

BIBLIOMETRIC ANALYSIS: FACTORS CAUSING AND PREVENTION STRATEGIES FOR BURNOUT IN THE WORKPLACE

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Abstract

Every individual undoubtedly possesses different physical abilities and psychological conditions, especially when facing life situations, whether it is work-related or in other contexts. A challenging situation or condition can make someone feel pressured and experience prolonged stress if not handled properly. This physical, emotional, and mental exhaustion is known as burnout. This study discusses burnout, which has been addressed in previous research from 2018 to 2023. The method used in this research is to identify the number of journals using Harzing's Publish or Perish software, as well as bibliometric analysis using VOSviewer. The research results show that there are 200 publications with 60,448 citations and 10,074.67 citations per year discussing burnout. There are eight main clusters based on the bibliometric analysis. This article also provides information on research topics that have not been widely explored, thus offering benefits to future researchers interested in discussing burnout.

Keywords: Burnout, Work performance, Bibliometric Analysis

1. INTRODUCTION

Human resources have an important function in the sustainability of the agency's goals (Tokan & Mujanah, 2023). Burnout is an increasingly common phenomenon especially in the modern workplace. Burnout is a condition of physical, emotional, and mental exhaustion caused by prolonged and excessive job stress. Burnout can happen to anyone, but is more commonly experienced by those who work in high-demand environments or lack social support. The main causes of burnout include uncontrollable workload, role vagueness, lack of rewards or recognition, and lack of work-life balance. This condition has a significant impact on the work performance of employees in a company. When employees experience burnout, they often feel chronic fatigue, loss of energy, and motivation to work. As a result, their performance decreases due to difficulty in focus, decreased efficiency, and an increased number of errors in daily work.

According to Mujanah (2020), career development is an individual activity or activities carried out to prepare individuals to improve their careers as planned. The impact of burnout on work performance is not only seen in a decrease in productivity but also in the quality of work produced. A person experiencing burnout tends to have difficulty in thinking creatively and innovatively. They may feel trapped in a monotonous routine and lack the initiative to take new steps or solve problems effectively. This can hinder the development and growth of the Company, especially in a competitive and dynamic environment.

In addition, burnout also affects team dynamics and the overall work environment. Burnout also affects the work motivation of an individual. Work motivation is an encouragement that causes a person to complete the necessary work with enthusiasm without feeling constrained so that the work done can run well or produce something satisfying (Kurniawati et al., 2022). A person who experiences burnout will lose motivation at work so that the resulting performance is less satisfying. Employees who experience burnout may become more irritable, less patient, and tend to withdraw from social interactions with coworkers. This can create tension within the team, reduce collaboration, and lower the morale of the entire group. As a result, overall team performance can suffer, reducing project effectiveness and the achievement of organizational goals. In research (Setiawan, 2022), high social support overcomes the emergence of high burnout in employees, so employee performance is still in the high category and employee performance can still be improved by increasing social support for employees and at the same time overcoming high burnout in employees.

To address and prevent burnout, companies need to implement policies and practices that support employee well-being. This includes the provision of balanced workloads, psychological support, stress management training, and the promotion of work-life balance. Job stress arises when there is a gap between job demands and individual capabilities (Moi & Mujanah, 2023). Company leaders should also play an active role in creating a positive work environment, providing constructive feedback, and valuing employee contributions. In this way, companies can improve employee performance, retain a motivated workforce, and achieve better results. Burnout is therefore an interesting phenomenon to study in more depth. The purpose of this article is to help provide information about burnout that has been published in the period 2018-2023.

2. RESEARCH METHODS

Bibliometric analysis is a method used to analyze and map the scientific literature in a field of research. In this article, bibliometric analysis is applied to understand current research trends on burnout.

The first step involved using Harzing's Publish or Perish software. This software was used to identify the number of journal articles that have been published in the last six years (2018-2023) related to burnout. Using Google Scholar as a data source, the software was able to collect information on the number of articles relevant to the keyword burnout.

The second step involved the use of VOSviewer software. This software was used to map the patterns of relationships, year ranges, and topic density in the articles identified in the first step. Using visualization techniques, this software can help identify patterns and trends in burnout research.

This research focuses on the use of burnout keywords as search criteria. These keywords were used to identify articles relevant to the topic of burnout. Using bibliometric analysis, this study aims to provide a better understanding of current research trends in the field of burnout.

