

Mediating Effect of Safety Climate on Occupational Safety Management and Employee Performance

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ABSTRACT

Introduction: Occupational Safety Management (OSM) is crucial for workplace safety, especially in high-risk industries. While a positive Safety Climate (SC) promotes safe behaviour and boosts Employee Performance (EP), its mediating role between OSM and EP remains underexplored in the FMCG (Fast Moving Consumer Goods) sector. This study examines the mediating role of Safety Climate (SC) in the relationship between Occupational Safety Management (OSM) and Employee Performance (EP). It seeks to determine how effective OSM practices influence SC and, in turn, enhance employee performance within organisational settings. **Methods:** This mixed-method study combines quantitative surveys and qualitative interviews, collecting data from 460 FMCG manufacturing employees. A 5-point Likert scale was used to measure OSM, Safety Climate, and EP. Structural Equation Modelling (SEM) using AMOS and SPSS tested relationships and mediation effects. Reliability was confirmed with a Cronbach's Alpha of 0.875. **Results:** Structural Equation Modelling showed that OSM positively impacts Safety Climate ($\beta=0.76$), which in turn enhances EP ($\beta=0.37$). OSM also directly influences EP ($\beta = 0.47$). The mediating role of the Safety Climate was confirmed (indirect effect, $\beta = 0.277$, $p = 0.000$) and validated using the bootstrap method (5,000 samples). **Conclusion:** The study confirms that Safety Climate significantly mediates the relationship between OSM and EP. Enhancing the Safety Climate through leadership, engagement, and training can boost employee performance. The findings offer valuable insights for improving safety and productivity in the FMCG sector.

Keywords: employee performance, manufacturing industry, occupational safety management, safety climate

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INTRODUCTION

Commitment to implementing OSM drives the organisation's safety protocols. Higher levels of commitment to OSM arise when individuals have specific motives and a strong dedication to work safety (Suherdin, et al., 2021). A strong safety culture or climate, supported by top management of the company or top leadership commitment, enhances

organisational safety and productivity (Wisdom and Creswell, 2013). Organisations must perform routine risk assessments to stop accidents and manage wellness programs that support the physical and mental health requirements of employees (Joshi, 2020). Employee involvement in safety practices is essential, as it fosters responsibility and proactive safety behaviours (Ng et al., 2024). According to ILO Convention No. 155, employers must analyse hazards before implementing measures to create safe premises (ILO, 2022). Staff safety training, together with essential workplace equipment, falls under legal obligations established by both the Labour Act 2017 and the OSH Act 1999 in Nepal's Ministry of

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Labour. Workers in manufacturing companies from Telangana, India, demonstrate significant positive awareness levels in workplace safety and show a substantial positive correlation between their safety awareness and practices (Ng, Pinakapani Peri, et al., 2025).

Several aspects of the occupational safety climate demonstrate direct positive relationships to education level, including organisational trust, work safety priority areas, and managerial capabilities in safe production practices (Syaiful et al., 2023). The literature review confirms that organisations with successful safety climates achieve both better occupational safety results and lower incident rates, and increased productivity or employee performance (Hussein, 2016). The research papers reviewed by Bin-Husayn, Abdullah, and Rimmel (2025) show that risk perception and risk management are positively related, suggesting that people with higher risk perception tend to adopt more risk-averse strategies when performing operations in the industry (Bin-Husayn et al., 2025). Leaders with high inspirational motivation urge employees to obey safety rules while also backing the training participation of the employees with positive energy and proactive participation (Moon, 2024).

Employee performance directly relates to the degree of safety management practices established in workplace settings. A supportive safety climate enhances employee safety participation and compliance with occupational safety policies through employee behaviours, leading to improved employee performance (Brahmasari and Mujanah, 2018). The study identifies safety climate as a mediator between OSH management and employee performance, along with demonstrating that a positive safety climate boosts both job satisfaction and productivity of the employee (Adhika et al., 2020).

