

A Conceptual Paper on the Moderating Role of Coping Self-Efficacy in Preventive Behavior toward Work Stress

Siti Musliha Mohd Idris., Khairunnisa' Yussof., Norashikin Adam

Faculty of Business Management, UiTM Melaka campus Alor Gajah

DOI: <https://dx.doi.org/10.47772/IJRISS.2025.910000346>

Received: 12 October 2025; Accepted: 20 October 2025; Published: 12 November 2025

ABSTRACT

Work-related stress remains a significant work-related health concern affecting employees' psychological well-being and organizational productivity. Despite the growing attention to coping mechanisms, most prevailing studies have emphasized reactive responses to stress rather than proactive prevention. This conceptual paper suggests an integrative framework that combines the Health Belief Model (HBM) and Social Cognitive Theory (SCT) to explain employees' preventive behavior toward work stress. Grounded in these theories, the framework posits that perceived severity and perceived susceptibility key constructs of HBM serve as cognitive motivators of preventive actions. However, the conversion of these perceptions into actual behavior depends on coping self-efficacy, a central construct in SCT, which moderates the relationship between perceived threat and preventive behavior. This model highlights that individual who perceive work stress as serious and personally relevant, and who also believe in their ability to manage stressors, are more likely to engage in proactive coping strategies. The paper contributes theoretically by integrating motivational and efficacy-based perspectives to extend work stress prevention literature and methodologically by offering testable propositions for future empirical validation. Practically, it provides insights for organizations to design interventions that strengthen employees' coping self-efficacy and promote prevention behavior as well as well-being cultures.

Keywords: work stress, coping self-efficacy, perceived severity, perceived susceptibility, preventive behavior, Health Belief Model, Social Cognitive Theory

INTRODUCTION

Work-related stress continues to be one of the most pervasive work challenges in the 21st century, affecting both organizational performance and employee well-being (WHO, 2023; Menardo et al., 2022). The complex and fast-paced nature of modern work intensified by digitalization and blurred work-life boundaries exposes employees to continuous psychological and physiological pressures (Cavicchioli et al., 2025). Likewise, rapid technological change is associated with increased cognitive overload, uncertainty, and time pressure, exacerbating stress (Makowska-Tłomak et al., 2023), promoting preventive behaviors against work stress has become a central focus in work-related health psychology.

Within this area, the Health Belief Model (HBM) offers a framework linking perceived severity and perceived susceptibility to preventive action (Rosenstock, 1974; Champion & Skinner, 2008), and continues to show relevance in contemporary settings (Hüsser et al., 2023; Moradi et al., 2022; Okechukwu & Babatunde B., 2021). However, perceptions alone may not ensure preventive action. The translation from awareness to behavior often depends on self-efficacy, particularly coping self-efficacy (CSE) confidence in one's capacity to manage or prevent stressors (Chesney et al., 2006)). Recent evidence in occupational samples indicates that coping self-efficacy can moderate the link between stress appraisals and outcomes, supporting its interactive role in prevention (Jones et al., 2015; J. Wu et al., 2023)

Despite progress, several conceptual gaps remain. The literature often treats CSE as reactive (stress recovery/burnout mitigation) rather than a proactive catalyst for prevention (Freire et al., 2020), and workplace interventions still underuse theory-driven, integrative models that combine perceptual (HBM) and efficacy-

based mechanisms (systematic reviews and organizational intervention work point to this need (Johari, 2020; H. Li et al., 2025; Rathi & Kumar, 2022)). These gaps motivate an integrative framework explaining why some employees engage in preventive stress behaviors while others do not.

Addressing these gaps, the present conceptual paper aims to develop and justify an integrative model that explains the relationship between perceived threat and preventive behavior of work stress, moderated by coping self-efficacy. Specifically, the objectives of this paper are:

- (1) to examine how perceived severity and perceived susceptibility influence prevention behavior of work stress;
- (2) to conceptualize coping self-efficacy as a moderating variable that strengthens these relationships; and
- (3) to integrate the Health Belief Model and Social Cognitive Theory to provide a comprehensive framework for understanding how motivation (perceived threat) and capability (self-efficacy) jointly drive preventive behavior. By proposing this framework, the paper contributes theoretically to occupational health psychology and practically to stress management strategies aimed at fostering proactive employee well-being.

LITERATURE REVIEW AND THEORETICAL BACKGROUND

Work Stress and Prevention Behavior

Work stress has long been recognized as one of the most significant occupational health concerns globally. According to the World Health Organization (2023), excessive or prolonged work stress negatively affects both mental and physical health, leading to burnout, depression, and reduced organizational performance. The growing demands of the modern workplace intensified by competition, role ambiguity, and continuous technological change have made employees increasingly vulnerable to stress (Cavicchioli et al., 2025). Moreover, the health implications of work-related stress are profound, as numerous studies have linked chronic stress to serious health consequences, including cardiovascular and metabolic disorders (Awaluddin et al., 2022; Kivimäki et al., 2006; Lukan et al., 2022).

Prevention behavior refers to proactive and self-initiated actions that employees undertake to minimize or avoid exposure to potential work-related stressors before they manifest as psychological strain. In the context of workplace well-being, these behaviors include scheduling regular breaks, managing workload, seeking feedback, and engaging in organizational wellness initiatives (Azmi et al., 2022; Bui et al., 2021; Llorens et al., 2022). Such preventive actions reflect a forward-looking approach, emphasizing health maintenance rather than reactive coping once stress occurs. Therefore, prevention behavior toward work stress represents a key outcome of cognitive appraisal and coping self-efficacy within the proposed model.