Using Harzing's Publish or Perish software and VOSviewer, this study can provide valuable information about the number of published articles and patterns of relationships in

burnout research. The results of this analysis can be used to identify under-researched areas and provide direction for future research in this field.

3. RESULTS AND DISCUSSION

3.1. Research Results

The results of bibliometric analysis show that there are 200 publications with 60448 citations and 10074.67 cites/years that discuss burnout (Figure 1)

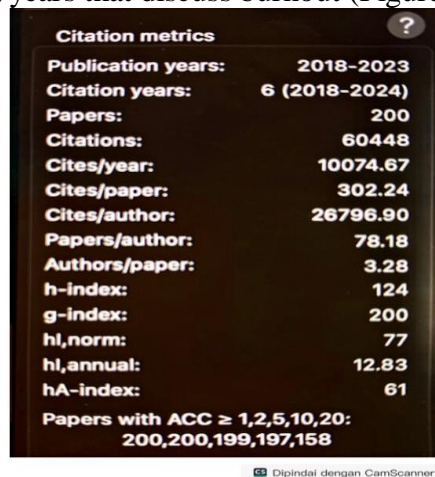


Figure 1. Data on the number of journals, citations and cites/year

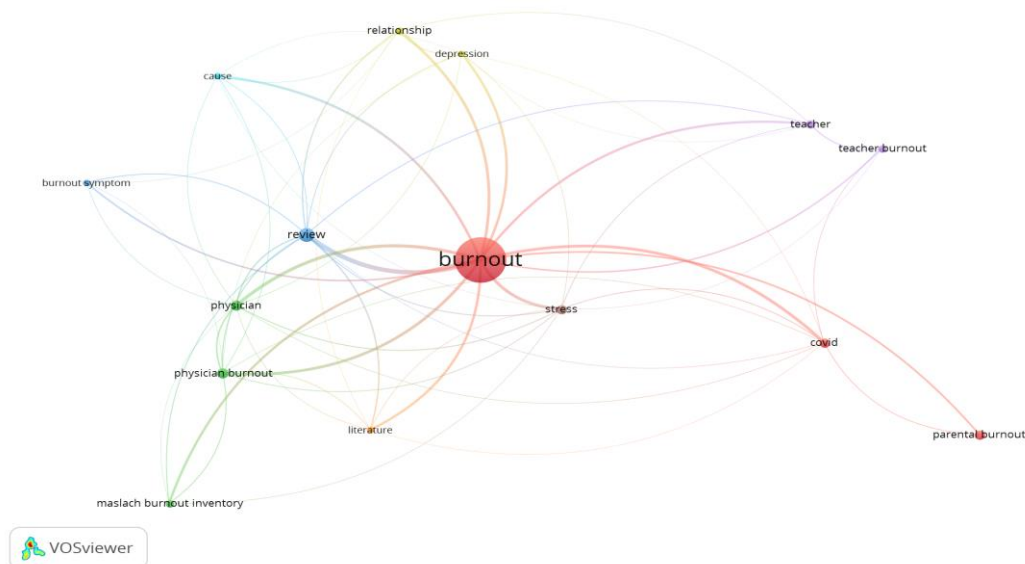


Figure 2. Visualization of the Relationship between *Burnout* Topics

Figure 2 shows that there are eight main clusters. The red clusters generally discuss burnout with covid and parental burnout. The green clusters are more directed towards the discussion of the Maslach burnout inventory, physician and physician burnout. The blue cluster discusses burnout symptom and review. The yellow cluster is more about depression

and relationships. The purple cluster deals with teacher and teacher burnout. The turquoise cluster discusses cause. The orange cluster discusses literature and the brown cluster discusses stress.