The implementation of a well-designed OSM system substantially improves the safety climate in manufacturing and mining by reducing accidents and increasing employee satisfaction, according to Hussein (2016). Scientific research has shown both immediate and secondary effects that OSM creates on employee performance. A properly developed OSM framework provides risk reduction alongside good employee satisfaction, which yields higher employee job performance and commitment towards the work (Bayram, 2018; Adhika et al., 2020). Employees tend to perform far better in terms of work performance and safety performance when they feel their safety is prioritised by the

top management or leaders. Additionally, they also follow the safety policies and protocols with higher efficiency (Bergh et al., 2013; Baertschi et al., 2018). Analysis shows that employee performance improves when the safety climate is strong because it acts as a mediator between OSM and employee outcomes (Corso, 2008; Vinodkumar and Bhasi, 2010; Braunger et al., 2013). Safety climate serves as a vital mediation force between OSM and employee work performance, according to Putri, Triatmanto, and Setiyadi (2018) and Zgair, Makhbul, Abdullah, and Omar (Putri et al., 2018; Zgair et al., 2023). Such an anticipatory, safety-focused organisational culture simultaneously safeguards employees while boosting their overall productivity since they become focused on their work and free from concerns about workplace safety risks and hazards (Corso, 2008; Baertschi et al., 2018).

Research Gap and Motivation for the Study

Previous research across different countries has established that Occupational Safety Management (OSM) and Safety Climate play crucial roles in reducing accidents, strengthening compliance, and enhancing Employee Performance (EP) (Corso, 2008; Vinodkumar and Bhasi, 2010; Khan, 2019). Studies have also shown that a strong safety climate, supported by leadership commitment, improves job satisfaction, productivity, and employee participation in safety practices (Adhika et al., 2020; Ng, P Peri, et al., 2025). However, these findings primarily originate from developed or rapidly industrialising economies, where organisational structures and safety infrastructures are more advanced.

In contrast, Nepal's manufacturing sector faces unique challenges such as outdated machinery, insufficient safety infrastructure, weak enforcement of occupational safety laws, and inconsistent implementation of safety management systems (Joshi, 2020). While some local research has examined worker awareness and general safety practices, there is limited empirical evidence on how OSM translates into improved employee performance through the mediating role of Safety Climate. This knowledge gap restricts the development of integrated safety strategies tailored to Nepal's industrial context.

The present study addresses this gap by examining Safety Climate as a mediator between OSM and EP in Nepal's manufacturing industries. By doing so, it extends the theoretical understanding of the role of the safety climate beyond its direct

effects to its indirect, mediating influence while also contributing practical insights for policymakers and managers. This research is therefore both timely and novel, as it provides context-specific evidence that can guide the design of stronger safety programs to improve workplace safety outcomes and enhance employee productivity in Nepal.

METHODS

This research design combines quantitative and qualitative research methodologies to examine the problem. The researchers selected this approach because they required detailed information that individual research methods could not adequately provide. Creswell explains that this methodology enables researchers to combine quantitative survey results with qualitative interview responses, thereby obtaining a comprehensive perspective on the research issue (Wisdom and Creswell, 2013). The research utilises both primary and secondary data collection methods. The data collection process depended on structured questionnaires using 5-point Likert-scale responses (rated from Strongly Disagree-1 to Strongly Agree-5) alongside personal interviews and observation of FMCG operations within Bagmati Province in Nepal. The research tool included a questionnaire that evaluated Occupational Safety Management (OSM) as well as Safety Climate (SC) and Employee Performance (EP). These variables were selected because they are significant for safety and performance in manufacturing industries. The preliminary segment of the questionnaire captures demographic information about age, gender, educational background, job role, and duration of work, along with department, for investigating worker safety perception and practice relationships based on different demographics. The second part examines workplace safety requirements through an evaluation of safety climate and occupational safety management (OSM) together with employee performance analysis, which pertains to the FMCG industries. The survey contains 76 questions that methodically assess occupational safety strategies, barriers, and optimisation possibilities throughout the manufacturing industry of Bagmati.