However, not all individuals experience or respond to work stress in the same way. The concept of preventive behavior has emerged as a proactive approach, emphasizing actions taken before stress becomes harmful. Preventive strategies may include time management, seeking social support, practicing mindfulness, and maintaining work-life balance (Cabrera-Aguilar et al., 2023; Ganster & Rosen, 2013). These behaviors are essential for sustaining long-term psychological well-being and organizational performance. The Health Belief Model (HBM) offers a valuable theoretical framework to explain why some employees engage in preventive behaviors while others do not (Azadi et al., 2025; Khosravizadeh et al., 2021; Valley & Stallones, 2018).

Perceived Severity and Perceived Susceptibility

Perceived Severity

Perceived severity refers to an individual's belief about the seriousness of the consequences of a potential threat in this study, work stress (F. Li et al., 2022; Wongchana & Songthap, 2024). When employees believe that work stress can lead to serious psychological or physical harm, such as burnout, cardiovascular problems, or chronic illness, they are more likely to engage in preventive coping efforts. The Health Belief Model (HBM) posits that individuals who perceive higher severity and susceptibility to health threats are more inclined to

adopt preventive behaviors (Cal & Bahar, 2018; Khamai et al., 2024). In the workplace, recognizing the serious implications of work stress has been linked to improved engagement in stress management and well-being practices (Prasad, 2022; Rangkuti et al., 2024). For instance, meta-analytic and review evidence shows that employees who acknowledge stress as a significant health risk are more responsive to interventions such as mindfulness-based stress reduction and resilience training (Janssen et al., 2018). Moreover, in high-demand workplaces, awareness of the severe consequences of stress such as emotional exhaustion, absenteeism, and reduced work engagement creates a sense of urgency that motivates proactive coping and participation in organizational well-being programs (Araujo-Filho et al., 2023; Ganster & Rosen, 2013). In the workplace, recognizing the serious implications of work stress such as hearing loss from occupational noise exposure where perceived severity predicted prevention intention (Lukan et al., 2022). This awareness thus represents an essential cognitive component shaping preventive work-stress behavior.

Perceived Susceptibility

Perceived susceptibility refers to an individual's belief about their personal vulnerability to a specific condition or threat ((Fathi et al., 2017; Ramdan et al., 2022)). In the setting of work stress, employees who believe they are more likely to experience stress due to high job demands, low job control, or lack of social support may be more motivated to adopt positive coping strategies. According to the Health Belief Model (HBM), individuals who believe they are personally at risk are more inclined to engage in preventive behaviours such as time-management, negotiating workload, or mindfulness practice (Janz & Becker, 1984; Champion & Skinner, 2008). Recent empirical research by Filho et al. (2023) hints that awareness of job-stress risk can influence participation in wellbeing programmes and preventive actions and program participation tends to vary with perceived job stress and organisational. Understanding the risks associated with work stress can be a transformative reagent for employees, encouragement them to engage more actively in well-being initiatives (Fu et al., 2025). Therefore, perceived susceptibility, alongside perceived severity, constitutes a key cognitive element that drives motivation for prevention-oriented behaviour within the workplace.

Coping Self-Efficacy as a Moderating Factor

The construct of coping self-efficacy originates from Bandura's Social Cognitive Theory (1997), which highlights the role of personal beliefs in determining behavioral performance under challenging circumstances. Coping self-efficacy is defined as the individual's confidence in their ability to effectively manage and regulate stressors (Chesney et al., 2006). It differs from general self-efficacy in HBM by focusing specifically on coping processes and emotional regulation.

In the context of work stress, coping self-efficacy acts as a personal resource that moderates how cognitive appraisals translate into preventive behaviors. Recent research by Liu & King (2021) has mentioned that coping self-efficacy positively affects how individuals appraise and respond to stressful situations. Subsequently, according to Kosugi (2021), while risk perception can influence behavioral intentions, it is the self-efficacy and efficacy beliefs related to action that significantly determine whether individuals engage in preventive behaviors. This means that without a belief in their ability to cope effectively, employees may feel overwhelmed by perceived threats and become less likely to act even when they recognize the potential risks involved.

On the other hand, employees with low coping self-efficacy may experience a sense of helplessness even when they recognize the risks of stress (Ren et al., 2018). Additionally, Ngobe (2023) highlights the detrimental impact of low self-efficacy on job burnout, noting that individuals lacking confidence in their coping abilities are more susceptible to experiencing burnout and overall stress. Thus, coping self-efficacy strengthens the positive impact of perceived severity and susceptibility towards preventive behavior, serving as a psychological amplifier that converts cognitive awareness into tangible action.

Integrating Theories: Health Belief Model and Social Cognitive Theory

Integrating the Health Belief Model (HBM) with Social Cognitive Theory (SCT) provides a comprehensive understanding of the psychological mechanisms driving stress prevention behavior.

- HBM clearly explains why employees are motivated to prevent stress through perceptions of severity and susceptibility.
- SCT explains how these perceptions are interpreted into action through coping self-efficacy as a moderating mechanism.

This integration acknowledges that motivation and capability are both essential and important in influencing preventive behavior. As Bandura (1997) emphasized, knowledge of risk alone does not guarantee behavioral change; individuals must believe in their ability to act effectively. Therefore, by combining the motivational dimension of HBM with the self-regulatory mechanisms of SCT, this framework offers a robust theoretical explanation for variability in work stress prevention across employees.

