

Decent work and psychological safety: The role of work modality and sector of activity

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Susana Alves Pereira^{1,2}, Sílvia Lopes^{3,4},
Anabela Rodrigues⁵ and Vânia Sofia Carvalho³

Abstract

This study examines the relationship between decent work and psychological safety, analysing whether work modality (onsite, remote, hybrid) and sector of activity (services versus industry) shape employees' experiences of both constructs. It aims to clarify how structural work conditions translate into relational climates of interpersonal safety. Data were collected from 423 employees across Portuguese organisations using a cross-sectional survey design. The Decent Work Questionnaire and the Psychological Safety Scale were employed. Results show a strong positive relationship between decent work and psychological safety. Employees in hybrid arrangements and in the services sector reported higher perceptions of both constructs. However, neither work modality nor sector moderated this relationship, suggesting that the positive association between decent work and psychological safety is stable across contexts. Organisations should prioritise decent work principles to enhance psychological safety across different work arrangements and sectors.

Keywords

decent work, hybrid work, psychological safety, remote work, sector of activity, work modality

¹Departamento de Ciências Empresariais, Universidade da Maia, Portugal

²NECE – Research Centre for Business Sciences, Universidade da Beira Interior, Estrada do Sineiro, Covilhã, Portugal

³CICPSI, Faculdade de Psicologia, Universidade de Lisboa, Alameda da Universidade, Portugal

⁴Universidade de Coimbra, CINEICC, Faculdade de Psicologia e de Ciências da Educação, Rua do Colégio Novo, Portugal

⁵CEFH – Centro de Estudos Filosóficos e Humanísticos, Faculdade de Filosofia e Ciências Sociais, Universidade Católica Portuguesa – Centro Regional de Braga, Portugal

Corresponding author:

Susana Alves Pereira, Departamento de Ciências Empresariais, Universidade da Maia, Av. Carlos de Oliveira Campos, Maia, 4475-690, Portugal.

Email: sapereira@umaia.pt

Introduction

Decent work and psychological safety are widely recognised as central dimensions of contemporary employment quality and organisational well-being (Anlesinya et al., 2021; Peiró et al., 2025; Pereira et al., 2026). In the context of accelerating technological change, economic uncertainty and evolving forms of work, organisations face increasing pressure to ensure conditions that promote both fairness and psychological safety (Dong, 2024; Song and Lee, 2023). Decent work, as defined by the International Labour Organization (ILO, 1999), represents employment that guarantees equity, safety and opportunities for development while respecting workers' rights and dignity (Peiró et al., 2025). It encapsulates the structural dimensions of work that enable individuals to achieve productive and meaningful lives. A central pillar of this framework is social dialogue, which emphasises employees' ability to express voice, participate in decision-making and engage in open communication within the workplace, conditions that are closely aligned with the development of psychological safety. In this sense, psychological safety, conceptualised by Edmondson (1999) as a shared belief that the work environment allows individuals to express themselves without fear of negative consequences, captures the relational dimension of organisational life. Although psychological safety is often conceptualised as a team-level construct, it is frequently operationalised at the individual level as employees' perceptions of interpersonal risk-taking (Frazier et al., 2017; Newman et al., 2017). Similarly, while decent work is typically framed at the organisational level, it is experienced and evaluated by individuals (Pereira et al., 2019). In this study, both constructs are examined at the individual level. Together, these constructs offer complementary perspectives on employment quality: decent work concerns the structural foundations of justice and protection, whereas psychological safety concerns the relational and team-based conditions that enable voice, learning and interpersonal openness.

Recent research has made important advances in understanding these phenomena. Studies have shown that decent work promotes workers' well-being, motivation and commitment across different employment contexts (Amponsah-Tawiah et al., 2023; Blustein et al., 2023; Ferraro et al., 2018; Ferreira et al., 2025; Pereira et al., 2025). At the same time, psychological safety has been established as a key predictor of learning, innovation and performance within teams (Dong, 2024; Edmondson, 1999; Frazier et al., 2017). Importantly, prior research highlights that psychological safety is shaped by relational and contextual factors, particularly leadership behaviours that foster interpersonal trust, openness and inclusive communication within teams (Edmondson, 1999; Newman et al., 2017). Yet, little empirical research has examined whether fair and dignified work structures create conditions that strengthen interpersonal risk-taking and trust in teams. Although both decent work and psychological safety contribute to employee well-being and organisational effectiveness, they operate at different levels of analysis, structural versus relational, and few studies have examined how they interact. Importantly, the interaction between these levels is likely to depend on contextual conditions that shape access to resources, patterns of interaction and opportunities for voice. This gap is particularly salient in today's diverse labour markets, where employees' experiences are shaped by differing work modalities and sectoral contexts that reflect structurally distinct

configurations of resources, interaction patterns and organisational support, potentially influencing how decent work is translated into psychological safety (Clarke et al., 2025; Ferreira et al., 2025; Huang et al., 2022). Understanding the linkage between decent work and psychological safety, therefore, represents a timely and necessary step toward a more integrated view of employment quality. Building on these premises, the present study investigates the relationship between decent work and psychological safety. It examines how this association varies across work modalities (onsite, hybrid and remote) and sectors of activity (services versus industry).