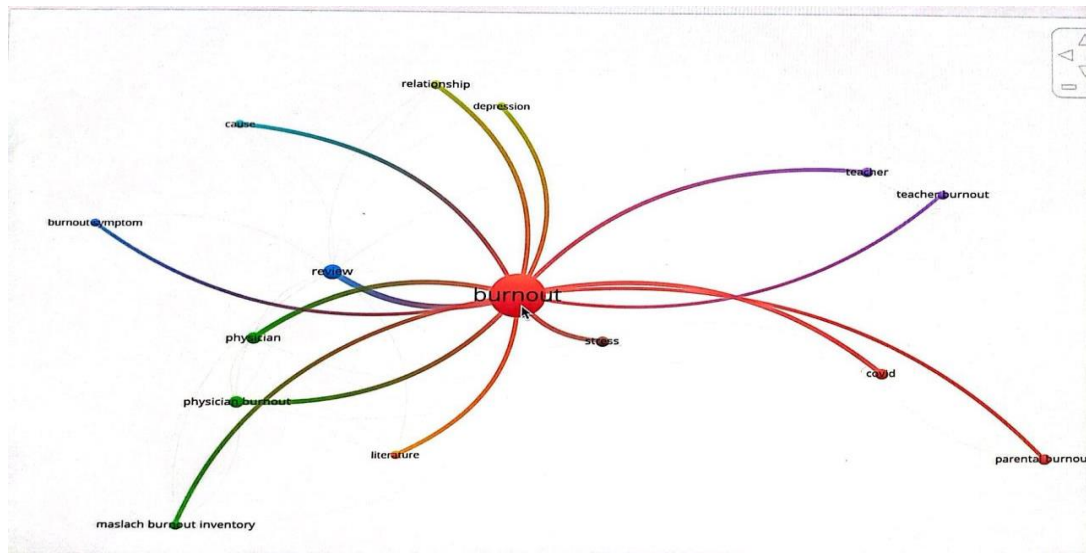


Figure 3. Visualization of the Relationship between *Viral Marketing Strategy* topics

The visualization in Figure 3 shows that several studies have been made linking *burnout*, *covid*, *parental burnout*, *Maslach burnout inventory*, *physician*, *physician burnout*, *burnout symptom*, *review*, *depression*, *relationship*, *teacher*, *teacher burnout*, *cause*, *literature* and *stress*.