Summary of Literature Review

In summary, existing research highlights the knotted roles of cognitive perception and self-efficacy in shaping employees' preventive responses to work stress. Self-efficacy functions as a psychological buffer, moderating the effects of stressors on well-being and performance (Bandura, 1997; Ganster & Rosen, 2013). Employees who believe in their coping abilities are more likely to engage in preventive actions such as time management and resource seeking before stress escalates. Conversely, low self-efficacy may lead individuals to perceive stress as uncontrollable, reducing proactive behavior.

Alves et al. (2020) demonstrated that individuals who perceive higher risks tend to adopt preventive measures, yet those with weaker self-efficacy view risks as overwhelming and avoid action. Similarly, Wu et al. (2022) found that self-efficacy moderates the link between stress and coping, enhancing emotional resilience and eudaimonic well-being. Together, these studies suggest that while perceptions of stress severity and susceptibility motivate preventive behavior, coping self-efficacy determines whether this awareness translates into action. Despite strong theoretical support, empirical work exploring coping self-efficacy as a moderator in preventive stress behavior remains limited, underscoring the need for further investigation.

Development of Hypotheses and Conceptual Model Justification

Perceived Severity and Prevention Behavior of Work Stress

Perceived severity refers to an individual's belief about the seriousness of the potential consequences of a threat, such as the disadvantageous impact of work stress on one's health and performance (Becker, 1978; Champion & Skinner, 2008). In the workplace, employees who perceive that stress can lead to severe outcomes such as burnout, fatigue, anxiety, and decreased productivity are more likely to engage in preventive strategies in order to mitigate these risks (Ab Aziz et al., 2021; Cookson et al., 2019).

According to the Health Belief Model (HBM), individuals who perceive a condition as serious are more motivated to adopt preventive behaviors (Rosenstock, 1974). Similarly, in occupational contexts, when work stress is perceived as having serious implications for health and job performance, employees are likely to take preventive actions such as time management, self-care, or seeking social support to prevent its occurrence.

Empirical studies strengthen this by Mehraban et al. (2018) and Wongchana & Songthap, (2024) found that higher perceived severity of health threats significantly predicts preventive intentions across multiple behavioral contexts. Translating this to the work environments, employees' cognitive appraisal of the severity of stress aids as a motivational driver for preventive action.

Therefore, it is proposed that:

H1: Perceived severity has a positive relationship with prevention behavior of work stress.

Perceived Susceptibility and Prevention Behavior of Work Stress

Perceived susceptibility refers to the extent to which individuals believe they are personally vulnerable to

experiencing a threat (Rosenstock, 1974; Janz & Becker, 1984). Within occupational settings, employees who view themselves as more likely to experience stress due to workload, role ambiguity, or interpersonal conflicts may be more motivated to adopt preventive coping strategies (Amini et al., 2021; Sukeri et al., 2020).

The HBM posits that perceived susceptibility influences the likelihood of engaging in preventive action. When individuals perceive themselves as highly susceptible to stress, they are more vigilant and proactive in managing their work demands (Champion & Skinner, 2008). Research in occupational health has similarly demonstrated that employees' personal risk perception predicts engagement in stress management and wellness programs (Ganster & Rosen, 2013).

Thus, awareness of one's vulnerability can serve as an internal cue that triggers prevention-oriented behaviors such as pacing work, setting boundaries, or practicing mindfulness.

Hence, the following hypothesis is proposed:

H2: Perceived susceptibility has a positive relationship with prevention behavior of work stress.

Prevention Behavior of Work Stress

Prevention behavior refers to proactive and self-initiated actions that employees undertake to minimize or avoid exposure to potential work-related stressors before they manifest as psychological strain. In the context of workplace well-being, these behaviors include scheduling regular breaks, managing workload, seeking feedback, and engaging in organizational wellness initiatives (Fakharian et al., 2025; Midkiff et al., 2018; Sukohar, 2021). Such preventive actions reflect a forward-looking approach, emphasizing health maintenance rather than reactive coping once stress occurs. Therefore, prevention behavior of work stress represents a key outcome of cognitive appraisal and coping self-efficacy within the proposed model.

The Moderating Role of Coping Self-Efficacy

While perceived severity and susceptibility establish the cognitive foundation for preventive motivation, not all individuals translate these perceptions into preventive behavior. This translation depends largely on coping self-efficacy (CSE) an individual's belief in their capability to manage or prevent stressors effectively (Bandura, 1997; Chesney et al., 2006). According to Social Cognitive Theory (SCT), self-efficacy is a central determinant of behavioral initiation, persistence, and effort, shaping how individuals convert cognitive awareness into adaptive action (Bandura, 2001).

In the workplace, employees with high coping self-efficacy perceive stressors as manageable challenges rather than uncontrollable threats. Such perceptions facilitate proactive coping strategies and emotional regulation, reducing the likelihood of stress escalation (Cabrera-Aguilar et al., 2023). This mindset enables workers to employ problem-focused coping, time management, and resource-seeking behaviors that prevent stress from accumulating. Conversely, employees with low coping self-efficacy often perceive stress as inevitable or overwhelming, which can lead to avoidance, emotional exhaustion, or withdrawal even when they recognize potential stressors.