Prior evidence suggests that perceptions of decent work differ across these contexts due to variations in organisational structures, contractual arrangements and access to resources (Ding et al., 2020; Mondal et al., 2025). Similarly, levels of psychological safety may be shaped by sectoral communication practices, leadership styles and health and safety standards (Clarke et al., 2026; Ip et al., 2025). Yet, the joint influence of these contextual factors on the link between decent work and psychological safety has not been systematically examined. Addressing this gap, our research seeks to clarify whether the structural guarantees of decent work foster stronger interpersonal safety across different organisational settings. To achieve this goal, we conducted a quantitative, cross-sectional study involving 423 employees from diverse organisations in Portugal. Participants completed validated measures of decent work (Ferraro et al., 2018) and psychological safety (Edmondson, 1999), and data were analysed using structural equation modelling and moderation analyses. This design allows for the simultaneous estimation of measurement and structural relationships and the exploration of conditional effects across work modalities and sectors.

This study contributes to the literature on employment quality and workplace climate in four key ways. First, based on the recognised Conservation of Resources Theory (COR, Hobfoll, 2002), it links decent work to psychological safety, showing how fairness, protection and opportunities foster voice and risk-taking, bridging two parallel research traditions (Blustein et al., 2023; Edmondson, 1999). Second, it adopts a contextual perspective on decent work by examining differences across work modalities and sectors of activity, thereby extending existing job-quality frameworks to diverse organisational settings (Clarke et al., 2025). Third, it improves measurement by defining decent work as a higher-order construct with seven dimensions, distinguishing it from psychological safety (Ferraro et al., 2018). Finally, it offers practical insights for human resource systems, demonstrating how to implement decent work principles to create inclusive and psychologically safe workplaces (Amponsah-Tawiah et al., 2023).

The remainder of this article is structured as follows. The second section develops the theoretical background and hypotheses. The third section presents the methodology, including the sample, the instruments and the analytical procedures. The fourth reports the empirical results, and the fifth section discusses their theoretical and practical implications, concluding with limitations and directions for future research.

Theoretical background and hypotheses

The relationship between decent work and psychological safety

Decent work, as conceptualised by the International Labour Organization (ILO, 1999) and operationalised by Ferraro et al. (2018), constitutes a multidimensional framework

encompassing fairness, dignity, adequate remuneration, social protection and development opportunities. These dimensions define the structural quality of employment and sustain both individual well-being and organisational resilience (Blustein et al., 2023; Pereira et al., 2021a, 2021b, 2023, 2025). Empirical research demonstrates that decent work enhances employees' health, satisfaction and engagement, thereby strengthening organisational performance and social sustainability (Anlesinya et al., 2021; Veiga, 2025). Within this framework, psychological safety, defined as the shared belief that the work environment allows for interpersonal risk-taking without fear of negative consequences (Edmondson, 1999), emerges as a critical relational outcome of decent work. When work environments are grounded in justice, respect and inclusion, employees develop trust, openness and confidence to express themselves authentically. Although both constructs are known to promote well-being and collaboration, the mechanisms linking decent work to psychological safety remain underexplored, particularly across diverse organisational contexts.

This relationship can be understood through complementary theoretical perspectives. From the perspective of Social Exchange Theory (Blau, 1964), decent work conveys organisational fairness, trust and reciprocity, encouraging employees to engage in cooperative and open behaviours. When individuals perceive that their organisation values dignity and equity, they reciprocate with authenticity and constructive dialogue, reinforcing collective trust. Conservation of Resources Theory (Hobfoll, 1989) further suggests that decent work provides critical resources such as stability, fair remuneration and supportive relationships that reduce uncertainty and enhance confidence in interpersonal interactions (Bailey et al., 2020; Russo et al., 2016). Thus, the presence of decent work minimises the perceived threat of resource loss. Less threat of resource loss means less stress and a greater sense of stability (Hobfoll, 2002). Furthermore, the abundance of resources provided by decent work not only protects against losses but also creates 'resource caravans' – where the possession of one resource facilitates the acquisition of others. For example, development opportunities lead to the acquisition of new skills, which can increase remuneration or status. This accumulation generates a resource reserve that empowers individuals to face challenges and be more resilient. With a solid foundation of protected and growing resources, employees feel more confident and less vulnerable, achieving psychosocial safety.

Organisational practices that prioritise well-being, fairness and employee voice contribute to the development of work environments that safeguard psychological well-being. When employees do not fear losing key resources, such as employment, reputation or status, for expressing ideas, admitting mistakes or seeking help, their psychological safety is more likely to flourish. Decent work provides a foundational 'cushion' of material, social and relational resources that enables interpersonal risk-taking without the paralysing fear of negative consequences. In this sense, rather than triggering 'loss spirals', in which the depletion of one resource precipitates further losses and strain (Hobfoll, 2002), decent work creates conditions conducive to resource stability and accumulation. Specifically, fair, secure and supportive working conditions foster trust in the organisation and its representatives, which legitimises open communication and voice as safe and appropriate behaviours. Psychological safety thus emerges as a proximal relational climate grounded in employees' interpretations of decent work arrangements. As workers experience organisational practices as fair, inclusive and reliable, they imply care and

benevolence from the organisation, reinforcing expectations that interpersonal risks will not be punished (Feringa, 2018; Grabovac and Mustajbegović, 2015; Volevakha et al., 2021). Accordingly, decent work can be conceptualised as a structural and contextual antecedent that enables psychological safety, rather than as an outcome of it.

Empirical findings substantiate these perspectives. Fair and dignified work conditions promote inclusive environments that strengthen psychological safety and mental health (Bashir et al., 2025; Mirza et al., 2022). When employees perceive their work conditions as fair and supportive, they experience greater self-esteem and interpersonal confidence. Conversely, perceptions of exclusion erode trust and hinder collaboration, though inclusive and supportive work environments can help restore psychological safety following such experiences (Tang and Richardson, 2013).

