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The impact of stressors on the burnout risk of novice Physical Education
Teachers in Austria: An analysis of stressors and coping strategies

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Linda Kain BEd

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Assoz. Prof. Mgr. Dr. Peter Gröpel

Abstract German

Diese Masterarbeit untersucht die Burnout Wahrscheinlichkeit von österreichischen Sportlehrkräften an Sekundarschulen mit besonderem Fokus auf deren Berufserfahrung, unterrichtsbezogene Stressoren und Bewältigungsstrategien. Mithilfe eines quantitativen Querschnittsdesigns wurden Daten von 59 Sportlehrkräften erhoben und hinsichtlich der Burnout-Dimensionen, wahrgenommenen unterrichtsbezogenen Stressoren sowie individueller Coping-Strategien analysiert. Die Ergebnisse zeigen, dass Berufseinsteiger signifikant höhere Werte emotionaler Erschöpfung aufweisen als erfahrene Lehrkräfte, während keine signifikanten Unterschiede hinsichtlich Depersonalisierung oder persönlicher Leistungsfähigkeit festgestellt werden konnte. Darüber hinaus ergaben sich keine statistisch signifikanten Unterschiede in Bezug auf Bewältigungsstrategien, unterrichtsbezogene Stressoren oder Fächerkombinationen. Coping-Strategien, die von Rückzug und Vermeidung geprägt sind, zeigten die stärksten positiven Zusammenhänge mit Burnout, während aktives Bewältigungsverhalten sowie zunehmende Berufserfahrung negativ mit dem Burnout-Niveau assoziiert waren. Insgesamt deuten die Ergebnisse darauf hin, dass Burnout bei Sportlehrkräften weniger durch strukturelle Merkmale als vielmehr durch individuelle Bewältigungsprozesse und den Umgang mit beruflichen Anforderungen beeinflusst wird.

Abstract

This master's thesis examines burnout risk among Austrian secondary school physical education teachers, with particular focus on years of teaching experience, classroom-related stressors, and coping strategies. Using a quantitative cross-sectional design, data were collected from 59 physical education teachers and analysed regarding burnout dimensions, perceived classroom stressors, and individual coping strategies. The results indicate that novice teachers experience significantly higher levels of emotional exhaustion than experienced teachers, while no significant differences were found for depersonalization or personal accomplishment. Furthermore, no statistically significant differences emerged regarding coping strategies, classroom stressors, or subject combinations. Coping strategies reflecting disengagement and withdrawal showed the strongest positive associations with burnout, whereas active coping and teaching experience were negatively associated with burnout levels. Overall, the findings suggest that burnout among physical education teachers is influenced less by structural characteristics than by individual coping processes and the management of occupational demands.

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1 Introduction

Physical education (PE) teachers face unique challenges that significantly impact their professional well-being and effectiveness. Educators are tasked with not only teaching physical skills, promoting fitness and team building but also managing large, active groups of students in environments that are often loud and physically demanding in small spaces. The constant movement and high energy levels in PE classes can make maintaining order and discipline rather challenging. These stressors can be overwhelming, not only for novice teachers who are still developing their classroom management skills as well as coping strategies, but also for more experienced teacher who are exposed to those stressors for many years. Research by Caspersen and Raaen (2014) has shown that PE teachers are particularly affected by high physical and emotional demands and frequent classroom disruptions.

One of the most pressing issues PE teachers encounter, is the high level of stress associated with their job. This stress is highlighted by resource constraints, such as limited equipment and inadequate facilities, which force teachers to be exceptionally creative and resourceful to provide quality education and time management. Additionally, the physical demands of demonstrating exercises and ensuring student safety add to the overall burden. These working conditions can lead to emotional exhaustion and a higher risk of burnout, particularly for those new to the profession (Schaarschmidt et al., 2019).

The present study seeks to understand the stressors and coping strategies of novice and experienced PE teachers in Austria. Specifically, it aims to explore how these educators manage the unique demands of their profession and how their experiences and coping mechanisms differ based on their level of experience. By identifying specific stressors and effective coping strategies, the research aims to inform the development of targeted interventions and support systems that can enhance the well-being and professional efficacy of PE teachers. According to Cordova et al. (2023), structured support systems and individualized coping strategies are essential to prevent burnout and promote resilience in the overall teaching profession. In addressing these issues, the study will examine the following research question:

To what extent do stressors affect the mental health, resilience, and probability of burnout for PE teachers. What differences in coping strategies can be identified among novice versus experienced educators. As well as how do these impacts differ between teachers with a second main subject compared to those with a second minor subject.

By exploring these questions, the research will provide valuable insights into the challenges faced by PE teachers and how they can be better supported in their vital roles as educators.

1.1 State of the art

The current state of research on the mental health and resilience of physical education (PE) teachers reveals a complex landscape of occupational challenges that significantly impact their professional efficacy and psychological well-being. According to Caspersen and Raaen (2014), novice teachers often report high stress levels due to challenges in classroom management and the demanding physical environment in which PE is taught. This includes the need to control large, often noisy groups while ensuring safety during physically active lessons. More recent international research confirms that these stressors are not isolated phenomena but represent structurally embedded features of PE teaching across educational systems overall (Richards et al., 2018; Alsalhe et al., 2021). These authors emphasize that physical education teachers face a unique convergence of pedagogical, organizational, and physical demands, which differentiates their stress profiles from those of teachers in predominantly classroom- and knowledge-based subjects. Schaarschmidt et al. (2019) add that performance pressure, multitasking, and limited institutional support intensify those stressors, particularly for younger or less experienced educators. Furthermore, Cordova et al. (2023) emphasize that exposure to student trauma, behavioral issues, and the marginalization of PE as a subject area contribute to the multifaceted nature of stress in this particular profession. Furthermore, several researchers argue that the status of physical education within academic hierarchies aggravates stress by reducing perceived professional legitimacy and autonomy (Richards & Templin, 2012; Klinge, 2018). PE teachers frequently report that their subject is viewed as secondary to more academic perceived disciplines, which may not only undermine professional identity in the school context but also increase vulnerability to burnout.

In German-speaking countries, similar patterns emerge. Research by Unterbrink et al. (2007) identifies that teachers generally face high levels of occupational stress and show elevated symptoms in the burnout dimensions of emotional exhaustion and depersonalization. Their findings emphasize that teaching is characterized by time pressure, significant responsibilities, and intensive interactions, all of which can contribute to chronic stress. These insights align with those of Schaarschmidt et al. (2019), who highlight institutional inequality and workload imbalances as structural stress amplifiers. Complementing this, Klinge (2018) presents qualitative evidence showing that PE teachers experience

considerable strain from organizational undervaluation, insufficient preparation time, and lack of recognition, factors that heighten emotional distress and diminish professional satisfaction.