Empirical evidence supports the interactive and moderating role of self-efficacy in occupational and health contexts. For instance, Morales-García et al. (2023) found that self-efficacy mediates the relationship between resilience and stress outcomes in healthcare workers, while Chesney et al. (2006) demonstrated that individuals with high coping self-efficacy engage more frequently in problem-solving and emotion-focused coping. Likewise, studies using the Job Demands–Resources model show that self-efficacy moderates how cognitive appraisals translate into well-being or strain (Xanthopoulou et al., 2007). Collectively, these findings confirm that self-efficacy strengthens the link between perceived stress threats and preventive behaviors by empowering individuals to act on their cognitive awareness.

Consequently, coping self-efficacy amplifies the effects of perceived severity and susceptibility by enhancing confidence, motivation, and self-regulation in managing work stress. Employees with high self-efficacy are more likely to transform their risk awareness into concrete preventive behaviors such as planning tasks,

seeking feedback, or participating in mindfulness and wellness programs. Conversely, those with lower self-efficacy are more prone to denial or disengagement despite recognizing stress risks.

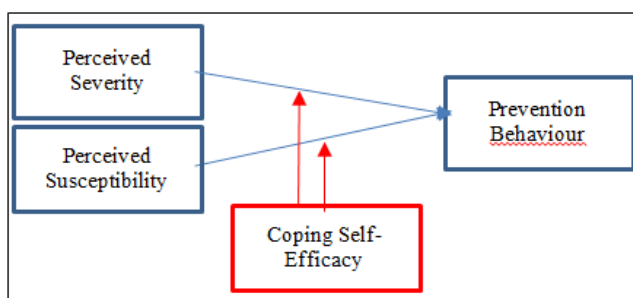
Therefore, the following hypotheses are proposed:

H3: Coping self-efficacy moderates the relationship between perceived severity and prevention behavior of work stress, such that the relationship is stronger for individuals with higher coping self-efficacy.

H4: Coping self-efficacy moderates the relationship between perceived susceptibility and prevention behavior of work stress, such that the relationship is stronger for individuals with higher coping self-efficacy.

The Conceptual Framework

The conceptual model integrates the Health Belief Model (Rosenstock, 1974) and Social Cognitive Theory (Bandura, 1997), positioning coping self-efficacy as a moderating variable that enhances the strength of perceived threat–behavior relationships.



- Perceived Severity and Perceived Susceptibility represent the motivational drivers (from HBM).
- Coping Self-Efficacy represents the behavioral enabler (from SCT).
- Their interaction predicts the extent to which employees engage in preventive actions to mitigate work stress.

METHODOLOGICAL IMPLICATIONS AND FUTURE RESEARCH DESIGN

Research Approach

The proposed conceptual framework integrates constructs from the Health Belief Model (HBM) (Rosenstock, 1974; Champion & Skinner, 2008) and Social Cognitive Theory (SCT) (Bandura, 1997). This integration can be empirically tested using a quantitative, cross-sectional design, appropriate for assessing relationships among psychological perceptions, efficacy beliefs, and behavioral outcomes.

Alternatively, future researchers may adopt a longitudinal design to observe changes in coping self-efficacy and preventive behaviors over time, offering stronger causal inferences. The primary aim of such a study would be to test the moderating effect of coping self-efficacy on the relationships between perceived severity, perceived susceptibility, and prevention behavior of work stress.

Population and Sampling

The suitable population for this study includes working adults across various organizational sectors (e.g., education, healthcare, corporate, and public administration). Since work stress is a universal issue, diverse occupational representation enhances generalizability. A non-probability purposive sampling approach can be used to target employees currently exposed to moderate-to-high job demands. Recommended sample size for structural equation modeling (SEM) or moderation analysis is at least 300 respondents (Hair et al., 2022). Data can be collected using an online survey (Google Forms, Qualtrics, etc.) to ensure anonymity and accessibility.

Summary of Methodological Implications

This proposed methodology offers a practical roadmap for empirically validating the conceptual framework. By operationalizing the constructs through established scales and testing the hypothesized moderation effects statistically, future studies can confirm the theoretical integration of perceived threat, coping self-efficacy, and preventive behavior in the workplace.

Such validation would not only strengthen the theoretical linkage between the Health Belief Model and Social Cognitive Theory but also provide actionable insights for designing stress prevention programs that enhance employees' coping resources.

DISCUSSION AND PRACTICAL IMPLICATIONS

Theoretical Discussion

The proposed conceptual framework extends existing theories of work stress by integrating cognitive perception (from the Health Belief Model) and behavioral capability (from Social Cognitive Theory). This combination presents an alternative perspective on the connection between employees' beliefs and self-efficacy in shaping their proactive measures to mitigate work stress. From a theoretical viewpoint, the model makes three significant contributions. First, it advances the Health Belief Model (HBM) by applying it to the organizational and occupational health context, an area where it has been underutilized. Traditionally, HBM has been used to predict health behaviors such as vaccination uptake, disease prevention, and physical activity (Al-Haroni et al., 2024; Fakharian et al., 2025; Ullah et al., 2024). By extending its use to workplace stress, this study highlights how perceived severity (the seriousness of stress consequences) and perceived susceptibility (the likelihood of being affected) serve as psychological triggers for preventive behaviors in professional settings. This adaptation underscores that employees' cognitive appraisal of work stress functions similarly to health risk perceptions in personal health domains.