Decent work also contributes to psychological safety through manageable workloads, work–life balance and social support (Pereira et al., 2021a, 2021b, 2023, 2025). Supportive cultures, clear roles and cohesive teams mitigate strain and foster communication and cooperation (Bailey et al., 2020; Fukami, 2023; Volevakha et al., 2021). Conversely, excessive demands and lack of support lead to anxiety, exhaustion and silence: behaviours that undermine interpersonal trust (Al-Adawi et al., 2022; Chen et al., 2022; Fleming et al., 2024). Access to formal and informal social support further buffers stress and enhances psychological availability (Russo et al., 2016).

Moreover, decent work enhances professional fulfilment by promoting autonomy, competence and meaning, which are critical drivers of interpersonal confidence and team learning (Pereira et al., 2026). Teams operating under conditions of psychological safety exhibit higher effectiveness, reduced burnout and stronger collaboration (Atiku et al., 2023; Edmondson et al., 2016; Fleming et al., 2024). Practices such as transparent communication, participative leadership and well-defined responsibilities cultivate trust-based cultures that sustain psychological safety (Volevakha et al., 2021). Fair remuneration reinforces these dynamics by signalling organisational integrity and reducing uncertainty (Lee, 2022; Mirza et al., 2022). Finally, protecting physical and psychological health and safety remains a cornerstone of decent work, directly reinforcing feelings of security and collective care. Organisations that implement preventive health measures, promote mental health literacy and encourage open dialogue nurture climates of mutual respect and support (Feringa, 2018; Grabovac and Mustajbegović, 2015). In summary, the existing literature indicates that fair, respectful and supportive working conditions provide employees with the resources and confidence needed to take interpersonal risks, communicate openly and collaborate effectively. Based on these insights, we can propose the following hypothesis:

Hypothesis 1: There is a positive relationship between decent work and psychological safety.

Work modality as a contextual factor in decent work and psychological safety

Recent transformations in the organisation of work have diversified where and how tasks are performed, with onsite remote and hybrid arrangements now coexisting within the

same organisational systems (Pereira et al., 2026). These modalities create heterogeneous working conditions that influence perceptions of fairness, inclusion, support and access to resources, dimensions central to how employees appraise job quality and the broader workplace climate (Fleming et al., 2024; Grabovac and Mustajbegović, 2015). Variations in stability, autonomy, workload and opportunities for participation frequently emerge across modalities, shaping stress, satisfaction and perceptions of whether work is conducted with dignity and respect (Fleming et al., 2024). Encouraging employee voice and involvement in decision-making processes has been consistently identified as a key pathway to improving psychosocial health and reinforcing conditions consistent with decent work across modalities (Grabovac and Mustajbegović, 2015).

The contextual characteristics of each modality also shape the development of psychological safety in everyday interactions (Spreitzer et al., 2005). In onsite settings, frequent face-to-face contact facilitates interpersonal connection, trust and open communication, which can support inclusive and psychologically safe climates when effectively managed (Spreitzer et al., 2005). However, physical proximity can also amplify exposure to social and cultural pressures, including harassment, discrimination and organisational silence, when preventive and inclusive practices are lacking (Danna and Griffin, 1999; Morrison and Milliken, 2000). Implementing clear anti-harassment policies, promoting equitable career development and fostering mutual respect and role clarity are essential for maintaining a climate of safety and voice (Kahn, 1990; Spreitzer et al., 2005).

Remote work introduces new dynamics by enhancing autonomy and flexibility while reducing informal communication and spontaneous collaboration, both of which are crucial for inclusion and trust. Research indicates that flexibility can improve work–life balance and mitigate stress through greater control over schedules and personal boundaries (Ivasciuc et al., 2022; Pereira et al., 2026). However, distance may foster isolation and weaken interpersonal bonds, thereby undermining psychological safety when communication is irregular or ambiguous (Potter and Ross, 2023; Tkalic et al., 2024). Regular communication, emotional support and constructive feedback are therefore essential to sustain connection, trust and collective engagement in remote environments (Edmondson, 1999; van Zoonen et al., 2024). Moreover, when remote work is perceived positively, psychological safety strengthens the link between satisfaction and performance, thereby buffering this relationship in virtual contexts (Radu et al., 2023).

Hybrid arrangements combine the advantages and challenges of onsite and remote formats (Nikiforova et al., 2023). Although flexibility in hybrid work can enhance satisfaction and autonomy, disparities in access to information, participation and informal exchanges may create perceptions of unequal voice and belonging (Kelliher and Anderson, 2010; Nikiforova et al., 2023). Maintaining fair and transparent practices that ensure equivalent access to communication channels, decision-making and feedback across locations is crucial for preserving team cohesion and trust (Edmondson, 1999; Nembhard and Edmondson, 2006). Well-structured hybrid meetings, consistent feedback cycles and deliberate inclusion strategies help reinforce mutual respect and stable expectations in mixed-presence teams (Nikiforova et al., 2023).

Overall, work modality constitutes a critical contextual factor influencing both perceptions of decent work and experiences of psychological safety (International Labour

Organization, 2021; Pereira and Chaves, 2024; Tkalic et al., 2024). Distinct organisational configurations, communication patterns and degrees of autonomy across modalities shape how employees evaluate fairness, inclusion and trust (Edmondson, 1999; Newman et al., 2017; Tang and Vandenberghe, 2021). Although onsite work may facilitate interpersonal interaction and team cohesion, hybrid and remote arrangements may provide employees with greater flexibility, autonomy and work–life balance, factors that are positively associated with perceptions of decent work and psychosocial well-being (Ivasciuc et al., 2022; Pereira et al., 2026). In particular, hybrid arrangements may combine opportunities for social connection with the benefits of flexibility, potentially creating more favourable conditions for perceptions of decent work and psychological safety. As such, the following hypotheses were formulated:

Hypothesis 2: Employees working onsite will report lower perceptions of decent work than those working in other modalities (i.e. remote and hybrid work).