Novice teachers are particularly vulnerable due to fewer coping strategies and idealistic expectations that often clash with institutional realities. This is consistent with international literature emphasizing that younger or less experienced teachers frequently report higher burnout symptoms than their older colleagues (Unterbrink et al., 2007; Caspersen & Raaen, 2014). Klusmann et al. (2012) reinforce this by noting that early-career educators exhibit heightened professional idealism and personal investment, which, while commendable, can increase the risk of overcommitment and emotional exhaustion in the absence of adequate support. Griffey and Housner (1991) support this by stating that experienced educators demonstrate greater resilience and more effective classroom management, which buffers them against stress.

At the same time, organizational and societal factors remain critical. The perceived lower status of PE in the school hierarchy can lead to professional marginalization (Cordova et al., 2023), while restricted curricular autonomy and a lack of decision-making freedom are associated with elevated burnout values (Unterbrink et al., 2007). Richards et al. (2018) similarly highlight that PE teachers face distinctive stressors due to unclear role expectations, limited control over their work conditions, and an undervalued subject status, all of which contribute to the decrease of teacher motivation and psychological resilience. However, when the school culture values physical education, such as recognizing success in sports competitions or innovative teaching concepts, PE teachers report increased motivation and lower burnout scores, illustrating the protective role of perceived reward and professional recognition.

Social support also emerges as a critical resource across contexts. Unterbrink et al. (2007) emphasize the importance of collegial support and a positive school climate as buffers against stress, echoing the coping strategies described by Cordova et al. (2023), who advocate for reflective practice and peer networks. Richards and Templin (2012) further affirm that emotional and professional support from colleagues and school leadership serves as a significant moderator of burnout symptoms, particularly emotional exhaustion. Eckert, Ebert, and Sieland (2013) also reinforce this by identifying structured interventions such as time management training and mindfulness programs as tools to enhance teacher's overall well-being.

Tudor, Sarkar, and Spray (2019) provide additional support, showing that teachers with more years of service report significantly lower levels of emotional exhaustion. Experience acts as a protective factor, promoting better adaptation to occupational demands. This emphasizes the interplay between experience, institutional context, and available resources in shaping stress responses and burnout trajectories.

These interconnected findings form the foundation for the present study by emphasizing both the individual and systemic dimensions of occupational stress. By focusing on the differences between novice and experienced PE teachers in Austria and exploring the moderating role of teaching assignments (major vs. minor subjects).

1.2 Key concepts

1.2.1 Stressors

Physical education (PE) teachers are exposed to a variety of stressors stemming from both physical and organizational demands inherent in their profession. These include managing student behavior, teaching large and heterogeneous class groups, dealing with limited facilities and equipment, and enduring high physical and vocal strain in loud, dynamic settings. Comparative research indicates that while classroom teachers primarily experience cognitive and emotional workload, PE teachers additionally experience pronounced somatic strain due to constant movement, voice use, and injury prevention responsibilities (Haaren-Mack et al., 2020). This dual burden intensifies cumulative stress effects over time. Haaren-Mack et al. (2020) emphasize that impact of these stressors on teacher performance and overall well-being. This is supported by Alsalhe et al. (2021), whose meta-analysis found that approximately one quarter of PE teachers globally report high levels of burnout, with emotional exhaustion and depersonalization being especially prevalent highlighting the significant toll that persistent stressors take in this field of work.

Schaarschmidt et al. (2019) identify heavy workloads, multiple responsibilities, and ongoing performance pressure as key stressors, particularly affecting novice teachers. These stressors, when compounded with inadequate structural support, can lead to significant mental strain. In line with this, Caspersen and Raaen (2014) report that under such conditions, teachers frequently experience low job satisfaction and increased emotional distress. Alsalhe et al. (2021) further emphasize that large class sizes, limited time for preparation, and lack of institutional recognition are core elements contributing to this burden.

Additionally, Cordova et al. (2023) highlight secondary contextual stressors such as managing inclusion demands, responding to student trauma, and facing the marginalization of PE within the school curriculum. These psychosocial challenges contribute to heightened feelings of helplessness and professional isolation, reinforcing the patterns already observed in Alsulhe et al.'s (2021) international findings.

Cramer and Merk (2018) add that the extent to which teachers perceive these demands as stressful strongly depends on their subjective evaluation processes. In high-interaction environments like PE classes, where physical and emotional engagement is intensified, the individual perception of strain becomes crucial. Their integrative framework underscores that stress does not arise solely from external workload but from the dynamic interaction between external demands and the teacher's psychological and physiological responses. Thus, stress is shaped by both the objective teaching conditions and the internal appraisal of those conditions.

1.2.2 Burnout

Burnout is a psychological syndrome resulting from prolonged occupational stress. It is characterized by emotional exhaustion, depersonalization, and reduced personal accomplishment. Maslach et al. (1996) conceptualize burnout as a process rather than a static state, emphasizing that emotional exhaustion typically emerges first and may subsequently foster depersonalization and diminished professional success. This is particularly relevant for PE teachers, whose emotional and physical resources are heavily taxed already at the beginning of their careers. Empirical work also suggests that emotional exhaustion is the most sensitive indicator of early burnout risk in teaching professions, whereas depersonalization may emerge as a secondary coping response to sustained overload (Aloe et al., 2014; Roloff et al., 2022). Freudenberger and North (1994) estimate that 20–25% of PE teachers experience high levels of burnout symptoms, with emotional exhaustion being the most prevalent.

These symptoms often manifest as chronic fatigue, anxiety, irritability, and even somatic complaints such as headaches and sleep disturbances (Singh, 2008). Burnout undermines teacher morale, diminishes classroom climate, and increases the likelihood of attrition. Haaren-Mack et al. (2020) also note a high prevalence of voice disorders in PE teachers, which reflects the physical toll of teaching in loud, open environments. Cordova et al. (2023)

confirm that burnout correlates with impaired student-teacher relationships and professional disengagement.

Agyapong et al. (2022) further underline that emotional exhaustion and depersonalization are particularly widespread among teachers, driven by persistent stressors such as time pressure, large class sizes, student behavioral challenges, administrative burdens, and insufficient institutional support. These stressors are not only linked to psychological distress but also to anxiety and depressive symptoms. Agyapong et al. emphasize that the effects of these factors contribute to a chronic cycle of stress and burnout, especially in professions like teaching, where relational and emotional labor are necessary.