The data collection process was carried out from March 2023 to July 2023. Ethical considerations were strictly adhered to throughout the study, including obtaining informed consent, maintaining confidentiality, and ensuring participants' privacy and

safety. The ethical guidelines followed align with those outlined by Resnik (2020) and the American Psychological Association (APA, 2020). Ethical conduct throughout the study has been maintained in accordance with the guidelines of the GITAM research cell. Sampling for this research was done using stratified random proportion-based sampling, ensuring that participants represented a cross-section of the workforce, from operators to management. This method improved the generalizability of the study's findings across the FMCG sector. To calculate the sample size for an unknown population, the following proportion-based formula is used and is given by:

$$n = \frac{Z^2 \cdot p \cdot (1 - p)}{E^2}$$

Where $Z=1.96$ (Z-value corresponding to a 95% confidence level), $P=0.5$ (the estimated proportion of the population), and $E=0.05$ (The margin of error).

$$n = \frac{1.96^2 \cdot 0.5 \cdot (1 - 0.5)}{0.05^2}$$

$$\frac{0.9604}{0.0025}$$

$$= \approx 385$$

This yielded a required sample size of 385 respondents, ensuring statistically significant results at a 95% confidence level. However, a total of 460 participants were involved in this study. The overall reliability of the data has been tested using Cronbach's Alpha value, which is found to be 0.875. Looking at the individual Cronbach's alphas, the OSM has 0.717, SC has 0.821, and EP has 0.785. All these values are greater than the normal acceptable value of 0.7; from this indicator, it is concluded that the gathered data is reliable and valid.

H1: Safety Climate (SC) mediates the relationship between Occupational Safety Management (OSM) and Employee Performance (EP).

This proposed hypothesis was tested using structural equation modelling. To check the fit of the SEM that is proposed above, key parameters like multicollinearity, Composite Reliability (CR), Average Variance Extracted (AVE), HTMT Ratio, CFI, RMSEA, GFI, NFI, Conditional value, eigenvalue, etc, were checked. The statistical analysis was conducted using IBM SPSS and AMOS, employing methods such as descriptive

analysis, structural equation modelling, and multiple regression analysis to test the hypotheses. These analyses examined the relationships between OSM practices, safety climate, and employee performance, shedding light on key factors influencing workplace safety and employee outcomes. This comprehensive methodological approach was crucial in uncovering significant relationships between occupational safety management practices, safety climate, and employee performance, providing valuable insights into enhancing occupational safety standards in the FMCG sector of Bagmati Province, Nepal.

RESULTS

Demographic Characteristics

The demographic characteristics of this study are presented in Table 1. The demographic profile of responding participants describes the complete picture of the subjects under research. The primary age segment among respondents is participants aged 35-45 (38.5%), with a mean age of 2.58 ± 0.922 . Male respondents comprise most of the survey group (68.9%), according to the gender breakdown, while having a mean gender value of 1.31 ± 0.463 . Most participants hold a bachelor's as their highest educational level (28.7%), while the mean education level totals 2.785 ± 1.1750 . According to our data, the most participants are Workmen/Operators (45.7%) and Supervisors/Executives (27.6%), with a mean employment role value of 1.89 ± 0.970 . Most participants have experience spanning 10–20 years, constituting the largest respondent group at 34.6% according to the results, while their collective experience category mean is 2.304 ± 1.0004 . The two main industries covered by the study consist of Food services, which make up 48.3% of the sample, while Beverages comprise 34.8%. Most employees at the workplace belong to the Production department (41.1% of the total), followed by the Maintenance department (15.0%) and Quality Assurance department (14.6%).