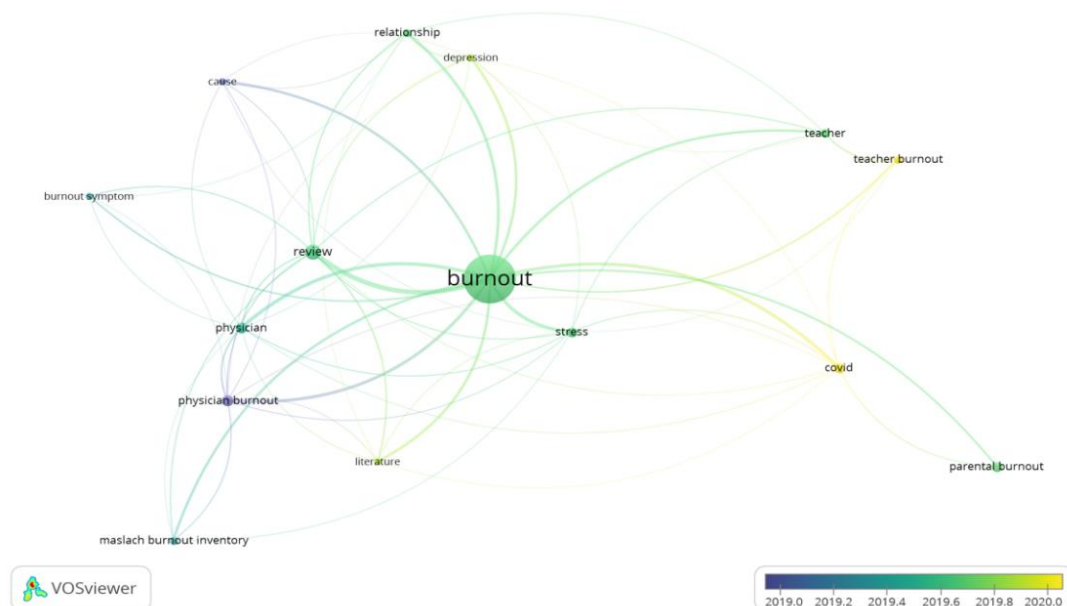


Figure 4. Burnout-related timeline visualization

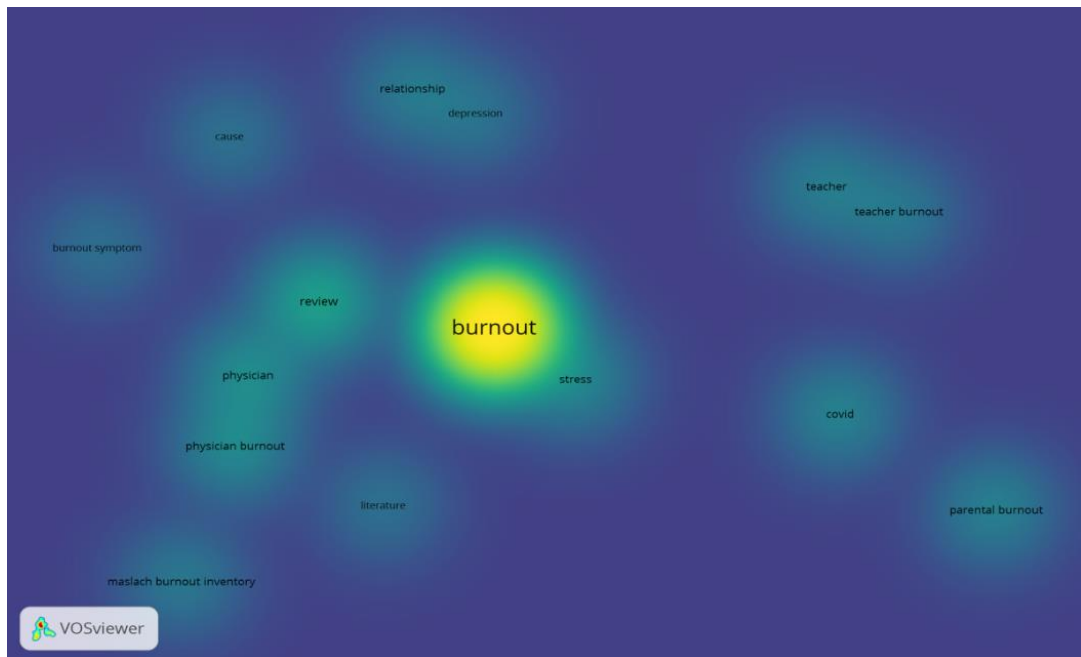


Figure 5. Burnout-related Topic Density Visualization

Figure 5 shows that the overall topic is still very little discussed or in other words there is not much research on the topic. This can be seen from the faded colors in the image. Therefore, it can be a consideration that these topics can be the subject of further research.

3.2. Discussion

The COVID-19 pandemic has significantly contributed to burnout among healthcare workers, particularly impacting radiologists and older healthcare workers. Studies have shown that COVID-19 anxiety, increased workload, disruptions in working relationships, and exacerbation of pre-existing systemic problems have led to higher levels of emotional exhaustion, depersonalization, and decreased personal accomplishment, all key components of burnout (Çukurova et al., 2023; Leiter & Maslach, 2022; Woo & Engel, 2022; Yong-Hing et al., 2023; Zhang et al., 2023). Factors such as inadequate staffing, workplace discrimination, and lack of job autonomy have been identified as risk factors for burnout among older healthcare workers, leading to higher rates of depression, anxiety, and intention to leave work. In addition, the pandemic has increased stressors such as anxiety, depression, and excessive workload, further contributing to burnout among resident physicians. Addressing these challenges through psychological support, workload management, and workplace accommodations is critical to mitigating the impact of COVID-19 on fatigue levels in individuals.

Burnout is a phenomenon that is getting more and more attention in an organization or company. Burnout serves as an employee performance evaluation tool (Mujanah, 2024). Research shows that burnout characterized by emotional exhaustion, cynicism and decreased professional effectiveness has a significant impact on productivity and work quality. According to (Mujanah, 2020) burnout is a person's condition experienced due to the onset

of stress over a long period of time which is characterized by continuous loss of psychological, physical, mental and emotional energy.

According to Katarini (2011), burnout is a loss of physical or emotional strength and motivation usually as a result of prolonged stress or frustration, role conflict, low salary or wages and lack of a performance reward system that results in depression. (Maharani & Triyoga, 2012) states that burnout is the most common result of work stress and workload. Specific symptoms of burnout include boredom, depression, pessimism, lack of concentration, poor work quality, dissatisfaction, absenteeism, and illness.

According to Andarika (2004), there are 11 characteristics in burnout sufferers including: 1) fatigue, 2) running away from reality, 3) boredom and cynicism, 4) impatience and irritability, 5) feeling that only he can solve all problems, 6) feeling unappreciated, 7) experiencing disorientation, 8) psychosomatic complaints, 9) suspicious for no reason, 10) depression and 11) denial. Thus, it can be concluded that burnout is a psychological symptom in the scope of work that is characterized by the factors of fatigue, cynicism, and ineffectiveness. Fatigue indicates a decrease in energy and motivation, cynicism reflects a negative attitude towards work and the work environment, while ineffectiveness describes a decrease in performance and a feeling of inability to complete work tasks properly. By understanding these characteristics, it can be concluded that burnout is not only a physical problem, but also includes emotional and mental aspects that affect an individual's overall well-being in a professional setting.

