-0037>
- Plester, B., & Hutchison, A. (2016). Fun times: The relationship between fun and workplace engagement. *Employee Relations*, 38(3), 332–350. <https://doi.org/10.1108/ER-03-2014-0027>
- Renee Baptiste, N. (2009). Fun and well-being: Insights from senior managers in a local authority. *Employee Relations*, 31(6), 600–612. <https://doi.org/10.1108/01425450910991758>
- Rich, B. L., Lepine, J. A., & Crawford, E. R. (2010). Job engagement: Antecedents and effects on job performance. *Academy of Management Journal*, 53(3), 617–635. <https://doi.org/10.5465/amj.2010.51468988>
- Rosenberg, C., Walker, A., Leiter, M., & Graffam, J. (2021). Humor in workplace leadership: A systematic search scoping review. *Frontiers in Psychology*, 12, 610795. <https://doi.org/10.3389/fpsyg.2021.610795>
- Ryan, R. M., & Deci, E. L. (2000a). Intrinsic and extrinsic motivations: Classic definitions and new directions. *Contemporary Educational Psychology*, 25(1), 54–67. <https://doi.org/10.1006/ceps.1999.1020>
- Ryan, R. M., & Deci, E. L. (2000b). Self-determination theory and the facilitation of intrinsic motivation, social devel-

- opment, and well-being. *The American Psychologist*, 55(1), 68–78. <https://doi.org/10.1037/0003-066x.55.1.68>
- Scargle, J. D. (1999). Publication bias (the 'file-drawer problem') in scientific inference. *arXiv Preprint Physics/9909033*.
- Schaefer, C., & Greenberg, R. (1997). Measurement of playfulness: A neglected therapist variable. *International Journal of Play Therapy*, 6(2), 21–31. <https://doi.org/10.1037/h0089406>
- Scharp, Y. S., Breevaart, K., Bakker, A. B., & van der Linden, D. (2019). Daily playful work design: A trait activation perspective. *Journal of Research in Personality*, 82, 103850. <https://doi.org/10.1016/j.jrp.2019.103850>
- Scharp, Y. S., Breevaart, K., & Bakker, A. B. (2021). Using playful work design to deal with hindrance job demands: A quantitative diary study. *Journal of Occupational Health Psychology*, 26(3), 175–188. <https://doi.org/10.1037/ocp0000277>
- Scharp, Y. S., Bakker, A. B., & Breevaart, K. (2022). Playful work design and employee work engagement: A self-determination perspective. *Journal of Vocational Behavior*, 134, 103693. <https://doi.org/10.1016/j.jvb.2022.103693>
- Scharp, Y. S., Bakker, A. B., Breevaart, K., Kruup, K., & Uusberg, A. (2023). Playful work design: Conceptualization, measurement, and validity. *Human Relations*, 76(4), 509–550. <https://doi.org/10.1177/00187267211070996>
- Schaufeli, W. B. (1996). Maslach burnout inventory-general survey (MBI-GS). In C. Maslach, S. E. Jackson, & M. P. Leiter (Eds), *Maslach Burnout Inventory manual* (3rd ed., pp. 19–26). Consulting Psychologists Press.
- Schaufeli, W. B., Salanova, M., González-Romá, V., & Bakker, A. B. (2002). The measurement of engagement and burnout: A two sample confirmatory factor analytic approach. *Journal of Happiness Studies*, 3(1), 71–92. <https://doi.org/10.1023/A:1015630930326>
- Schaufeli, W. B., & Bakker, A. B. (2004). Job demands, job resources, and their relationship with burnout and engagement: A multi-sample study. *Journal of Organizational Behavior*, 25(3), 293–315. <https://doi.org/10.1002/job.248>
- Schaufeli, W. B., Bakker, A. B., & Salanova, M. (2006). The measurement of work engagement with a short questionnaire: A cross-national study. *Educational and Psychological Measurement*, 66(4), 701–716. <https://doi.org/10.1177/0013164405282471>
- Scheel, T., Gerdenitsch, C., & Korunka, C. (2016). Humor at work: Validation of the short work-related Humor Styles Questionnaire (swHSQ). *HUMOR*, 29(3), 439–465. <https://doi.org/10.1515/humor-2015-0118>
- Sedgwick, P. (2013). Meta-analyses: How to read a funnel plot. *BMJ*, 346(2), f1342–f1342. <https://doi.org/10.1136/bmj.f1342>
- Sonnentag, S., & Fritz, C. (2007). The recovery experience questionnaire: Development and validation of a measure for assessing recuperation and unwinding from work. *Journal of Occupational Health Psychology*, 12(3), 204–221. <https://doi.org/10.1037/1076-8998.12.3.204>
- Starbuck, W. H., & Webster, J. (1991). When is play productive? *Accounting, Management and Information Technologies*, 1(1), 71–90. [https://doi.org/10.1016/0959-8022\(91\)90013-5](https://doi.org/10.1016/0959-8022(91)90013-5)
- Strömberg, S., & Karlsson, J. C. (2009). Rituals of fun and mischief: The case of the Swedish meatpackers. *Employee Relations*, 31(6), 632–647. <https://doi.org/10.1108/0142-5450910991776>
- Sutton-Smith, B. (2001). *The Ambiguity of Play*. * Harvard University Press.