Second, the model advances the field of work-related health psychology by extending traditional coping frameworks. It positions coping self-efficacy not merely as a direct predictor but as a moderating variable, explaining when and why preventive behaviors are likely to occur (Tsai et al. (2024).

Third, the model promotes a preventive orientation in workplace well-being research and practice. Instead of emphasizing reactive coping after stress arises, it underscores proactive strategies prior to experiencing work-related stress such as self-regulation, resilience building, and boundary management that align with modern organizational health paradigms (Cabrera-Aguilar et al., 2023). This direction reflects a progressive shift from managing work stress symptoms to cultivating sustainable well-being and resilience in contemporary work environments.

Practical Implications for Organizations

This conceptual framework offers several practical implications for organizations and occupational health management. First, organizations should design well-being programs that address both perceptual and efficacy-based factors. Training initiatives that promote and increase awareness of stress severity and susceptibility, alongside resilience and coping skill development, can enhance employees' coping self-efficacy and promote preventive action (Cabrera-Aguilar et al., 2023).

Second, creating a supportive organizational climate that nurtures psychological safety, autonomy, and open communication encourages employees to engage in proactive coping. Leadership behaviors that model work stress prevention and recognize positive coping can further strengthen these efforts.

Finally, integrating coping self-efficacy assessments into human resource practices allows targeted interventions and personalized development plans. Policies promoting work-life balance, flexibility, and access to counseling can strengthen employees' confidence and capacity to manage work stress effectively. Collectively, these practices shift workplace well-being from reactive work stress management to proactive

prevention.

Implications for Future Research

The proposed model opens several promising directions for future research. First, empirical studies should test the moderating role of coping self-efficacy through longitudinal or experimental designs to establish causal relationships. Second, cross-cultural investigations could examine how cultural orientations shape perceived severity and susceptibility, and whether the influence of self-efficacy differs across collectivist and individualist contexts. Third, future studies may explore mediating mechanisms such as proactive coping, emotional regulation, or psychological resilience that explain how self-efficacy translates cognitive threat perceptions into preventive behaviors. Mixed-method approaches combining quantitative surveys and qualitative interviews could further enrich understanding by capturing the nuanced cognitive and emotional processes underlying preventive stress behavior. Fifth, for future empirical validation, it is recommended that researchers adopt validated instruments for the core constructs. Coping Self-Efficacy may be measured using the Coping Self-Efficacy Scale (Chesney et al., 2006), perceived severity and susceptibility through adapted Health Belief Model measures (Champion & Skinner, 2008), and prevention behavior using the Proactive Coping Inventory (Greenglass et al., 2006). This approach will ensure construct validity and facilitate replication across occupational contexts.

In summary, this conceptual paper offers an integrative framework linking the Health Belief Model and Social Cognitive Theory to explain preventive behavior toward work stress. By addressing both motivational and capability dimensions, it reframes workplace stress management as a proactive prevention process. The model provides valuable theoretical and practical insights for fostering resilient, healthy, and high-performing workforces.

CONCLUSION

Work-related stress remains one of the most persistent challenges in these modern organizations, affecting employees' psychological health, performance, and overall well-being. This conceptual paper proposes an integrative framework explaining how employees' cognitive appraisals specifically perceived severity and perceived susceptibility influence their preventive behavior toward work stress, and how this relationship is moderated by coping self-efficacy. By bridging the Health Belief Model (HBM) and Social Cognitive Theory (SCT), the paper advances a dual-perspective understanding of stress prevention that integrates both motivational and capability dimensions of human behavior.

The proposed model contributes to theory by extending the traditional application of the HBM beyond medical contexts to organizational and occupational health psychology. It also reconceptualizes coping self-efficacy from a direct predictor of coping to a moderating psychological resource that determines whether awareness of stress risks translates into proactive behavior. This integration provides a fresh lens for understanding how cognitive perceptions and self-beliefs interact to promote well-being at work.

From a practical perspective, the model offers a framework for designing preventive stress management strategies. By enhancing employees' awareness of work stress risks and strengthening their coping self-efficacy through resilience training, coaching, and supportive leadership, organizations can foster a workforce that is not merely reactive to stress but proactive in maintaining mental health and productivity.

Nevertheless, this paper acknowledges limitations. Future research should empirically validate the proposed relationships using techniques such as structural equation modeling or moderated regression, and explore cross-cultural and longitudinal perspectives. Ultimately, preventing work stress requires more than awareness; it demands belief in one's ability to act effectively. The integration of cognitive and efficacy-based constructs thus provides a balanced and holistic foundation for promoting healthier, more resilient, and high-performing workplaces.

Declaration of Generative AI and AI-assisted technologies

The authors used Grammarly and ChatGPT for language editing and refinement. The conceptual development, analysis, and interpretation remain solely the authors' responsibility

ACKNOWLEDGMENT

The authors would like to express a great acknowledgment of the funding from Universiti Teknologi MARA Melaka.