Burnout is manifested physically (poor health) and psychologically (detachment, boredom and rigidity). Prevention strategies generally fall into the categories of (a) in-school interventions (including being better prepared and developing high-quality interpersonal relationships), (b) out-of-school interventions (better work-life balance), and (c) mentoring. Given that engagement is the antithesis of burnout, keeping teachers engaged and feeling valued are factors that reduce burnout (Nápoles, 2022).

The Maslach Burnout Inventory (MBI) is a widely used self-report measure to assess fatigue, which consists of three subscales: Emotional Exhaustion (EE), Depersonalization (DP), and Personal Attainment (PA). The MBI-Human Services Survey (MBI-HSS) has been widely used to measure burnout among healthcare professionals, including physicians (Mukherjee et al., 2020). Physician burnout is a significant concern due to its negative consequences for individuals and the quality of patient care. Workplace stress, time constraints, and anxiety are all associated with burnout, which may explain the high rates of burnout among healthcare professionals who are not at the frontline of COVID-19 care (Etesam et al., 2021).

Organizational change, especially that leading to a reduction in staff or resources, is identified as a major factor that accelerates burnout and, consequently, Burnout (Shah et al., 2024). This suggests that when there is restructuring or reduction in the organization, the increased pressure and workload on the remaining staff can trigger faster burnout. The consequences of burnout are significant as research by (Tokan & Mujanah, 2023) shows that low levels of burnout correlate with higher overall worker performance. That is, when workers do not experience burnout, they tend to perform better, which has a positive impact on the overall productivity and efficiency of the organization. Therefore, it is important for management to consider the impact of organizational change on employee well-being and

implement strategies that can minimize the risk of burnout to maintain high performance in the long term.

At the organizational level, it is important to provide training that includes developing employees' technical and social skills and conducting regular assessments of their well-being as a performance indicator (Edú-Valsania et al., 2022). Meanwhile, at the individual level, physical activity is made part of the daily routine to reduce the impact of fatigue on overall health, while encouraging mindfulness exercises to reduce the risk of burnout and improve concentration and empathy. All of these interventions aim to manage workplace stressors and increase individual resources to deal with work challenges.

At the family level, addressing parental burnout during times of increased stress and uncertainty is important as increased and prolonged stress experienced by parents can potentially lead to parental burnout, which is associated with a range of negative outcomes for affected individuals and their children. Research (Skjerdingsstad et al., 2022) highlights the need for the development and implementation of preventive measures and interventions to reduce parental burden during these periods to reduce the risk of burnout and its adverse consequences.

The COVID-19 pandemic has had a significant impact on various aspects of life, including family relationships. One prominent effect is an increase in emotional exhaustion and anxiety among parents, which is directly related to deteriorating parenting outcomes. According to (Aumayr-Pintar et al., 2018), these symptoms are a central issue emerging from the stress of the pandemic. Further research shows that parental burnout during the pandemic is highly prevalent, especially among those with lower levels of education and those with school-aged children. These factors make them more susceptible to stress and burnout. However, there are also positive findings suggesting that interventions such as meditation can be effective in reducing parental burnout and increasing their resilience, as revealed by (Liu et al., 2022). This suggests that although the pandemic has put additional pressure on older people, there are strategies that can help them better cope with these challenges.

Research on burnout has shown significant development, particularly through small-scale occupational studies that provide an in-depth understanding of the phenomenon. However, these studies often vary in the methods and instruments used to measure burnout, leading to results that lack consistency and are difficult to compare directly (Aumayr-Pintar et al., 2018). Furthermore, there are indications that employees who have been diagnosed with depressive disorders and/or anxiety disorders may also experience burnout, suggesting a link between these psychological conditions (Aumayr-Pintar et al., 2018). This emphasizes the importance of a holistic approach in assessing employee mental health, as well as the need for more uniform measurement standards to enable more comprehensive and accurate analysis.