Table 1. Demographic Characteristics

Demographic Characteristics	Frequency (N)	Percentage (%)
Age Group		
18-25 Years-1	63	13.7
25-35 Years-2	144	31.3
35-45 Years-3	177	38.5

45 Years &Above-4	76	16.5
Total	460	100.0
Mean ±SD	2.58 ±0.922	
Gender		
Male-1	317	68.9
Female-2	143	31.1
Total	460	100.0
Mean ±SD	1.31 ±0.463	
Education Level		
Literate-1	99	21.5
SEE/SLC-2	80	17.4
Intermediate-3	102	22.2
Bachelor's Degree-4	132	28.7
Master's Degree & Above-5	47	10.2
Total	460	100.0
Mean ±SD	2.785 ±1.1750	
Employment Role		
Workmen/ Operator-1	210	45.7
Supervisor/ Executive-2	127	27.6
Officer/ Engineer/ Asst. Manager-3	88	19.1
Managers and above-4	35	7.6
Total	460	100.0
Mean ±SD	1.89 ±0.970	
Experience in years		
Less than 5 years- 1	127	27.6
5-10 years- 2	120	26.1
10-20 years- 3	159	34.6
20 years and above- 4	54	11.7
Total	460	100.0
Mean ±SD	2.304 ±1.0004	
Product type in your Industry		
Beverages	160	34.8
Food	222	48.3
Stationery	36	7.8
Dairy	42	9.1
Total	460	100.0
Department		
Production	189	41.1
Stores and Dispatch	50	10.9
Admin Support	40	8.7

Maintenance	69	15.0
Quality Assurance	67	14.6
Utilities	45	9.8
Total	460	100.0

Descriptive Analysis

Survey data from 460 respondents were used to assess their views on SC, OSM, and EP, with responses measured on a 5-point Likert scale (1 = Strongly Disagree, 5 = Strongly Agree). Survey participants agreed to a limited extent that management values (SC1: Mean = 3.67), while noting that safety communication was effective (SC2: Mean = 3.64). Responses towards safety practices (SC3: Mean = 3.50), safety training (SC4: Mean = 3.37) and safety equipment (SC5: Mean = 3.45) fell within the neutral range. The data indicate employees maintain a mixed attitude about organisational safety climate, especially regarding safety training and equipment availability. According to re-search data, the majority of participants ex-pressed neutrality toward Occupational Safety Management aspects, including management commitment and leadership (OSM1: Mean = 3.21), employee empowerment and engage-ment (OSM2: Mean = 3.33), and the effec-tiveness of the Occupational Safety and Health

(OSH) policy (OSM3: Mean = 3.26). Employees gave moderate agreement to risk management effectiveness (OSM4: Mean = 3.59) and system audits (OSM5: Mean = 3.48). These results indicated moderate safety management practice perceptions but showed potential for enhancing leadership and policy implementation. The participants displayed neutral views toward their performance of assigned tasks (EP1: Mean = 3.18) and somewhat agreed with adaptive performance requirements (EP2: Mean = 3.64) because of their adaptability to changing situations. Em-ployee ratings indicated neutrality when eval-uating their contextual performance (EP3: Mean = 3.4), which includes both teamwork and organisational citizenship contributions. Employee performance maintained an aver-age level overall, yet adaptive performance showed the highest capability during evalua-tion. All constructs scored moderately in the evaluation yet showed significant response differences (standard deviations exceeding 1) across the entire study group. The organisa-tion needs to focus on improving safety train-ing, along with enhancing both managerial safety commitment and providing support for employee task performance enhancement. The research data will assist in developing strategies for enhancing safety practices and workforce performance in the organisation.

Table 2. Descriptive Analysis of The Gathered Data

Construct	Variables	Mean	Std. Deviation
Safety Climate (SC)	Management Values (SC1)	3.67	1.179
	Safety Communication (SC2)	3.64	1.097
	Safety Practice (SC3)	3.5	1.169
	Safety Training (SC4)	3.37	1.042
	Safety Equipment (SC5)	3.45	1.01
Occupational Safety Management (OSM)	Management Commitment and Leadership (OSM1)	3.21	1.158
	Employee Empowerment and Engagement (OSM2)	3.33	0.922
	OSH Policy (OSM3)	3.26	0.853
	Risk Management (OSM4)	3.59	1.072
	System Audits (OSM5)	3.48	1.137
	Task Performance (EP1)	3.18	1.114
Employee Performance (EP)	Adaptive Performance (EP2)	3.64	1.16
	Contextual Performance (EP3)	3.4	0.92