Hypothesis 3: Employees working onsite will report lower levels of psychological safety than those working in other modalities (i.e. remote and hybrid work).

Differences in communication, visibility and access to support across onsite, hybrid and remote work arrangements may affect how structural job conditions shape relational experiences (Clarke et al., 2025a). These contextual variations suggest that work modality may also condition the extent to which decent work promotes psychological safety (Ferraro et al., 2018; Huang et al., 2022). Thus:

Hypothesis 4: Work modality moderates the strength of the relationship between decent work and psychological safety.

The role of sector of activity in shaping perceptions of decent work and psychological safety

The sector of activity in which employees are embedded represents an important contextual factor influencing work experiences. Employment in services and industry entails distinct organisational structures, contractual arrangements, job demands and access to resources (Ding et al., 2020). The service sector is typically characterised by flexible, networked organisational forms that rely on diverse, often temporary employment relations, reflecting its client-oriented and adaptive nature (Ambrosini, 2018; Kreye, 2021; Sargeant, 2006; Taylor et al., 2016). In contrast, industrial organisations tend to follow more hierarchical and standardised structures that emphasise efficiency, stability and long-term employment relationships, although outsourcing and service integration are increasingly common (Ding et al., 2020; Mondal et al., 2025). Furthermore, job demands and resources differ considerably between these sectors: service work involves intense interpersonal interaction and limited automation potential, whereas industrial work benefits from stronger technological and infrastructural resources that help buffer physical and cognitive strain (Bakker, 2024; Heching and Squillante, 2012; Subramaniam and Krishnaraj, 2015; Van de Ven et al., 2014).

These structural characteristics influence how employees evaluate decent work, particularly regarding remuneration, social protection and development opportunities (Pereira et al., 2023). In the service sector, atypical and project-based employment arrangements are frequent, often involving intermediaries between workers and clients (Ambrosini, 2018; Bidwell and Fernandez-Mateo, 2008). Such flexibility may foster adaptability and skill diversification but can also reduce income stability and limit access to social protection (Heching and Squillante, 2012; Tünte et al., 2011). By contrast, industrial employment usually offers more standardised contracts, predictable career progression and stronger institutional safeguards (Bidwell and Fernandez-Mateo, 2008). As a result, employees in services may value autonomy and learning opportunities, whereas industrial workers tend to prioritise fairness, predictability and structured career development (Peel and Boxall, 2005). Although service-sector employment may involve greater instability and less formal protection, its relational and collaborative nature may simultaneously foster stronger perceptions of interpersonal support, communication and psychological safety, as service work typically relies more heavily on interaction, empathy and employee engagement (Clarke et al., 2026; Joseph and Seshadri, 2025). Accordingly, employees in the services sector may report more favourable perceptions of decent work and psychological safety than those in industrial contexts.

The experience of psychological safety also varies across sectors, as communication practices, hierarchical structures and safety standards shape employees' perceptions of interpersonal risk and trust (Edmondson, 1999; Frazier et al., 2017; Newman et al., 2017). In the services sector, open communication, transparent leadership and emotional intelligence are essential for fostering psychological safety, enhancing well-being and encouraging collaboration (Al Doghan and Juhari, 2025; Clarke et al., 2026; Joseph and Seshadri, 2025). Conversely, industrial environments often display more rigid hierarchies and less fluid communication, which can heighten psychosocial risks unless inclusive and transformational leadership styles are implemented (Ip et al., 2025; Naji et al., 2022). Strong safety protocols and structured communication processes mitigate stress and support performance (Alruqi et al., 2025; Li et al., 2021), while across sectors, supportive leadership and open communication consistently emerge as the most reliable predictors of psychological safety (Cho et al., 2023; Cierniak-Emerych and Golej, 2020; Walsh, 2024).

Beyond explaining mean-level differences, sectoral context may also moderate the relationship between decent work and psychological safety, as structural and cultural conditions within each sector can strengthen or weaken the translation of decent work into feelings of safety (Edmondson et al., 2016; ILO, 2021; Sjöblom et al., 2022). Empirical evidence suggests that decent work enhances psychological safety through fair labour relations, equity and supportive organisational climates (Amponsah-Tawiah et al., 2023; Huang et al., 2022). However, the strength of this relationship varies across sectors depending on trust, leadership style and opportunities for learning and coordination (Lee et al., 2023; Triplett and Loh, 2018). Hierarchical structures in domains such as healthcare, education and remote work can either facilitate or inhibit these mechanisms (Edmondson et al., 2016; Sjöblom et al., 2022). Consequently, sector-specific priorities and organisational cultures shape not only perceptions of decent work and psychological safety, but also the extent to which these constructs reinforce one another. Based on this

reasoning, we hypothesise that the sector of activity influences both perceptions of decent work and psychological safety, as well as the strength of their association.

Hypothesis 5: Employees in the services sector will report higher perceptions of decent work than those in the industry sector.

Hypothesis 6: Employees in the services sector will report higher levels of psychological safety than those in the industry sector.

Hypothesis 7: Sector of activity moderates the strength of the relationship between decent work and psychological safety.