Personality is one of the personal factors that can affect burnout. Research shows that big five personality is a significant predictor of burnout in employees (Bhowmick & Mulla, 2021; Kapusuz & Cavuz, 2018; Sadoughi, 2017). For example, individuals with high scores on neuroticism type have a positive correlation with emotional exhaustion, it means they are more prone to burnout (Bhowmick & Mulla, 2021; Kapusuz & Cavuz, 2018; Sadoughi, 2017). In contrast, agreeableness and conscientiousness personality types have been shown to significantly predict higher personal achievement, thereby reducing the risk of burnout (Bhowmick & Mulla, 2021). In addition, individuals with extraversion personality type tend

to have more positive emotions, often feel happy, optimistic, and are able to reassess problems more positively, potentially reducing the likelihood of experiencing burnout (Divinakumar et al., 2019).

In addition to the big five, hardiness and dark personality also affect burnout. Research shows that hardiness personality is negatively correlated with burnout, where individuals with high scores on this personality are able to manage stress better and therefore less prone to burnout (Divinakumar et al., 2019). On the other hand, individuals with dark personalities, which include traits such as narcissism, Machiavellianism, and psychopathy, tend to be more prone to burnout, as these traits can increase interpersonal stress and conflict (Grover & Furnham, 2021).

Research (Corbeanu et al., 2023; Demerouti & Adaloudis, 2024; Mota et al., 2023; Vătmănescu & Vintilă, 2023) suggests that burnout is a significant concern in the workplace, affecting employee well-being and performance. Research has shown that burnout is associated with emotional exhaustion, low motivation, and a negative impact on job performance (Allam et al., 2022). Factors such as heavy workload, job stress, and organizational injustice have been identified as the main causes of increasing levels of burnout among employees. Excessive workload makes employees feel overwhelmed and less able to meet the demands of the job, while prolonged job stress can be detrimental to their mental and physical health. Organizational inequities, which include unfairness in task distribution, recognition and rewards, also contribute to frustration and decreased motivation. Therefore, to address workplace burnout, it is important for organizations to consider policies that manage workload, reduce stress, and improve organizational justice, in order to create a healthier and more productive work environment.

According to Demerouti & Adaloudis (2024), factors that contribute to burnout can be categorized into situational and individual factors. Situational factors include job demands such as role ambiguity, conflict, stress, stressful events, workload, and work pressure that can lead to burnout and depersonalization. In addition, job resources also play an important role, where the balance between job demands and job resources strongly influences burnout and cynicism, and has a stronger relationship with a decreased sense of personal accomplishment. Organizational attitudes also had a moderate to strong relationship with burnout, and job control and workplace support were negatively associated with emotional exhaustion. Job insecurity also increased the risk of burnout.

Individual factors have a significant role in influencing the level of burnout experienced by employees. One prominent individual characteristic is neuroticism, where employees who have this trait tend to focus more on negative aspects and are more prone to burnout. Emotional stability was also found to be an important predictor of burnout and depersonalization. In addition, resilience, stress coping ability, and intrinsic motivation are other individual aspects that serve as protectors against burnout. The absence or deficiency of these aspects can increase one's susceptibility to burnout. In addition, inter-role conflict, whether it originates from work to non-work or vice versa, has a strong correlation with emotional exhaustion and other dimensions of burnout. Research by Demerouti & Adaloudis (2024) emphasizes the importance of understanding these individual factors in efforts to prevent and treat burnout in the work environment.

4. CONCLUSION

There are 200 publications with 60448 citations and 10074.67 cites/years that discuss burnout based on the results of bibliometric analysis. There are eight clusters that can be grouped including 1) Clusters that discuss burnout with covid and parental burnout, 2) clusters that discuss Maslach burnout inventory, physician and physician burnout. Influencers, 3) clusters that discuss burnout symptoms and reviews, 4) clusters that discuss depression and relationships, 5) clusters related to teacher and teacher burnout, 6) clusters that discuss causes, 7) clusters that discuss literature, and 8) clusters related to stress.

The theoretical implication of this study is to provide information related to research topics that have not been widely conducted, so that it can provide benefits for future researchers who are interested in discussing burnout. Meanwhile, the practical implications include the importance of providing training at the organizational level that includes developing employees' technical and social skills and conducting regular assessments of their well-being as a performance indicator. At the individual level, physical activity is made part of the daily routine to reduce the impact of burnout on overall health, while encouraging mindfulness exercises to reduce the risk of burnout and improve concentration and empathy. All these interventions aim to manage workplace stressors and increase individual resources to deal with work challenges.

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