Structural Equation Modelling

The analysis of multicollinearity shows that all examined variables satisfy the recom-mended thresholds since their tolerance measures exceed 0.1

and their VIF measures stay below 10. The majority of condition in-dices stay below 15, yet some minor variables barely cross this threshold while still falling within the acceptable range of 30. This indicates that

minimal multicollinearity factors exist in the dataset. Furthermore, the measurement model demonstrated acceptable reliability ($CR > 0.7$) and discriminant validity ($HTMT < 0.85$), with AVE values marginally acceptable. All essential indicators demonstrate that the structural equation model fits perfectly. Fitting measurements of the structural model demonstrate high suitability through a normed chi-square ratio of 1.863 that stays below the 3 thresholds. The data matches well with the required standards due to the Goodness-of-fit index (GFI) reaching 0.965. All fit indices indicate excellent model adequacy, as their values exceed the recommended threshold of 0.90. The list includes CFI (0.978), NFI (0.954, IFI (0.978), TLI (0.971), and RFI (0.939). Model efficiency and simplicity can be validated based on the acceptable levels of parsimony indices with PGFI = 0.626, PCFI = 0.74, and PNFI = 0.722. The model demonstrates an excellent fit because both the standardised root mean square residual and the root mean square error of approximation values (0.0326 and 0.043, respectively) fall under their proposed thresholds (0.08 and 0.05). These fit indices support the conclusion that the SEM model provides a robust and satisfactory fit, establishing it as an approved framework for measuring variable interrelationships. These results confirm the suitability of the constructs for further structural analysis. The Occupational Safety Management (OSM) relationship with Safety Climate (SC) shows a positive influence (0.76) while both elements drive Employee Performance

(EP), OSM directly influences the employee performance by the factor (0.47) and Safety Climate influences the employee performance by the factor (0.37). Effective safety management strengthens the safety climate according to data that show a positive correlation between OSM and SC (0.76). Employee performance improves through a safe climate, which has an effect of +0.37 on EP. According to the proposed model, OSM functions as an essential component that develops better safety climate conditions, resulting in improved employee performance. Research needs to progress by analysing new influencing elements that will enhance these relationships. The Safety Climate functions as a mediator to explain the relationship between OSM and EP through SEM analysis, where the findings are shown in Table 3.

The research aims at establishing the mediating role of the Safety Climate in the relationship between Organisational Safety Management (OSM) and Employee Performance

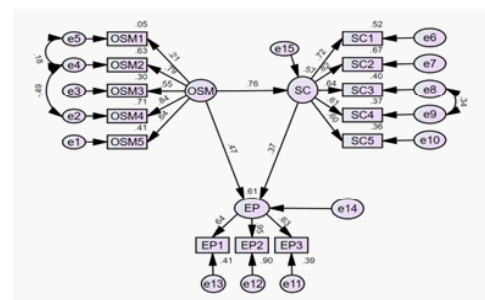


Figure 1. Structural Equation Model

Table 3. Mediating Effect of Safety Climate between OSM and EP

Mediating Effect of SC					
Construct		Construct	Standardised indirect effect	Two-tailed significance using Bootstrap	Status
OSM	<	EP	0.277	0.000	Rejected the Null Hypothesis

As a result of the evaluation, it is found that the standardised indirect effect of OSM on EP through Safety Climate is equal to 0.277. This shows the first-order mediation, where OSM practices indirectly affect the Safety Climate, and this affects EP. This concrete indirect effect shows high statistical significance (two-tailed p-value = 0.000) based on bootstrap in AMOS SEM with 5,000 bootstrapped samples and their 95% bias-corrected confidence intervals, confirming that the distributive channel relationship is not coincidental.