Method

Procedure and sample

Data were collected via LimeSurvey using a non-probability convenience sampling method. Multiple organisations across Portugal were invited to collaborate in disseminating the study to their employees. Participating organisations provided consent and distributed the survey link internally, inviting their staff to participate voluntarily. Access to the questionnaire was conditional upon completing an informed consent form displayed at the beginning of the survey. Only after providing consent could participants proceed to the questionnaire. All responses were collected anonymously, and no personal identifiable information was recorded, ensuring full compliance with ethical standards of confidentiality and data protection.

The final sample comprised 423 employees from various Portuguese organisations. Participants' ages ranged from 18 to 69 years ($M = 35.10$, $SD = 10.92$), with an average organisational tenure of 7.56 years ($SD = 8.19$). Women represented 60.8% of the sample, and men 39.2%. Regarding educational attainment, 2.1% had completed only basic education (up to the 9th grade), 24.4% had completed secondary or vocational education, 48.0% held a bachelor's degree, 23.4% held a master's degree and 2.1% held a doctoral degree. Most participants were employed in the services sector (83.5%), with 15.8% working in industry (three cases missing). The majority held permanent contracts (66.0%), followed by fixed-term contracts (22.7%), service provision arrangements (5.2%), temporary agency work (0.7%) and other contractual forms (5.4%). Concerning work modality, 62.2% reported working exclusively onsite, 10.6% remotely and 27.2% in hybrid arrangements.

Instruments

Decent work. Decent work was assessed using the Portuguese version of the Decent Work Questionnaire (DWQ) developed by Ferraro et al. (2018). This instrument measures workers' perceptions of decent work through 31 items organised into seven dimensions: (1) Fundamental Principles and Values at Work (DW1, 6 items) capture aspects such as justice, dignity, fair treatment, participation and mental health (e.g. 'I am free to think and express my opinions about my work'); (2) Adequate Working Time

and Workload (DW2, 4 items) addresses time management, work–life balance and scheduling (e.g. ‘I consider the average number of hours I work per day to be adequate/appropriate’); (3) Fulfilling and Productive Work (DW3, 5 items) reflects the contribution of work to development and fulfilment (e.g. ‘I consider the work I do to be decent’); (4) Meaningful Remuneration (DW4, 4 items) focuses on the adequacy, fairness and dignity afforded by earnings (e.g. ‘What I earn through my work allows me to live my life with dignity and independence’); (5) Social Protection (DW5, 4 items) concerns security in cases of unemployment, illness or retirement (e.g. ‘I feel that I am protected if I become unemployed’); (6) Opportunities (DW6, 4 items) relates to employability, promotability and future prospects (e.g. ‘Currently, I think there are work/job opportunities for an individual like me’); and finally, (7) Health and Safety (DW7, 4 items) addresses protection from risks and the adequacy of workplace conditions (e.g. ‘Overall, the environmental conditions in my work [temperature, noise, humidity, etc.] are safe and acceptable’). All items were rated on a five-point Likert scale ranging from 1 (strongly disagree) to 5 (strongly agree). In the present study, internal consistency for the overall Decent Work construct was excellent ($\alpha = .95$), with subscale reliabilities ranging from .78 to .93.

Psychological safety. Psychological safety was measured using seven items originally developed by Edmondson (1999) and adapted to the Portuguese context by Ferreira and Rebelo (2017). Participants were instructed to answer the items considering their work team and the extent to which each statement reflected the reality of their team context. Example items include ‘Members of this team are able to bring up problems and tough issues’ and ‘It is safe to take a risk on this team’. Responses were given on a seven-point Likert scale ranging from 1 (strongly disagree) to 7 (strongly agree). In the present study, internal reliability for psychological safety was .77.

Activity sector. In the present study, the activity sector was transformed into a dummy variable (1 = Services sector; 0 = Industry sector).

Work modality. In the present study, work modality was initially measured as a categorical variable with three groups (onsite, remote and hybrid). This categorisation was used for group comparisons (ANOVA). For the moderation analyses, work modality was recoded as a dummy variable (onsite work: 1 = yes; 0 = no; including remote and hybrid work) to estimate interaction effects.

Results

Descriptive statistics and correlations

Table 1 presents the descriptive statistics and bivariate correlations for the study variables. Overall, participants reported moderately positive perceptions of decent work and relatively high levels of psychological safety. In addition, decent work was positively associated with psychological safety, indicating that higher perceptions of decent work are linked to higher interpersonal safety in the workplace. No substantial associations

Table 1. Descriptive statistics and bivariate correlations.

	Mean	SD	1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.	12.
1. Gender	0.61	0.49												
2. Age	35.10	10.92	-.15 ^{***}											
3. Education	7.48	1.54	.17 ^{***}	-.11 [*]										
4. Organisational tenure	7.56	8.19	-.07	.74 ^{***}	-.17 ^{***}									
5. DW1	3.84	0.79	-.15 ^{***}	.04	.01	.00								
6. DW2	3.31	0.98	-.18 ^{***}	.05	-.07	-.01	.63 ^{***}							
7. DW3	3.82	0.77	-.08	.15 ^{***}	.06	.11 [*]	.74 ^{***}	.50 ^{***}						
8. DW4	3.08	1.10	-.25 ^{***}	.22 ^{***}	.02	.10 [*]	.67 ^{***}	.54 ^{***}	.62 ^{***}					
9. DW5	3.06	0.96	-.21 ^{***}	.18 ^{***}	-.05	.10 [*]	.52 ^{***}	.50 ^{***}	.47 ^{***}	.61 ^{***}				
10. DW6	3.62	0.91	-.17 ^{***}	-.13 ^{***}	.02	-.13 ^{***}	.69 ^{***}	.50 ^{***}	.64 ^{***}	.51 ^{***}	.43 ^{***}			
11. DW7	3.97	0.85	-.11 [*]	.02	.06	-.09	.68 ^{***}	.54 ^{***}	.52 ^{***}	.51 ^{***}	.47 ^{***}	.49 ^{***}		
12. Decent Work	3.53	0.72	-.22 ^{***}	.10 [*]	.01	.02	.88 ^{***}	.77 ^{***}	.80 ^{***}	.82 ^{***}	.74 ^{***}	.77 ^{***}	.75 ^{***}	
13. Psychological Safety	5.34	1.08	-.08	.07	.01	.00	.73 ^{***}	.43 ^{***}	.54 ^{***}	.50 ^{***}	.37 ^{***}	.51 ^{***}	.44 ^{***}	.63 ^{***}