REFERENCES

1. A. A. Ab Aziz, N. Zaini, S. Shaidin, and A. A. Abd Hamid, "Occupational stress and coping strategies among non-tenure lecturers in a Malaysian public university," *Int. J. Acad. Res. Bus. Soc. Sci.*, vol. 11, no. 6, 2021. [Online]. Available: <https://doi.org/10.6007/ijarbss/v11-i6/10384>
2. H. Al-Haroni, N. D. Nik Farid, and M. S. Azanan, "Effectiveness of education intervention, with regards to physical activity level and a healthy diet, among Middle Eastern adolescents in Malaysia: A study protocol for a randomized control trial, based on a health belief model," *PLoS ONE*, vol. 19, Jan. 2024. [Online]. Available: <https://doi.org/10.1371/journal.pone.0289937>
3. R. Alves, C. Samorinha, and J. Precioso, "Knowledge, attitudes and preventive behaviors toward COVID-19: A study among higher education students in Portugal," *J. Health Res.*, vol. 35, no. 4, pp. 318–328, 2020. [Online]. Available: <https://doi.org/10.1108/jhr-07-2020-0254>
4. R. Amini, F. Biglari, M. Khodaveisi, and L. Tapak, "Effect of education based on the health belief model on earthquake preparedness in women," *Int. J. Disaster Risk Reduct.*, vol. 52, 2021. [Online]. Available: <https://doi.org/10.1016/j.ijdr.2020.101954>
5. I. Araujo-Filho, L. D. Medeiros da Silva, and A. C. Meneses do Rêgo, "Prehospital emergency care and professional burnout: Nurses in focus," *J. Surg. Clin. Res.*, vol. 14, no. 1, pp. 83–91, 2023. [Online]. Available: <https://doi.org/10.20398/jsr.v14i1.33139>
6. S. M. Awaluddin et al., "The pattern of cardiovascular disease risks among working people (18–64 years) via a nationwide household-based survey in Malaysia," *CVD*, 2022.
7. N. A. Azadi et al., "Effects of an educational health belief model program on promoting preventive behaviors for breast cancer among women in Iran," *J. Patient Exp.*, vol. 12, pp. 1–8, 2025. [Online]. Available: <https://doi.org/10.1177/23743735251341719>
8. R. Azmi, S. N. S. Ahmad, B. A. Mustafa Kamil, and N. S. A. Mohd Zaki, "The implementation of employee assistance program in Malaysia, the United Kingdom and Australia in dealing with mental health issues at workplace: An overview," *Int. J. Entrepren. Manag. Pract.*, vol. 5, no. 17, pp. 49–57, 2022. [Online]. Available: <https://doi.org/10.35631/ijemp.517004>
9. A. Bandura, *Self-Efficacy: The Exercise of Control*. New York, NY, USA: W. H. Freeman, 1997.
10. A. Bandura, "Social cognitive theory: An agentic perspective," *Annu. Rev. Psychol.*, vol. 52, pp. 1–26, 2001. [Online]. Available: <https://doi.org/10.1146/annurev.psych.52.1.1>
11. T. H. T. Bui, T. N. T. Nguyen, H. D. Pham, C. T. Tran, and T. H. Ha, "The mediating role of self-compassion between proactive coping and perceived stress among students," *Sci. Prog.*, vol. 104, no. 2, pp. 1–14, 2021. [Online]. Available: <https://doi.org/10.1177/00368504211011872>
12. E. Cabrera-Aguilar et al., "Resilience and stress as predictors of work engagement: The mediating role of self-efficacy in nurses," *Front. Psychiatry*, vol. 14, Aug. 2023. [Online]. Available: <https://doi.org/10.3389/fpsy.2023.1202048>
13. A. Cal and Z. Bahar, "Use of the health belief model in the prevention of lymphedema after breast cancer," *Prog. Health Sci.*, vol. 8, no. 1, pp. 176–181, 2018. [Online]. Available: <https://doi.org/10.5604/01.3001.0012.1115>
14. M. Cavicchioli, F. Demaria, F. Nannetti, A. C. Scapolan, and T. Fabbri, "Employees' attitudes and work-related stress in the digital workplace: An empirical investigation," *Front. Psychol.*, vol. 16, Feb. 2025. [Online]. Available: <https://doi.org/10.3389/fpsyg.2025.1546832>
15. V. L. Champion and C. S. Skinner, "The health belief model," in *Health Behavior and Health Education: Theory, Research, and Practice*, 4th ed., San Francisco, CA, USA: Jossey-Bass, 2008, ch. 2.