1.2.3 Coping

Coping refers to the cognitive and behavioral efforts individuals use to manage internal or external demands that are perceived as taxing or exceeding their available resources (Lazarus & Folkman, 1984). Within the stress and burnout literature, a central distinction is consistently drawn between adaptive coping strategies, such as problem-focused approaches and the active seeking of social support, and maladaptive coping strategies, including avoidance, withdrawal, and disengagement. This differentiation is crucial, as empirical findings repeatedly demonstrate that adaptive coping is generally associated with lower levels of burnout, whereas maladaptive coping patterns are strongly linked to emotional exhaustion and depersonalization (Greenglass et al., 1997; Knoll et al., 2005).

However, coping effectiveness cannot be understood independently of contextual conditions. Importantly, the same coping strategy may serve different psychological functions depending on situational demands and perceived controllability. For example, acceptance may function as an adaptive response in situations where stressors cannot be directly altered, facilitating emotional regulation and reducing frustration. At the same time, under conditions of chronic and uncontrollable strain, acceptance may also reflect resignation or emotional withdrawal, thereby complicating its interpretation in burnout research (Roloff et al., 2022). This underscores that coping strategies should not be evaluated solely as inherently adaptive or maladaptive, but rather in relation to the broader occupational context in which they are applied. In the context of physical education teaching, coping strategies play a particularly important role due to the combination of high physical demands, intensive social interaction, and frequent exposure to unpredictable classroom situations. Physical education teachers are therefore required to continuously regulate emotional, cognitive, and behavioral responses to

stress. Prior research also indicates that teachers who rely more strongly on problem-focused coping and social support tend to report lower stress levels and greater professional well-being, whereas reliance on avoidant or disengaging strategies is associated with increased burnout risk (Cordova et al., 2023). Consequently, coping can be understood as a key psychological mechanism linking occupational stressors to burnout outcomes in physical education teachers.

Cordova et al. (2023) categorize effective coping mechanisms used by PE teachers into self-reflective practices, mindfulness, and the use of peer support systems. These strategies are often associated with increased emotional resilience, higher job satisfaction, and lower emotional exhaustion. Social support, especially from colleagues and professional networks, plays a crucial role in buffering the effects of daily stressors, particularly in physically and emotionally demanding school settings.

Coping strategies differ not only in quality but also by teaching experience. According to Cordova et al. (2023) teachers who feel inadequate or helpless in changing students' traumatic experiences may resort to unhealthy coping habits such as disengagement, avoidance, or substance abuse (Cordova et al., 2023). These negative responses can lead to increased stress, emotional exhaustion, and a higher risk of burnout. In contrast, experienced teachers tend to rely on internalized coping mechanisms developed through years of professional exposure. These include adaptive appraisal techniques and efficient emotion regulation strategies.

Agyapong et al. (2022) emphasize that the effectiveness of coping is closely tied to the school environment and the resources available to teachers. Their findings underline a consistent association between inadequate institutional support and the use of maladaptive coping strategies, such as emotional disengagement or resignation. The study further identifies systemic factors such as excessive workload, large class sizes, behavioral issues, and administrative burdens as critical conditions that affect the type and success of coping strategies employed by educators.

Overall, the findings of Cordova et al. (2023) and Agyapong et al. (2022) indicate that coping in the teaching profession is dynamic and shaped by both personal experience and contextual factors. The type of school, available support systems, and teaching stage play a role in the development and application of coping behaviours that ultimately influence resilience and burnout outcomes.

1.3 Burnout probability of teachers

Within educational psychology and occupational health research, burnout has become a central outcome variable in the teaching profession. A substantial body of empirical research has therefore focused on estimating how frequently teachers experience clinically relevant burnout symptoms and how these symptoms are distributed across the core dimensions of emotional exhaustion, depersonalization, and reduced personal accomplishment.

Across various countries and educational systems, teaching is consistently classified as a profession with an elevated risk of burnout, particularly with respect to emotional exhaustion (Maslach et al., 1996; Unterbrink et al., 2007). Large-scale surveys, systematic reviews, and meta-analyses indicate that approximately 20% to 30% of teachers report elevated or critical burnout symptoms, although prevalence estimates vary depending on the measurement instruments, cut-off criteria, and educational contexts examined (Aloe et al., 2014; Roloff et al., 2022). Importantly, burnout prevalence is not uniform across dimensions. Emotional exhaustion is reported most frequently, whereas depersonalization and reduced personal accomplishment typically occur at lower base rates and are more likely to emerge at later stages of the burnout process. Thus, emotional exhaustion is widely regarded as the earliest and most sensitive indicator of burnout risk, reflecting sustained emotional and cognitive overload (Maslach et al., 1996). Several studies demonstrate that a substantial proportion of teachers experience elevated emotional exhaustion without simultaneously displaying high depersonalization or reduced personal accomplishment (Aloe et al., 2014). Consequently, burnout probability should not be reduced to a simple classification of burnout versus non-burnout but should be understood as a gradual pattern of increasing vulnerability across burnout dimensions.

Recent person-centered research further supports this differentiated perspective. Holmström et al. (2023), using latent profile analyses, identified distinct burnout–engagement profiles among teachers, including groups characterized by high emotional exhaustion but preserved work engagement. These findings highlight that burnout probability manifests in heterogeneous symptom constellations rather than as a uniform syndrome, underscoring the limitations of relying solely on global mean scores when assessing prevalence. Research also demonstrates that burnout probability varies considerably across career stages. Although burnout has often been conceptualized as the cumulative outcome of long-term exposure to occupational demands, empirical evidence suggests that early-career teachers are

disproportionately represented among those reporting high emotional exhaustion (Caspersen & Raaen, 2014; Schaarschmidt et al., 2019). Longitudinal and cohort-based studies indicate that novice teachers frequently experience heightened emotional strain during the transition from teacher education to full professional responsibility, a phase characterized by role ambiguity, high self-expectations, and still-developing coping routines. These findings suggest that burnout probability may peak during critical phases of professional development rather than increase linearly with years of service.