Thus, the present study supports the position that Safety Climate plays a significant mediating role in the relationship between the strength of OSM and levels of EP, and underscores the need to promote safety climate within organisations to improve worker performance. To check the mass of these findings, the bootstrap method was used to assess the indirect effect. This method involves taking a random sample with replacement from this data set to generate several simulated samples. To do this, for each of the resampled datasets, the indirect effect

is re-estimated, thereby producing a distribution of these effects. This distribution enables estimations of confidence intervals, and this offers a better framework for significance testing. The bootstrap method minimises problems concerning normality and sample size so that the effectiveness of the statistical analysis is improved. Hence, the null hypothesis is rejected at a 1% level of significance, and the alternative hypothesis is adopted.

DISCUSSION

This research analysed how Safety Climate functions as a mediating factor in the connection between Occupational Safety Management (OSM) and Employee Performance (EP). Multicollinearity was assessed using the Variance Inflation Factor (VIF) and Tolerance values. Based on Kutner et al. (2004), VIF values above 10 indicate problematic multicollinearity. In this study, all VIF values were well below this threshold, with the highest being 2.118 for SC2 (Safety Communication). For example, SC1 (Management Values) had a Tolerance of 0.56 and VIF of 1.786, while OSM1 (Management Commitment & Leadership) showed a Tolerance of 0.901 and VIF of 1.11. The average VIF across all independent variables (SC1–SC5 and OSM1–OSM5) was 1.69, confirming that multicollinearity is not a concern in the model (H. Kutner et al., 2004). Various goodness-of-fit indices were used to assess the overall fit of the structural equation model, which were found to be generally good. The Normed Chi-Square (χ^2/df) value was 1.863, which is within what could be considered an acceptable value of 3. The Goodness of Fit Index (GFI = 0.965) was above the 0.90 cutoff standard (Joreskog and Sorbom, 1984) whereas the Comparative Fit Index (CFI = 0.978), Incremental Fit Index (IFI = 0.978), Normed Fit Index (NFI = 0.954), and Tucker-Lewis Index (TLI = 0.971) were all above the recommended 0.90 cutoff, demonstrating excellent fit (Tucker and Lewis, 1973; Bentler and Bonett, 1980; Bollen, 1986; Bentler, 1990). Likewise, the Relative Fit Index (RFI = 0.939) indicated significant improvement over the null model (Bollen, 1986). Simpler indices, such as PGFI (0.626), PCFI (0.740), and PNFI (0.722), also exceeded acceptable cut-offs (>0.50), suggesting an adequate compromise between model parsimony and fit (Kline et al., 1989). A good model fit was also reflected in SRMR and RMSEA values of 0.0326 and 0.043, respectively, both within recommended

fit thresholds (Browne and Cudeck, 1992; Hu and Bentler, 1999).

Furthermore, to see the mediation effect of the safety climate between occupational safety management and employee performance, a bootstrap sampling method is employed. A Bootstrap analysis used approximately 5000 samples in AMOS SEM and validated an indirect effect of 0.277 from OSM to EP, with Safety Climate as a mediator (Lavender et al., 2011). First-order mediation occurs because OSM enhances the Safety Climate, while the improved Safety Climate results in better EP. Research evidence demonstrates that the good OSM depends on a strong Safety Climate for successful employee performance enhancement. The bootstrap resampling method proved the robustness of the indirect effect results. OSM directly impacts SC and Safety Climate, which, in turn, enhance EP, resulting in a very good employee performance. Therefore, leaders must support Safety Management Systems to get good employee performance. Khan (2019), and Draghici et al. (2022), established safety climate as a mediator linking safety management practices to employee performance. The Centre for Construction Research and Training reported scientific findings from the Colorado School of Public Health showing that employee output improved through site safety implementation (Khan, 2019; Draghici et al., 2022). Additionally, a study conducted in Indonesia found that Safety training enhances workers' knowledge, skills, and attitudes for safe job performance, and most respondents found it beneficial, suggesting that adequate training was provided (Aderilla et al., 2024). Leaders who seek higher employee performance levels should focus on their Safety Management and training programs in the Safety Climate practical area (Taşdemir et al., 2023). The method enables organisations to develop protected environments that enable workers to deliver peak performances effectively (Khan, 2019). Also, the article by Akinbode et al. (2024) highlights major safety issues in Nigerian manufacturing firms, including poor safety gear, lack of training, and weak policy enforcement, urging a stronger safety culture and better compliance to improve worker well-being and the organisation's safety performance. Similarly, A strong safety climate, supported by education, leadership, and digital tools, improves manufacturing safety and productivity by reducing risks and enhancing compliance (Ng, Pinakapani Peri, et al., 2025). A similar result is reported in the article by Moon (2024), which found that