16. M. A. Chesney, T. B. Neilands, D. B. Chambers, J. M. Taylor, and S. Folkman, "A validity and reliability study of the coping self-efficacy scale," *Natl. Inst. Health*, vol. 23, no. 1, pp. 1–7, 2006.
17. M. D. Cookson, P. M. R. Stirk, and O. A. M. A. Kara, "Evidence-based and theoretically-driven behaviour change interventions for physical activity to enhance health and wellbeing," *Univ. Hertfordshire*, vol. 7, Dec. 2019.
18. E. Fakharian et al., "Predictors of mothers' preventive behaviors for children's dental trauma: A cross-sectional study using the health belief model," *BDJ Open*, vol. 11, no. 1, pp. 1–8, 2025. [Online]. Available: <https://doi.org/10.1038/s41405-025-00346-4>
19. Y. Fathi, M. Barati, M. Zandiyeh, and S. Bashirian, "Prediction of preventive behaviors of the needlestick injuries during surgery among operating room personnel: Application of the health belief model," *Int. J. Occup. Environ. Med.*, vol. 8, no. 4, pp. 232–240, 2017. [Online]. Available: <https://doi.org/10.15171/ijoem.2017.1051>
20. C. Freire et al., "Coping strategies and self-efficacy in university students: A person-centered approach," *Front. Psychol.*, vol. 11, May 2020. [Online]. Available: <https://doi.org/10.3389/fpsyg.2020.00841>
21. D. C. Ganster and C. C. Rosen, "Work stress and employee health: A multidisciplinary review," *J. Manage.*, vol. 39, no. 5, 2013. [Online]. Available: <https://doi.org/10.1177/0149206313475815>
22. J. F. Hair, G. T. M. Hult, C. M. Ringle, and M. Sarstedt, *A Primer on Partial Least Squares Structural Equation Modeling (PLS-SEM)*, 3rd ed. Sage, 2022. [Online]. Available: <https://doi.org/10.1007/978-3-030-80519-7>
23. A. P. Hüsser, T. Ohnmacht, and V. T. Thao, "Tourists' preventive travel behaviour during COVID-19: The mediating role of attitudes towards the intention to apply non-pharmaceutical interventions (NPIs) while travelling," *Curr. Issues Tour.*, 2023. [Online]. Available: <https://doi.org/10.1080/13683500.2022.2162373>
24. M. Janssen et al., "Effects of mindfulness-based stress reduction on employees' mental health: A systematic review," *PLoS ONE*, vol. 13, no. 1, 2018. [Online]. Available: <https://doi.org/10.1371/journal.pone.0191332>
25. F. S. Johari, "Work-related stress and coping strategies: A systematic literature review," *Int. J. Acad. Res. Bus. Soc. Sci.*, vol. 10, no. 6, 2020. [Online]. Available: <https://doi.org/10.6007/ijarbss/v10-i6/7469>
26. C. L. Jones et al., "The health belief model as an explanatory framework in communication research," *Health Commun.*, vol. 30, no. 6, pp. 566–576, 2015. [Online]. Available: <https://doi.org/10.1080/10410236.2013.873363>
27. N. Khamai, K. Seangpraw, and P. Ong-Artborirak, "Using the health belief model to predict tuberculosis preventive behaviors among tuberculosis patients' household contacts during the COVID-19 pandemic in northern Thailand," *J. Prev. Med. Public Health*, vol. 57, no. 3, pp. 223–233, 2024. [Online]. Available: <https://doi.org/10.3961/jpmph.23.453>
28. O. Khosravizadeh et al., "Applying the health belief model and behavior of diabetic patients: A systematic review and meta-analysis," *Clin. Diabetol.*, vol. 10, no. 2, pp. 209–220, 2021. [Online]. Available: <https://doi.org/10.5603/DK.2021.0020>
29. M. Kivimäki et al., "Work stress in the etiology of coronary heart disease—A meta-analysis," *Scand. J. Work Environ. Health*, vol. 32, no. 6, 2006. [Online]. Available: <https://doi.org/10.5271/sjweh.1049>
30. M. Kosugi, "Determinants of preventive behaviors for COVID-19 in Japan," *Int. J. Environ. Res. Public Health*, vol. 18, no. 19, p. 9979, 2021. [Online]. Available: <https://doi.org/10.3390/ijerph18199979>
31. F. Li et al., "A systematic review and meta-analysis on preventive behaviors in response to the COVID-19 pandemic among children and adolescents," *BMC Public Health*, vol. 22, no. 1, pp. 1–13, 2022. [Online]. Available: <https://doi.org/10.1186/s12889-022-13585-z>
32. H. Li, Z. Zhang, S. Yang, and G. Zhu, "Systematic review and meta-analysis of propranolol in the prevention and treatment of post-traumatic stress disorder," *Front. Pharmacol.*, vol. 16, Jan. 2025. [Online]. Available: <https://doi.org/10.3389/fphar.2025.1545493>
33. S. Llorens, M. Salanova, M. J. Chambel, P. Torrente, and R. P. Ângelo, "Organizational drivers of burnout and work engagement: A multilevel study in Portuguese firefighter brigades," *Int. J. Environ. Res. Public Health*, vol. 19, no. 7, 2022. [Online]. Available: <https://doi.org/10.3390/ijerph19074053>
34. J. Lukan, L. Bolliger, N. S. Pauwels, M. Luštrek, D. De Bacquer, and E. Clays, "Work environment risk factors causing day-to-day stress in occupational settings: A systematic review," *BMC Public Health*, vol. 22, no. 1, pp. 1–13, 2022. [Online]. Available: <https://doi.org/10.1186/s12889-021-12354-8>