Beyond career stage, subject-related differences in burnout prevalence have received increasing attention, although findings remain less consistent than those related to experience. Meta-analytic evidence indicates that physical education teachers report levels of emotional exhaustion that are comparable to, and in some samples higher than, those observed among teachers in academically oriented classroom subjects (Alsalhe et al., 2021). Notably, this elevated probability does not necessarily extend across all burnout dimensions. Instead, physical education teachers appear particularly vulnerable to emotional exhaustion, whereas depersonalization and reduced personal accomplishment show more heterogeneous patterns across studies. This supports the view that burnout probability in physical education may be dimension-specific rather than global.

Empirical evidence from international large-scale surveys further indicates that workload density, administrative demands, and emotional strain are widespread features of teachers' work. Results from the OECD Teaching and Learning International Survey (TALIS 2024) show that a substantial proportion of teachers report high levels of work-related stress and time pressure, with notable variation across countries and career stages (OECD, 2025a). These findings underline that burnout probability is embedded in broader institutional contexts and cannot be explained by individual characteristics alone. At the same time, OECD analyses emphasize that resources such as professional autonomy, self-efficacy, and collaborative school cultures play a protective role by buffering the negative effects of high demands on teacher well-being (OECD, 2025a). In the Austrian context, national and regional reports point to moderate overall burnout prevalence while simultaneously revealing substantial within-group variation that cannot be explained by workload indicators alone (Unterbrink et al., 2007).

Recent research has further highlighted the broader health relevance of burnout prevalence in teaching. A meta-analysis by Madigan et al. (2023) demonstrates that teacher burnout is

associated not only with psychological strain but also with adverse physical health outcomes, including sleep disturbances, somatic complaints, and reduced overall well-being. These findings underline that burnout prevalence figures capture meaningful health-related risks rather than merely transient dissatisfaction. Methodological considerations further complicate the interpretation of burnout prevalence estimates. Reported rates vary depending on the version of the Maslach Burnout Inventory, the application of cut-off values, and whether burnout is assessed dimensionally or via composite indices (Rolloff et al., 2022). As a result, prevalence figures should be interpreted as indicators of risk rather than diagnostic statements. Moderate average burnout levels at the group level do not preclude the existence of high-risk subgroups within a teaching population, particularly in professions characterized by heterogeneous working conditions.

All in all, literature indicates that burnout probability among teachers is shaped by a combination of dimensional vulnerability, career-stage effects, subject-specific demands, and institutional context. Emotional exhaustion consistently emerges as the most informative indicator of burnout risk, while the likelihood of developing broader burnout symptomatology varies across individuals and educational settings. For physical education teachers, international evidence points toward a comparatively elevated risk profile with respect to emotional exhaustion, although subject-specific and national prevalence data remain limited.

1.4 Coping strategies in teaching

While burnout probability describes the extent of which teachers are affected by chronic occupational strain, research on coping strategies addresses the mechanisms through which teachers try to manage and regulate this strain. In the teaching profession, coping is not only an individual response to stress but also a key factor for shaping long-term professional functioning, well-being, and decreasing burnout risk.

Across educational research, coping strategies among teachers are commonly conceptualized along a continuum ranging from adaptive, engagement-oriented strategies to maladaptive, disengaging responses (Lazarus & Folkman, 1984; Greenglass et al., 1997). Adaptive coping typically includes problem-focused approaches, cognitive restructuring, and the active use of social support, whereas maladaptive coping encompasses avoidance, denial, behavioral withdrawal, and resignation. Importantly, empirical findings consistently show that the type

of coping strategy employed is more strongly related to burnout outcomes than the amount of stress experienced (Knoll et al., 2005; Roloff et al., 2022).

Recent person-oriented research has added important nuance to the relationship between coping strategies and burnout outcomes by demonstrating that strain and engagement can coexist within the same individuals. Using latent profile analyses, Holmström et al. (2023) identified distinct profiles of teachers characterized by different constellations of burnout symptoms and work engagement, including profiles marked by high emotional exhaustion alongside preserved engagement. From a coping perspective, these findings suggest that certain coping strategies may enable teachers to sustain engagement and professional functioning despite elevated strain, at least temporarily. At the same time, the existence of such profiles indicates that engagement-preserving coping does not necessarily imply the absence of vulnerability, as high exhaustion may persist beneath maintained performance and motivation.

In line with this interpretation, a substantial body of research emphasizes the protective role of adaptive coping strategies in the teaching profession. Teachers who actively seek collegial support, engage in structured problem-solving, or cognitively reappraise challenging situations tend to report lower emotional exhaustion, higher perceived self-efficacy, and greater job satisfaction (Greenglass et al., 1997; Unterbrink et al., 2007; Skaalvik & Skaalvik, 2017). These findings support the view that coping strategies oriented toward engagement and resource activation can buffer the negative effects of occupational stress, particularly in contexts where teachers perceive at least partial control over relevant stressors, such as classroom organization or instructional planning.

Subsequently, other authors caution against evaluating coping strategies independently of contextual conditions and temporal dynamics. Roloff et al. (2022) argue that coping strategies such as acceptance, emotional expression, or cognitive distancing may serve adaptive functions in the short term yet reflect resignation or helplessness under conditions of chronic and uncontrollable stress. From this perspective, strategies traditionally classified as adaptive may lose their protective function when teachers experience consistent constraints, limited autonomy, or insufficient institutional support. Similarly, maladaptive coping strategies, such as behavioral withdrawal, denial, and self-blame, have been consistently associated with higher emotional exhaustion and depersonalization across studies (Greenglass et al., 1997;

Knoll et al., 2005), suggesting that disengagement-oriented coping may accelerate rather than prevent burnout processes.

This ambivalence is particularly salient in the teaching profession, where many core stressors, like curricular mandates, student behavior, administrative demands, or institutional reforms, cannot be readily modified by individual teachers. In such contexts, coping strategies may function less as stable protective factors and more as situational responses whose effectiveness depends on perceived controllability and available resources. The profiles identified by Holmström et al. (2023) can thus be interpreted as reflecting temporary coping equilibria, in which engagement is maintained despite ongoing strain, rather than as evidence of sustainable protection against burnout.

Within physical education teaching, coping strategies appear especially critical due to the profession's high physical, emotional, and situational demands. PE teachers are frequently required to manage unpredictable classroom dynamics, safety-related risks, and emotionally charged interactions in real time. Empirical and qualitative studies indicate that PE teachers often rely on experiential coping strategies developed through repeated exposure to such demands, including rapid situational appraisal, emotional regulation, humor, and peer exchange (Richards & Templin, 2012; Cordova et al., 2023). While these strategies may support short-term classroom functioning and professional persistence, they do not necessarily protect against long-term emotional exhaustion if overall structural stressors remain unchanged.