Safety leadership training increased compliance from 80.38% to 95.68% and improved safety climate scores from 3.20 to 3.47, demonstrating its effectiveness in enhancing workplace safety and the organisation's safety performance (Moon, 2024). The study adds to knowledge of the relationship between organisational practices and employee outputs, emphasising the importance of a favourable Safety Climate for achieving a high level of productivity (Syed-Yahya et al., 2022). The study being empirical gives a substantive backing to the postulated role of Safety Climate as a mediator, thus being notably informative for advanced practice and research in the sphere of organisational safety leadership, safety behaviour, and performance management (Draghici et al., 2022). Therefore, this study establishes that there exists a significant relationship between Safety Climate and both the OSM and the EP and calls for the improvement of the mediator factor Safety Climate in organisations to enhance the delivery of optimum performance and productivity by employees, which also aligns with the study (Lee et al., 2019).

Building on this, the mediation effect of Safety Climate extends its impact to shaping industry safety standards and culture (Chen et al., 2021). As safety regulations evolve, a strong Safety Climate has been recognised as essential for effective Occupational Safety Management (OSM) implementation across sectors (Draghici et al., 2022). Recent studies highlight that Safety motivation mediates safety behaviours and safety climate and collective norms, directly influencing team and organisational performance outcomes (Tandibang et al., 2023). Furthermore, safety climate acts as a cultural resource that promotes employee engagement, improves the safety performance, and encourages proactive safety incident reporting with a robust safety management system in the organisation (Otitolaiye et al., 2021). In high-risk and dynamic environments, adaptive safety cultures supported by robust Safety Climate contribute to organisational resilience against emerging hazards (Fung, 2024). Consequently, incorporating Safety Climate into organisational performance metrics improves compliance, fosters continuous improvement in occupational safety, and strengthens employees' ability to identify and mitigate safety-related hazards within organisations (Alamudi, 2023). These insights underscore the strategic importance of Safety Climate as a main mechanism for enhancing safety management and behaviour, with safety-

self-efficacy mediating safety climate and overall organisational success (Zhang et al., 2022).

CONCLUSION

The study confirms that safety climate mediates the relationship between Occupational Safety Management (OSM) and Employee Performance (EP). A significant standardised indirect effect of 0.277 indicates that OSM impacts EP through its influence on the safety climate, which shows the mediating role of Safety Climate (SC). These findings validate the research framework and fulfil the core objective of the study. The study reveals that the proper implementation of OSM generates positive Safety Climate results, which lead to enhanced workplace performance. Organisations need to focus their efforts on developing robust safety programs that create a superior Safety Climate to create safer workplaces, along with enhanced employee performance. These research results support past examinations to prove the necessity of safety cultures in leadership frameworks and employee conduct, and execution management systems. A strong Safety Climate helps organisations create superior work safety standards that boost employee opera

CONFLICT OF INTEREST

It is declared that there are no significant financial, professional, or personal interests that might have affected this article by the authors.

AUTHORS' CONTRIBUTION

SKNG: Conceptualisation, Methodology, Software, Data curation, Writing- Original draft preparation, Software, Validation, Investigation. PP: Visualisation of framework. TC: - Reviewing and Editing.

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