35. E. Makowska-Tłomak, S. Bedyńska, K. Skorupska, R. Nielek, M. Kornacka, and W. Kopeć, "Measuring digital transformation stress at the workplace–Development and validation of the digital transformation stress scale," *PLoS ONE*, vol. 18, no. 10, Oct. 2023, pp. 1–28. [Online]. Available: <https://doi.org/10.1371/journal.pone.0287223>
36. S. S. Z. Mehraban, A. Namdar, and M. M. Naghizadeh, "Assessment of preventive behavior for cervical cancer with the health belief model," *Asian Pac. J. Cancer Prev.*, vol. 19, no. 8, pp. 2155–2163, 2018. [Online]. Available: <https://doi.org/10.22034/APJCP.2018.19.8.2155>
37. E. Menardo et al., "Nature and mindfulness to cope with work-related stress: A narrative review," *Int. J. Environ. Res. Public Health*, vol. 19, no. 10, 2022. [Online]. Available: <https://doi.org/10.3390/ijerph19105948>
38. M. F. Midkiff, C. R. Lindsey, and E. A. Meadows, "The role of coping self-efficacy in emotion regulation and frequency of NSSI in young adult college students," *Cogent Psychol.*, vol. 5, no. 1, pp. 1–14, 2018. [Online]. Available: <https://doi.org/10.1080/23311908.2018.1520437>
39. Z. Moradi, S. S. Kazemi, M. M. Sciences, and A. Montazeri, "The occupational neck pain prevention behaviors assessment questionnaire: Development and psychometric evaluation," Unpublished manuscript, 2022.
40. L. D. Ngobe, "Work stress and job burnout among lecturers in state-owned universities in Rivers State: The mediating role of self-efficacy," *Iris J. Econ. Bus. Manage.*, vol. 1, no. 3, pp. 1–8, 2023. [Online]. Available: <https://doi.org/10.33552/IJEBM.2023.01.000514>
41. C. Okechukwu and B. O. Babatunde, "Work-related stress and the relationship with the health belief model among medical doctors in a tertiary hospital in Port-Harcourt, Nigeria," *J. Educ. Soc. Behav. Sci.*, Jun. 2021, pp. 10–21. [Online]. Available: <https://doi.org/10.9734/jesbs/2021/v34i430320>
42. K. D. V. Prasad, "Effect of occupational stress on work-life balance and psychological well-being," *Int. J. Health Sci.*, vol. 6, Jun. 2022, pp. 3349–3373. [Online]. Available: <https://doi.org/10.53730/ijhs.v6ns5.9367>
43. I. M. Ramdan, K. P. Candra, and M. Sultan, "Perception of preventing behavior against COVID-19 among Indonesian industrial workers," *Int. J. Public Health Sci.*, vol. 11, no. 1, pp. 98–105, 2022. [Online]. Available: <https://doi.org/10.11591/ijphs.v11i1.21071>
44. A. A. Rangkuti, R. Gazadinda, and R. Rustyawati, "Work stress and psychological well-being of high school teachers in Indonesia," *KnE Soc. Sci.*, 2024, pp. 1–7. [Online]. Available: <https://doi.org/10.18502/kss.v9i9.15635>
45. S. Rathi and P. Kumar, "Job stress: A systematic literature review," *J. Health Sci.*, vol. 6, no. S6, p. 812, 2022. [Online]. Available: <https://eujournal.org/index.php/esj/article/view/15934>
46. Y. Ren, Y. Zhou, S. Wang, T. Luo, M. Huang, and Y. Zeng, "Exploratory study on resilience and its influencing factors among hospital nurses in Guangzhou, China," *Int. J. Nurs. Sci.*, vol. 5, no. 1, pp. 57–62, 2018. [Online]. Available: <https://doi.org/10.1016/j.ijnss.2017.11.001>
47. I. M. Rosenstock, "Historical origins of the health belief model," *Health Educ. Monogr.*, vol. 2, no. 4, pp. 328–335, 1974. [Online]. Available: <https://doi.org/10.1177/109019817400200403>
48. S. Sukeri et al., "Perceived severity and susceptibility towards leptospirosis infection in Malaysia," *Int. J. Environ. Res. Public Health*, vol. 17, no. 17, 2020. [Online]. Available: <https://doi.org/10.3390/ijerph17176362>
49. A. Sukohar, "Health belief model and hypertension prevention," *Indian J. Forensic Med. Toxicol.*, Nov. 2021. [Online]. Available: <https://doi.org/10.37506/ijfmt.v15i3.15619>
50. F.-J. Tsai, S.-W. Shen, Y.-J. Hu, and C.-C. Tseng, "Health beliefs model to explore older adults' dementia prevention and health promotion from 2021 to 2022 in Taiwan: A cross-sectional survey study," *Medicine (Baltimore)*, vol. 103, no. 42, p. e39744, Oct. 2024. [Online]. Available: <https://doi.org/10.1097/MD.00000000000039744>
51. F. Ullah, L. Ragazzoni, I. Hubloue, F. Barone-Adesi, and M. Valente, "The use of the health belief model in the context of heatwaves research: A rapid review," *Disaster Med. Public Health Prep.*, vol. 18, 2024. [Online]. Available: <https://doi.org/10.1017/dmp.2024.26>
52. M. Valley and L. Stallones, "A thematic analysis of health care workers' adoption of mindfulness practices," *Workplace Health Saf.*, vol. 66, no. 11, pp. 538–544, 2018. [Online]. Available: <https://doi.org/10.1177/2165079918771991>
53. World Health Organization, *Workplace Stress and Mental Health*. Geneva, Switzerland: WHO, 2023.

[Online]. Available: <https://www.who.int/publications/i/item/9789240053052>

54. T. Wongchana and A. Songthap, "Factors affecting tuberculosis (TB) prevention behaviors among household contacts in Phitsanulok Province, northern Thailand: Implications for TB prevention strategy plan," *BMC Infect. Dis.*, 2024.
55. C. Wu et al., "Exploring links between Chinese military recruits' psychological stress and coping style from the person-environment fit perspective: The chain mediating effect of self-efficacy and social support," *Front. Psychol.*, vol. 13, 2022. [Online]. Available: <https://doi.org/10.3389/fpsyg.2022.996865>
56. J. Wu, J. Shen, Z. Tao, Z. Song, and Z. L. Chen, "Self-efficacy as moderator and mediator between medication beliefs and adherence in elderly patients with type 2 diabetes," *Patient Prefer. Adherence*, vol. 17, pp. 217–226, 2023. [Online]. Available: <https://doi.org/10.2147/PPA.S382362>