Teaching experience further shapes coping repertoires. Research consistently shows that novice teachers are more likely to rely on emotion-focused and avoidant coping strategies, particularly when confronted with classroom management difficulties or perceived professional inadequacy (Caspersen & Raaen, 2014). In contrast, experienced teachers tend to report greater use of problem-focused coping, cognitive reappraisal, and selective disengagement from uncontrollable demands (Klusmann et al., 2012). This developmental shift does not imply reduced exposure to stressors but reflects more differentiated appraisal processes and accumulated coping strategies over the course of professional socialization.

Finally, institutional context plays a decisive role in determining whether coping strategies function adaptively or maladaptively. Supportive school climates, perceived organizational support, and opportunities for collaboration increase the likelihood that teachers engage in constructive coping strategies, whereas low autonomy and limited recognition are associated

with disengagement and emotional withdrawal (Unterbrink et al., 2007; Agyapong et al., 2022). For physical education teachers, limited material resources and the marginal status of the subject within school contexts may further constrain the effectiveness of adaptive coping strategies, increasing reliance on short-term emotion regulation or avoidance.

Taken as a whole, the literature does not support a simple classification of coping strategies as universally adaptive or maladaptive. Instead, coping emerges as a context-sensitive mechanism whose effects depend on professional experience, perceived control, and available resources. These insights call for empirical approaches that capture differentiated coping patterns and examine their associations with burnout dimensions across career stages and teaching contexts. Such an approach is particularly relevant in physical education teaching where high situational demands place sustained pressure on individual coping capacities.

1.5 The present research

The present study is grounded in the transactional model of stress and coping developed by Lazarus and Folkman (1984). Within this framework, stress is conceptualized as a dynamic process involving primary appraisal (the perception and evaluation of stressors), secondary appraisal (the assessment of available coping resources), and the implementation of coping responses. Stress therefore does not arise solely from objective occupational demands, but from the interaction between environmental conditions and the individual interpretation of those demands. Empirical research in educational contexts consistently demonstrates that teachers differ substantially in how they appraise identical classroom situations, even when operating under comparable structural conditions (Schaarschmidt et al., 2019; Cramer & Merk, 2018). Consequently, individual appraisal processes represent a central mechanism linking occupational demands to psychological strain and burnout outcomes. Building on this framework, the present study assumes that novice teachers may appraise similar classroom stressors as more threatening than experienced teachers due to less developed experiential schemas and less differentiated coping repertoires. Longitudinal findings suggest that appraisal patterns stabilize with increasing professional experience, as repeated exposure to challenging teaching situations enables the development of cognitive reference frames that reduce perceived uncertainty and threat (Caspersen & Raaen, 2014). Professional experience is therefore not assumed to reduce exposure to stressors themselves, but rather to influence how these stressors are interpreted and managed.

Recent research further indicates that the relationship between stress, coping, and burnout cannot be understood as a linear progression from occupational demands to psychological exhaustion. Person-oriented approaches demonstrate that burnout symptoms and work engagement may coexist within the same individuals, suggesting that teachers may maintain professional functioning despite elevated strain. Holmström et al. (2023), for example, identified distinct teacher profiles characterized by different constellations of emotional exhaustion and engagement, including groups displaying high levels of exhaustion alongside preserved work engagement. From a coping perspective, these findings suggest that coping processes may enable teachers to sustain motivation and professional involvement under demanding conditions, at least temporarily. At the same time, the coexistence of engagement and exhaustion indicate that maintained functioning does not necessarily reflect the absence of vulnerability, as prolonged exposure to strain may still contribute to the gradual development of burnout symptoms over time. This differentiated perspective aligns with findings from burnout prevalence research showing that emotional exhaustion often emerges independently of other burnout dimensions and may represent an early indicator of risk rather than a fully developed syndrome (Aloe et al., 2014; Roloff et al., 2022). Accordingly, variations in coping strategies and appraisal processes may help explain why teachers exposed to comparable demands develop different burnout patterns. Coping thus represents a central mechanism through which job demands are translated into either adaptive functioning or increasing vulnerability.

In addition to the transactional perspective, the Job Demands–Resources (JD-R) model provides a complementary theoretical framework for understanding occupational strain in teaching (Bakker & Demerouti, 2017). The model assumes that stress and motivation emerge from the interaction between job demands, such as workload, physical strain and emotional labor and job resources, including institutional support, autonomy, and collegial collaboration. High job demands are primarily associated with exhaustion processes, whereas insufficient job resources contribute to disengagement and depersonalization (Unterbrink et al., 2007). Importantly, recent research indicates that coping strategies are embedded within this demand–resource balance, as the effectiveness of coping depends on the availability of contextual resources and perceived controllability of stressors. Under such conditions, coping strategies may serve short-term regulatory functions without necessarily preventing long-term exhaustion, especially when structural stressors remain unchanged. This reinforces the

importance of examining coping not only as an individual characteristic but as a context-dependent process shaped by professional experience and working conditions.

Contemporary research increasingly integrates the transactional stress model with the JD-R framework, emphasizing perceived stress and coping as central mechanisms linking external working conditions to burnout outcomes (Roloff et al., 2022). From this integrative perspective, burnout among PE teachers can be understood as the result of interactions between occupational demands, available resources, individual appraisal processes, and coping strategies. Differences between novice and experienced teachers are therefore expected to emerge not only in experienced stress levels but also in the coping patterns through which stress is managed.

Due to this theoretical background, the present study aims to examine coping strategies and burnout dimensions among physical education teachers in Austria, with particular attention to differences between novice and experienced teachers and the role of teaching assignment (main versus minor subject). By adopting a differentiated perspective on coping and burnout, the study seeks to contribute to a more nuanced understanding of how occupational strain develops in physical education teaching.

1.6 Research question and hypotheses

Based on the theoretical frameworks of the transactional model of stress and coping (Lazarus & Folkman, 1984), as well as the empirical findings summarized in the preceding sections, the present study aims to examine differences in stress perception, coping strategies, and burnout symptoms among physical education teachers in Austria. Particular attention is given to teaching experience and subject combinations as potential factors associated with teachers' mental health and resilience.

Research Question:

“To what extent are occupational stressors, coping strategies, and burnout symptoms associated with teaching experience among physical education teachers in Austria, and do these associations differ between teachers with a second main subject and those with a second subsidiary subject?”