Notes. SD = Standard deviation; DW1 = Fundamental Principles and Values at Work; DW2 = Adequate Working Time and Workload; DW3 = Fulfilling and Productive Work; DW4 = Meaningful Remuneration; DW5 = Social Protection; DW6 = Opportunities; DW7 = Health and Safety; ^{***} $p < .01$; ^{**} $p < .05$; gender was transformed in a dummy variable (0 = Men; 1 = Women); age and organisational tenure were measured in years; education was measured as the respondent's highest level of educational attainment and coded as an ordinal categorical control variable with 10 ordered categories. The original coding was: 1 = literate, but without completing the 4th grade; 2 = first cycle of basic education (4th grade); 3 = second cycle of basic education (6th grade); 4 = third cycle of basic education (9th grade); 5 = secondary education (12th grade); 6 = vocational/professional education; 7 = bachelor's degree (pre-Bologna short-cycle undergraduate degree); 8 = bachelor's degree (Portuguese undergraduate degree); 9 = master's degree; 10 = doctoral degree.

were observed between the demographic variables and the main constructs. As no substantial associations were identified, demographic variables were not included in further analyses as control variables.

Confirmatory factor analysis

A confirmatory factor analysis (CFA) was conducted using AMOS 29.0 to examine the measurement model of decent work and psychological safety. The model specified a higher-order latent construct of DW, represented by seven first-order latent dimensions: DW1, DW2, DW3, DW4, DW5, DW6 and DW7. Each first-order factor was measured by its respective observed indicators, consistent with the theoretical structure of the Decent Work Questionnaire (Ferraro et al., 2018). The higher-order Decent Work factor was modelled to load on these seven dimensions, reflecting the assumption that they collectively represent the overarching construct of decent work. In addition, Psychological Safety was modelled as a separate latent construct, measured by seven observed indicators.

The CFA model specified the covariation between the higher-order Decent Work factor and Psychological Safety, thereby allowing the examination of the extent to which these two latent constructs are related. Error terms were included for all observed indicators. The measurement model tested presented an acceptable fit to the data [$\chi^2(652) = 1655.34, p < .01$, SRMR = .06, IFI = .90, CFI = .90, RMSEA = .06].

The measurement model was compared with an alternative model in which all observed indicators load on a single latent variable (i.e. a one-factor model). This alternative model presented a poor fit to the data [$\chi^2(664) = 3775.31, p < .01$, SRMR = .08, IFI = .69, CFI = .68, RMSEA = .11], significantly worse than the measurement model [$\chi^2(12) = 2119.97, p < .01$]. Thus, these results support the proposed measurement model, confirming the multidimensional structure of decent work and its distinction from psychological safety.

Test of hypotheses

The relationship between decent work and psychological safety. A structural equation model (SEM) was estimated using AMOS 29.0 to examine the relationship between decent work and psychological safety. The model demonstrated an acceptable fit to the data [$\chi^2(652) = 1655.32, p < .01$, SRMR = .06, IFI = .90, CFI = .90, RMSEA = .06]. Importantly, Decent Work was positively and significantly related to Psychological Safety ($\beta = .87, SE = .11, CR = 10.50, p < .01$), indicating that employees who perceived higher levels of Decent Work also reported higher Psychological Safety. Thus, Hypothesis 1 was supported.

Work modality as a contextual factor in decent work and psychological safety. A one-way ANOVA was conducted to examine differences in Decent Work and Psychological Safety perceptions across work modalities (onsite, remote, hybrid). For Decent Work, the effect of work modality was statistically significant (Table 2). Post hoc comparisons revealed that employees working in hybrid arrangements reported significantly higher levels of decent work than those working onsite. Differences between remote workers

Table 2. Means, standard deviations and one-way ANOVA results for decent work and psychological safety by work modality.

Variables	Decent Work	Psychological Safety
Work modality	M (SD)	M (SD)
Onsite (<i>n</i> = 263)	3.42 (0.68)	5.23 (1.09)
Remote (<i>n</i> = 45)	3.56 (0.86)	5.33 (1.12)
Hybrid (<i>n</i> = 115)	3.77 (0.69)	5.61 (1.00)
ANOVA	$F(2, 420) = 10.02, p < .01, \eta^2 = .05$	$F(2, 420) = 5.13, p < .01, \eta^2 = .02$

Note. Values are presented as *M* (*SD*). η^2 = eta squared effect size.

and the other groups were not statistically significant. Thus, Hypothesis 2 was partially supported.

For Psychological Safety, a significant effect of work modality also emerged (Table 2). Post hoc tests indicated that hybrid workers reported significantly higher psychological safety than onsite workers, while no significant differences were found for the remote group. Therefore, Hypothesis 3 was partially supported.