- Tang, J., Liu, M. S., & Liu, W. B. (2017). How workplace fun influences employees' performance: The role of person-organization value congruence. *Social Behavior and Personality: An International Journal*, 45(11), 1787–1801. <https://doi.org/10.2224/sbp.6240>
- Taris, T. W., Ybema, J. F., & van Beek, I. (2017). Burnout and engagement: Identical twins or just close relatives? *Burnout Research*, 5, 3–11. <https://doi.org/10.1016/j.burn.2017.05.002>
- Tews, M. J., & Tracey, J. B. (2009). Helping managers help themselves: The use and utility of on-the-job interventions to improve the impact of interpersonal skills training. *Cornell Hospitality Quarterly*, 50(2), 245–258. <https://doi.org/10.1177/1938965509333520>
- Tews, M. J., Michel, J. W., & Bartlett, A. (2012). The fundamental role of workplace fun in applicant attraction. *Journal of Leadership & Organizational Studies*, 19(1), 105–114. <https://doi.org/10.1177/1548051811431828>
- Tews, M. J., Michel, J. W., & Allen, D. G. (2014). Fun and friends: The impact of workplace fun and constituent attachment on turnover in a hospitality context. *Human Relations*, 67(8), 923–946. <https://doi.org/10.1177/0018726713508143>
- Tews, M. J., Michel, J., Xu, S., & Drost, A. J. (2015). Workplace fun matters... but what else? *Employee Relations*, 37(2), 248–267. <https://doi.org/10.1108/ER-10-2013-0152>
- Tims, M., Bakker, A. B., & Derks, D. (2012). Development and validation of the job crafting scale. *Journal of Vocational Behavior*, 80(1), 173–186. <https://doi.org/10.1016/j.jvb.2011.05.009>
- Trógo, M. A., Morera, L. P., Castellano, E., Spontón, C., & Medrano, L. A. (2020). Work engagement and burnout: Real, redundant, or both? A further examination using a bifactor modelling approach. *European Journal of Work and Organizational Psychology*, 29(6), 922–937. <https://doi.org/10.1080/1359432X.2020.1801642>
- Tsaur, S. H., Hsu, F. S., & Lin, H. (2019). Workplace fun and work engagement in tourism and hospitality: The role of psychological capital. *International Journal of Hospitality Management*, 81, 131–140. <https://doi.org/10.1016/j.ijhm.2019.03.016>
- Tuckey, M. R., Searle, B. J., Boyd, C. M., Winefield, A. H., & Winefield, H. R. (2015). Hindrances are not threats: Advancing the multidimensionality of work stress. *Journal of Occupational Health Psychology*, 20(2), 131–147. <https://doi.org/10.1037/a0038280>
- Ugheoke, S. O., Mashi, M. S., & Isa, M. F. M. (2022). Can workplace fun moderate organizational identification and job satisfaction relationship. *Business Perspectives and Research*, 10(3), 344–361. <https://doi.org/10.1177/22785337211018313>
- Voorberg, W. H., Bekkers, V. J., & Tummers, L. G. (2015). A systematic review of co-creation and co-production: Embarking on the social innovation journey. *Public Management Review*, 17(9), 1333–1357. <https://doi.org/10.1080/14719037.2014.930505>
- Waller, L. (2020). Fostering a sense of belonging in the workplace: Enhancing well-being and a positive and coherent sense of self. *The Palgrave Handbook of Workplace Well-Being*, 1–27.

- Warren, S., & Fineman, S. (2006). 'Don't get me wrong, it's fun here, but ...': ambivalence and paradox in a 'fun' work environment. In R. Westwood, & C. Rhodes (Eds.), *Humour Work and Organization*. (pp. 92–112). Routledge. <https://doi.org/10.4324/9780203390191>
- Welzel, C., & Inglehart, R. (2010). Agency, values, and well-being: A human development model. *Social Indicators Research*, 97(1), 43–63. <https://doi.org/10.1007/s11205-009-9557-z>
- Xanthopoulou, D., Bakker, A. B., Dollard, M. F., Demerouti, E., Schaufeli, W. B., Taris, T. W., & Schreurs, P. J. (2007). When do job demands particularly predict burnout? The moderating role of job resources. *Journal of Managerial Psychology*, 22(8), 766–786. <https://doi.org/10.1108/02683940710837714>
- Young, H. R., Glerum, D. R., Wang, W., & Joseph, D. L. (2018). Who are the most engaged at work? A meta-analysis of personality and employee engagement. *Journal of Organizational Behavior*, 39(10), 1330–1346. <https://doi.org/10.1002/job.2303>
- Zell, E., & Lesick, T. L. (2022). Big five personality traits and performance: A quantitative synthesis of 50+ meta-analyses. *Journal of Personality*, 90(4), 559–573. <https://doi.org/10.1111/jopy.12683>