Hypothesis 1: Novice physical education teachers report higher levels of perceived stress and burnout symptoms than experienced physical education teachers.

Hypothesis 2: Physical education teachers whose second teaching subject is a subsidiary subject report lower levels of stress and burnout symptoms compared to those whose second subject is a main subject.

Hypothesis 3: Physical education teachers differ in their use of coping strategies depending on whether their second subject is a main subject or a subsidiary subject.

Hypothesis 4: Experienced physical education teachers report a greater use of adaptive coping strategies than novice physical education teachers.

Hypothesis 5: The use of adaptive coping strategies is negatively associated with burnout symptoms across all participants.

Hypothesis 6: Novice and experienced physical education teachers differ in their perceived classroom-related stressors.

2 Method

The present study employed a quantitative, cross-sectional design to investigate the relationships between occupational stressors, coping strategies, and burnout risk among physical education teachers in Austria. A standardized online questionnaire was administered via Scosci between September 2024 and January 2025 to capture data from teachers across different school types. The instruments used included the Maslach Burnout Inventory – Educators Survey (Maslach et al., 1996), the Brief COPE Inventory (Knoll et al., 2005), and a set of PE-specific classroom stressor items adapted from Heim and Klimek (1999) and Renner (2017).

All data were processed and analyzed using IBM SPSS Statistics 29, which facilitated systematic data cleaning, descriptive analyses, and inferential tests such as t-tests and chi-square analyses.

This structure follows standard methodological reporting practices to ensure transparency, replicability, and alignment with quantitative research conventions.

2.1 Sample and participant characteristics

The study sample consists of 59 physical education (PE) teachers drawn from various secondary school types across Austria, including *Allgemeinbildende Höhere Schulen* (AHS) at both lower and upper secondary levels, *Berufsbildende Höhere Schulen* (BHS), and *Neue Mittelschulen* (NMS). Most participants were employed in lower Austria and Vienna,

ensuring representation from both urban and suburban educational contexts. The sample was balanced in terms of teaching experience, which allowed for meaningful statistical comparisons between teacher subgroups.

Participants were divided into two groups based on professional experience:

Novice teachers (n = 30): less than five years of teaching experience

Experienced teachers (n = 29): five or more years of teaching experience

Demographic data collected included age, gender, teaching experience, school type, school location, and subject combination. Teachers were classified according to whether they taught PE in combination with a main subject (e.g., mathematics, English) or a subsidiary subject (e.g., history, geography). This distinction was included to analyze whether the type of second subject taught alongside PE influenced burnout risk and coping behaviors, as teaching load and subject complexity may vary between these groups.

The questionnaire was distributed online between September 2024 and January 2025 via personal and professional networks of the researcher, including colleagues from The University of Vienna and practicing teachers in Austrian schools.

Participation was voluntary, anonymous, and conducted in accordance with ethical research standards, with informed consent obtained before completion.

Table 1

<i>Participant demographics</i>			
Variable	Category	n	%
Gender	Male	31	53.4
	Female	27	46.6
Second subject type	Main subject (e.g. English,..)	17	29
	Subsidiary subject (e.g., History,..)	41	71
School type	AHS Oberstufe (AHS-os)	28	48
	AHS Unterstufe (AHS-us)	27	46
	BHS	12	21
	NMS	15	25
Total participants		59	100

2.2.1 Measures

The present study assessed burnout, coping strategies, and classroom-related stressors among physical education teachers using standardized self-report instruments. Burnout was measured using the Maslach Burnout Inventory – Educators Survey (MBI-ES; Maslach et al., 1996), which captures emotional exhaustion, depersonalization, and personal accomplishment. Coping strategies were assessed with the German version of the Brief COPE inventory (Knoll et al., 2005), which measures a range of cognitive and behavioral coping responses. Classroom-related stressors were assessed using a set of items adapted from Heim and Klimek (1999) and Renner (2017), specifically developed to capture typical stressors in physical education contexts.

All instruments were administered as part of a structured online questionnaire. Participants responded to all items using a standardized 4-point Likert scale ranging from *trifft nicht zu* (1) to *trifft zu* (4). Higher scores indicated higher levels of the respective constructs.

2.2.1.1 Burnout

Burnout was measured using the Maslach Burnout Inventory, the Educators Survey (MBI-ES), a widely established instrument for assessing occupational burnout in educational contexts. The MBI conceptualizes burnout as a multidimensional construct consisting of three components: Emotional Exhaustion (EE), Depersonalization (DP), and Personal Accomplishment (PA). Emotional Exhaustion (EE) comprises nine items (e.g., “Durch meine Arbeit bin ich gefühlsmäßig am Ende”) and reflects feelings of emotional depletion caused by work-related demands. Depersonalization (DP) consists of five items (e.g., “Ich glaube, ich behandle SchülerInnen zum Teil ziemlich unpersönlich”) and captures emotional detachment and cynical attitudes toward students. Personal Accomplishment (PA) represents a positive dimension of burnout and reflects teachers’ perceived effectiveness and competence in their professional role. In the present study, PA was assessed using a reduced set of five items (e.g., “Es gelingt mir gut, mich in meine SchülerInnen hineinzusetzen”), rather than the original eight items. Subscale scores for EE, DP, and PA were computed by averaging the respective items. As higher values on the PA scale indicate lower burnout, this

dimension was reverse-coded prior to further analysis so that higher values consistently reflected higher burnout levels across all subscales. In addition to the standard subscale-based approach, a composite burnout score was calculated by averaging Emotional Exhaustion, Depersonalization, and reversed Personal Accomplishment. This composite index provides an overall measure of burnout severity, with higher values indicating greater burnout risk.

The internal consistency of the burnout dimensions was assessed using Cronbach's alpha. Emotional Exhaustion demonstrated high reliability ($\alpha = .89$), Depersonalization showed good internal consistency ($\alpha = .81$), and Personal Accomplishment exhibited acceptable reliability ($\alpha = .74$). The comparatively lower reliability of the Personal Accomplishment subscale may be explained by the reduced number of items used in the present study. Similar composite approaches have been applied in previous research (e.g., Braun et al., 2024; De Silva et al., 2013).

2.2.1.2 Coping

To assess the coping behaviors of physical education teachers, the present study employed the German version of the Brief COPE inventory (Knoll, Rieckmann, & Schwarzer, 2005). This validated instrument measures the cognitive and behavioral strategies individuals use to manage stress and is particularly suited for capturing situational coping responses in educational settings. Participants rated 28 items on a four-point Likert scale, reflecting the extent to which they typically engage in various coping behaviors when faced with difficult or unpleasant situations.