To test whether the relationship between Decent Work and Psychological Safety was moderated by work modality (Hypothesis 4), we used the PROCESS macro for SPSS (version 4.3; Hayes, 2022), employing Model 1. This approach allows testing of the conditional effects of a predictor (*X*) on an outcome (*Y*) as a function of a moderator (*W*). In the present model, Decent Work (*X*) was specified as the predictor, Psychological Safety (*Y*) as the outcome, and work modality (onsite vs others) as the moderator.

Results indicated a significant main effect of Decent Work on Psychological Safety ($b = 0.95, SE = 0.06, t = 14.69, p < .001$), such that higher perceptions of Decent Work were associated with higher Psychological Safety. However, the interaction term between Decent Work and work modality was not significant ($b = 0.03, SE = 0.14, t = 0.19, p = .85$), suggesting that the strength of the relationship does not differ significantly across modalities. Therefore, Hypothesis 4 was not supported.

The role of sector of activity in shaping perceptions of decent work and psychological safety. Independent samples *t*-tests were conducted to examine sector differences in Decent Work and Psychological Safety (Table 3). For Decent Work, the results indicated that employees in the services sector reported significantly higher levels of perception than those in industry (Table 3). Thus, Hypothesis 5 was supported.

For Psychological Safety, a similar pattern emerged (Table 3). Employees in the services sector reported significantly higher levels of psychological safety than employees in industry. Therefore, Hypothesis 6 was supported.

To test whether the relationship between Decent Work and Psychological Safety varied across sectors of activity (Hypothesis 7), we conducted a moderation analysis using the PROCESS macro for SPSS (version 4.3; Hayes, 2018), specifying Model 1. In this model, Decent Work (*X*) was included as the predictor, Psychological Safety (*Y*) as the outcome, and sector (services vs industry; *W*) as the moderator.

Table 3. Means, standard deviations and independent samples *t*-tests for decent work and psychological safety by sector of activity.

Variables	Decent Work	Psychological Safety
Sector of activity	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)
Services (<i>n</i> = 353)	3.57 (0.73)	5.41 (1.05)
Industry (<i>n</i> = 67)	3.31 (0.59)	4.99 (1.14)
<i>t</i> -test	<i>t</i> (418) = 2.76, <i>p</i> < .01, <i>d</i> = 0.71, 95% CI [0.07, 0.45]	<i>t</i> (418) = 2.97, <i>p</i> < .01, <i>d</i> = 1.06, 95% CI [0.14, 0.70]

Note. Values are presented as *M* (*SD*). Cohen's *d* = standardised mean difference effect size.

The results showed a significant main effect of Decent Work on Psychological Safety (*b* = 0.94, *SE* = 0.06, *t* = 16.11, *p* < .01), confirming that employees who reported higher levels of decent work also perceived greater psychological safety. However, the interaction term between Decent Work and sector was not significant (*b* = −0.25, *SE* = 0.19, *t* = −1.33, *p* = .19), indicating that this relationship does not differ between employees in the services and industry sectors. Thus, Hypothesis 7 was not supported.

Discussion

The present study examined the relationship between decent work and psychological safety, as well as the moderating effects of work modality and sector of activity. Consistent with Hypothesis 1, results revealed a strong and positive association between perceptions of decent work and psychological safety. This finding aligns with Social Exchange Theory (Blau, 1964) and Conservation of Resources Theory (Hobfoll, 1989), which suggest that organisational fairness, stability and support function as critical resources that foster trust and interpersonal confidence. When employees perceive that their organisation values dignity, equity and security, they reciprocate by being open, collaborative and authentic, thereby reinforcing collective trust and strengthening psychological safety.

Empirical studies have shown that decent work enhances employee well-being, satisfaction and commitment (Amponsah-Tawiah et al., 2023; Anlesinya et al., 2021; Blustein et al., 2023; Ferraro et al., 2018; Huang et al., 2022). Psychological safety, in turn, is a well-established predictor of learning, creativity and team performance (Dong, 2024; Edmondson, 1999; Frazier et al., 2017). The current findings extend this evidence by empirically linking the structural attributes of decent work with the relational processes that sustain safe interpersonal climates. Decent work, therefore, operates as both a condition for well-being and a mechanism for fostering collective efficacy and trust.

Regarding work modality, the results partially supported Hypotheses 2 and 3. Employees working in hybrid arrangements reported higher levels of both constructs than those working exclusively onsite. This result may reflect the dual advantage of hybrid work, which combines flexibility and autonomy with opportunities for social interaction and organisational support. Prior research indicates that hybrid work arrangements can improve work–life balance and mitigate stress through greater control over

schedules and personal boundaries (Ivasciuc et al., 2022; Pereira et al., 2026), while regular in-person contact promotes communication and cohesion (Nembhard and Edmondson, 2006). Hybrid configurations may therefore offer particularly favourable conditions for maintaining inclusion and fairness without some of the relational challenges that may emerge in fully remote contexts (Nikiforova et al., 2023; Radu et al., 2023).

At the same time, recent research suggests that hybrid and remote work arrangements may also introduce challenges for psychological safety, particularly due to reduced informal interactions and greater reliance on mediated communication, which can affect trust and interpersonal openness (Potter and Ross, 2023; Tkalic et al., 2024). In this sense, the higher levels of psychological safety observed in hybrid arrangements in the present study may reflect a balance between flexibility and opportunities for face-to-face interaction, which helps sustain the relational conditions necessary for psychological safety.

However, work modality did not moderate the relationship between decent work and psychological safety (Hypothesis 4). The principles of fairness, opportunity and protection appear to exert a consistent influence on trust and openness, independent of the physical or virtual work environment. This highlights that organisational culture and perceived justice are the primary determinants of interpersonal safety.