The instrument includes 14 subscales: distraction, denial, emotional support, behavioral disengagement, positive reframing, humor, active coping, substance use, instrumental support, venting, planning, acceptance, self-blame, and religious coping. Each subscale is composed of two semantically related items, allowing for nuanced insights into coping styles. For analytical purposes, these coping strategies were further grouped into higher-order categories. Adaptive coping strategies included active coping, planning, positive reframing, acceptance, emotional support, and instrumental support, representing constructive efforts to manage or reappraise stressors. Maladaptive coping strategies comprised denial, behavioral disengagement, substance use, and self-blame, reflecting avoidant or dysfunctional responses associated with increased psychological strain. The remaining strategies, which did not fit either category, distraction, venting, humor, and religious coping, were classified as

ambivalent or context-dependent coping strategies, as their effectiveness may vary depending on situational and individual factors. The Brief COPE allows for a differentiated analysis of both adaptive and maladaptive strategies, (Carver, 1997; Agyapong et al., 2022; Cordova et al., 2023). This enables a comprehensive evaluation of the coping patterns used by novice and experienced physical education teachers in relation to stress and burnout outcomes.

This framework is rooted in the theoretical model of Lazarus and Folkman (1984), which conceptualizes coping as a dynamic response to perceived stressors. Knoll et al. (2005) further demonstrated that coping mechanisms such as problem-solving appraisal and efficacy beliefs are significantly associated with emotional outcomes in teaching contexts. Their findings indicate that teachers with higher self-efficacy and better problem-solving appraisal tend to experience more positive emotions and lower stress levels at school. Moreover, self-efficacy plays a mediating role between problem-solving ability and perceptions of collective-efficacy, thereby reinforcing the functional relevance of adaptive coping strategies.

2.2.1.3 Classroom stressors

This section of the questionnaire was designed to capture specific stress-inducing situations that physical education teachers regularly encounter during instruction. Drawing on the categorization developed by Heim and Klimek (1999), the items target typical situational demands within the PE context, which have been identified as salient stressors in previous research (Renner, 2017).

The scale consists of 23 items, which were grouped into six thematic subscales reflecting different domains of instructional strain: (1) classroom discipline issues (DISZ), referring to disruptive and conflictual student behavior (e.g., “Einzelne SchülerInnen stören den Sportunterricht erheblich durch ihr aggressives Verhalten”); (2) spatial and equipment constraints (RB), capturing limitations due to inadequate facilities or missing materials (e.g., “Die räumlichen Verhältnisse lassen einen vernünftigen Unterricht nicht zu”); (3) student motivation and grading problems (MOT), addressing low engagement and conflicts related to assessment (e.g., “Die SchülerInnen nehmen nur lustlos am Sportunterricht teil”); (4) curricular demands and mismatch (CV), referring to discrepancies between curricular requirements and student abilities or interests (e.g., “Einige Vorgaben des Lehrplans lassen sich im Unterricht nicht umsetzen”); (5) organizational difficulties with colleagues (ORGK), capturing coordination and communication problems within the teaching staff (e.g., “Notwendige Absprachen mit KollegInnen erfolgen zu spät”); and (6) physical strain on the

teacher (KB), reflecting the physical demands associated with demonstrating exercises and managing lessons (e.g., “Beim Vormachen gerate ich außer Atem”).

Participants responded using a 4-point Likert scale ranging from *trifft nicht zu* (1) to *trifft wenig zu* (2), *trifft manchmal zu* (3), and *trifft zu* (4), allowing for a differentiated self-assessment of how frequently these stressful classroom situations occur. As previous research shows, such context-specific factors can significantly contribute to increased stress and reduced teaching efficacy (Heim & Klimek, 1999). This part of the questionnaire was designed to capture specific stress-inducing situations that physical education teachers regularly encounter during instruction.

2.2 Data collection procedures

Data for this study were collected through an anonymous online questionnaire administered to physical education teachers across various Austrian school types, including Allgemeinbildende Höhere Schulen (AHS), Berufsbildende Höhere Schulen (BHS), and Neue Mittelschulen (NMS). The survey was distributed via online links through social media platforms. Prior to implementation, the study design and data collection procedures received approval from the relevant institutional review board to ensure adherence to ethical research standards and participation was entirely voluntary.

2.3 Data preparation and processing

Following data collection, the dataset was prepared and processed for statistical analysis. All questionnaire responses were screened for completeness and plausibility. No missing values were identified in the dataset; therefore, all cases were retained for analysis and no imputation procedures were necessary. All analyses were based on the complete set of observed data.

Scale scores were computed in accordance with the respective instrument guidelines. For the Maslach Burnout Inventory Educators Survey (MBI-ES; Maslach et al., 1996; Büssing & Perrar, 1992), mean scores were calculated for the subscales Emotional Exhaustion (EE), Depersonalization (DP), and Personal Accomplishment (PA). As higher values on the PA scale indicate lower burnout, PA scores were reverse-coded prior to further analysis. A composite burnout score was then calculated by averaging EE, DP, and reversed PA, resulting in an overall index in which higher values reflect higher burnout risk (De Silva et al., 2013; Fritz et al., 2015).

Classroom-related stressor scores were computed by averaging item responses within each of the six predefined subscales (student discipline issues, material and spatial conditions, motivational and assessment-related problems, curricular challenges, organizational difficulties, and physical strain), based on the categorization proposed by Heim and Klimek (1999) and applied in subsequent research (Renner, 2017; Wiesbauer, 2017).

Coping strategies were operationalized using the German version of the Brief COPE inventory (Knoll, Rieckmann, & Schwarzer, 2005). For each of the 14 coping subscales, mean scores were calculated by averaging the two corresponding items. In addition, coping strategies were grouped into higher-order categories (adaptive, maladaptive, and ambivalent coping) for further analyses.

Internal consistency of the burnout dimensions and coping subscales was assessed using Cronbach's alpha. All variables were coded consistently so that higher values reflected higher levels of the respective constructs.

2.4 Statistical analysis

All statistical analyses were conducted using IBM SPSS Statistics (Version 29). The analytical strategy followed a stepwise procedure to address the research questions and hypotheses concerning burnout, coping strategies, and classroom stressors among novice and experienced physical education teachers. Statistical significance was evaluated at the conventional level of $p < .05$. In addition, effect sizes were considered and all results, including non-significant findings, were interpreted to provide a comprehensive understanding of the data.