Sectoral differences were observed in line with Hypotheses 5 and 6. Employees in the services sector reported significantly higher perceptions of both decent work and psychological safety than those in industry. This finding can be interpreted in light of the higher interpersonal demands and communicative intensity of service work, which naturally promote climates of interaction, empathy and support (Clarke et al., 2026; Joseph and Seshadri, 2025). Industrial contexts, which tend to privilege control and standardisation, may offer less latitude for employee voice and participative decision-making (Ding et al., 2020; Mondal et al., 2025). Service workers, by contrast, are more exposed to relational and emotional labour, making psychosocial safety and fairness more salient to their sense of dignity and inclusion (Ambrosini, 2018; Sargeant, 2006).

Nevertheless, the sector did not moderate the relationship between decent work and psychological safety (Hypothesis 7). This indicates that, despite contextual variations, the underlying mechanism linking fairness, protection and trust is generalisable. Across both sectors, perceiving work as decent fosters confidence, openness, and interpersonal respect. These findings support a multidimensional conception of employment quality, in which decent work provides the structural foundation for well-being, and psychological safety constitutes its relational manifestation within the organisational context.

Theoretical implications

This study advances theoretical understanding in several ways. It empirically integrates two research domains that have traditionally evolved separately: decent work and psychological safety. By demonstrating their interdependence, the study expands the conceptualisation of employment quality to include both structural and relational dimensions. It also reinforces the explanatory power of Social Exchange Theory and Conservation of Resources Theory by showing how fairness, security and opportunity translate into interpersonal trust and collective engagement (Bailey et al., 2020; Russo et al., 2016).

Furthermore, the consistent relationship across work modalities and sectors supports the universality of the link between decent work and psychological safety, suggesting that these constructs reflect fundamental aspects of human motivation and organisational functioning. The validated higher-order measurement of decent work also contributes to the ongoing refinement of this construct, supporting its multidimensional stability across contexts and enhancing its utility for future comparative research.

Practical implications

Practically, the results emphasise that promoting decent work is not only a moral or legal imperative but also a strategic lever for enhancing psychological safety. Organisations should prioritise transparent communication, fair treatment and equitable workload distribution to foster trust and openness. Human resource policies that encourage employee participation, recognition and development opportunities can help build inclusive and psychologically secure environments (Edmondson et al., 2016; Huang et al., 2022).

In hybrid or remote settings, attention should be given to equitable access to information and inclusion in decision-making, as disparities in visibility can undermine safety and cohesion. In the services sector, leadership development focused on empathy and emotional intelligence can further strengthen psychological safety, while industrial organisations may benefit from simplifying hierarchies and improving bidirectional communication channels. Implementing decent work principles across modalities and sectors can therefore enhance well-being, innovation and retention.

Limitations and future studies

While this study makes significant contributions, several limitations should be considered. First, the cross-sectional design of the study precludes causal inferences regarding the relationship between decent work and psychological safety. Future studies should utilise longitudinal or experimental designs to assess the temporal order of these constructs and observe how they develop over time.

Secondly, all variables were measured using self-report instruments, which introduces the possibility of common method bias. Although confirmatory factor analysis and tests for discriminant validity address this concern to some extent, future research could benefit from using multi-source data, behavioural indicators, or ratings from supervisors and team members regarding psychological safety to enhance the validity of the findings.

Thirdly, the sample was obtained through convenience sampling, which may not be fully representative of the Portuguese labour market. The uneven distribution across sectors, particularly the smaller number of participants from the industrial sector, may limit the generalisability of the results. Moreover, the study did not assess differences between part-time and full-time employment arrangements, which may represent an important contextual factor influencing perceptions of decent work and psychological safety. Future research should strive for more balanced samples or conduct stratified analyses across different industries.

Finally, although this study acknowledges the importance of contextual factors, it does not explicitly model key relational mechanisms such as leadership behaviours,

which have been consistently identified as central antecedents of psychological safety, particularly in shaping interpersonal trust and voice within teams. Additionally, although participants were instructed to respond considering their work team, the study did not control for differences in team structure or the extent to which participants worked in formally defined teams. Future research could therefore examine how leadership interacts with structural work conditions, such as decent work, in shaping psychological safety. Future studies could also adopt more clearly bounded team-level designs to strengthen construct specificity and cross-level interpretation. Qualitative or mixed-method approaches could also offer deeper insights into how structural conditions influence interpersonal climates.

ORCID iD

Susana Alves Pereira  <https://orcid.org/0000-0002-6483-1896>

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Author biographies

Susana Alves Pereira is an Assistant Professor at the University of Maia. She is an integrated researcher at NECE, University of Beira Interior. Her research focuses on work and organisational psychology, namely decent work, work motivation, psychological safety, work–family balance, work engagement, well-being and values-based interventions, with publications in international journals.

Sílvia Lopes is an Assistant Professor at FPCE, University of Coimbra. She is an integrated researcher at CICPSI at the University of Lisbon and is affiliated with CINEICC at the University of Coimbra. Her research focuses on work and organisational psychology. She has an extensive publication record in international journals.

Anabela Rodrigues is an Assistant Professor and researcher in work and organisational psychology at Universidade Católica Portuguesa, Braga. Her teaching, research and professional training focus on occupational stress, burnout, leadership, emotional intelligence, social support, emotional labour and related organisational psychology topics.

Vânia Sofia Carvalho is Assistant Professor at the Faculty of Psychology, University of Lisbon. She is a member of the CICPSI at the University of Lisbon. Her research focuses on work–life intersectionality, boundary management, job design and organisational supportive cultures to advance employees’ well-being.