2.4.1 Descriptive analysis

Descriptive statistics were computed for all demographic variables, burnout subscales, classroom stressor dimensions, and coping strategies. Means, standard deviations, minimum and maximum values, and frequency distributions were calculated to provide an overview of the sample characteristics. Crosstabulation analyses were conducted to examine the distribution of gender across teaching experience groups. The results indicated a balanced distribution of male and female teachers in both groups. A chi-square test revealed no significant association between gender and teaching experience, $\chi^2(1) = 0.07$, $p = .792$. Graphical inspections, including histograms and boxplots, were performed to assess

distributional properties and identify potential outliers. These descriptive analyses served as the basis for selecting appropriate inferential statistical procedures.

2.4.2 Group comparisons

To examine differences between novice teachers (less than five years of teaching experience) and experienced teachers (five or more years of teaching experience), independent-samples *t*-tests were conducted for continuous variables, including burnout dimensions, the composite burnout score, classroom stressor subscales, and coping strategies. Effect sizes were calculated using Cohen's *d* to quantify the magnitude of observed differences. Chi-square tests of independence were applied to analyze associations between categorical variables such as gender, school type, subject combination, and teaching experience group. Where necessary, assumptions of expected cell frequencies were verified prior to analysis.

Additional group comparisons were conducted to examine differences between teachers with a second main subject and those with a subsidiary subject. These analyses followed the same statistical procedures as the experience-based comparisons.

2.4.3 Correlation analysis

Bivariate correlation analyses were performed to examine relationships between burnout dimensions, classroom stressor categories, coping strategies, and selected demographic variables. Pearson correlation coefficients were calculated for metrically scaled variables. Correlation matrices were computed for the total sample as well as for selected subgroups to explore potential differences in association patterns. These analyses provided a basis for identifying variables relevant for subsequent regression analyses.

2.4.4 Regression analysis

Multiple linear regression analyses were conducted to examine predictors of burnout risk. The composite burnout score served as the dependent variable. Independent variables included selected coping strategies, teaching experience, gender, and school-related characteristics. Prior to regression analyses, assumptions of linearity, homoscedasticity, and multicollinearity were assessed. Variance Inflation Factors (VIF) were calculated to evaluate multicollinearity among predictors, with all values remaining below commonly accepted thresholds. Regression coefficients, standard errors, standardized beta values, and confidence intervals were reported to assess the relative contribution of each predictor.

2.4.5 Analysis by school type

To examine differences in classroom stressors and burnout across school contexts, one-way analyses of variance (ANOVA) were conducted comparing teachers from different school types (AHS lower level, AHS upper level, BHS, NMS). Where significant unclear effects were observed, post-hoc comparisons were performed to identify specific group differences.

In summary, the statistical analyses comprised descriptive, comparative, correlational, and multivariate procedures to comprehensively examine burnout, coping strategies, and classroom-related stressors among physical education teachers. This multi-level analytical approach ensured that group differences, associations between key variables, and predictors of burnout risk were systematically addressed in accordance with the research questions and hypotheses.

3 Results

This chapter reports the quantitative findings on burnout symptoms, classroom-related stressors, and coping strategies among Austrian physical education teachers. The following results are presented in line with the research question and hypotheses and are structured into descriptives, group comparisons, correlations, regression, mediation, additional analyses by school type, and a summary of findings.

3.1 Descriptives

Descriptive statistics were calculated to examine the distribution of the main study variables. Means and standard deviations for burnout dimensions, coping strategies, and classroom stressors are reported in the following sections alongside the respective analyses. Overall, the data showed no irregularities and were suitable for subsequent inferential analyses.

3.1.1 Teaching experience and burnout

Hypothesis 1 postulated that novice physical education teachers experience higher levels of burnout than experienced teachers. Table 2 presents the means, standard deviations, and results of the independent-samples *t*-tests comparing novice and experienced teachers across the three burnout dimensions. As shown in Table 2, novice teachers reported higher mean levels of emotional exhaustion ($M = 2.10$, $SD = 0.65$) compared to experienced teachers ($M = 1.70$, $SD = 0.52$). Slightly higher mean values were also observed for depersonalization among novice teachers ($M = 1.76$, $SD = 0.66$) compared to experienced teachers ($M = 1.60$,

$SD = 0.55$). Similarly, novice teachers reported marginally higher values for reversed personal accomplishment ($M = 1.88$, $SD = 0.42$) than experienced teachers ($M = 1.77$, $SD = 0.45$).

Independent-samples t -tests also indicated that the difference in emotional exhaustion between novice and experienced teachers was statistically significant, $t(56) = 2.61$, $p = .012$, with a medium to large effect size ($d = 0.69$). In contrast, no statistically significant differences were found for depersonalization ($t(56) = 1.00$, $p = .323$, $d = 0.26$) or reversed personal accomplishment ($t(56) = 0.96$, $p = .340$, $d = 0.25$).

Table 2

Means, standard deviations, and group comparisons for burnout subscales

Subscale	Novice M	Novice SD	Experienced M	Experienced SD	t	p	d
Emotional Exhaustion	2.10	0.65	1.70	0.52	2.61	.012	0.69
Depersonalization	1.76	0.66	1.60	0.55	1.00	.323	0.26
Personal Accomplishment (rev.)	1.88	0.42	1.77	0.45	0.96	.340	0.25

Note. M = mean; SD = standard deviation.

As shown in Table 2, these findings provide partial support for Hypothesis 1, as novice teachers reported significantly higher levels of emotional exhaustion, whereas no significant group differences emerged for depersonalization or reversed personal accomplishment.

3.1.2 Burnout differences by second subject type

Hypothesis 2 proposed that physical education teachers whose second teaching subject is a subsidiary subject report lower levels of overall stress and burnout symptoms compared to teachers with a main subject. Descriptive results indicated only minor differences between groups. Teachers with a second main subject reported slightly higher levels of emotional exhaustion ($M = 2.06$, $SD = 0.62$) compared to those with a subsidiary subject ($M = 1.84$, $SD = 0.61$). Similarly, depersonalization scores were marginally higher among teachers with a main subject ($M = 1.71$, $SD = 0.69$) than among those with a subsidiary subject ($M = 1.67$, $SD = 0.58$). In contrast, reversed personal accomplishment scores were slightly higher among

teachers with a subsidiary subject ($M = 1.84$, $SD = 0.43$) compared to those with a main subject ($M = 1.79$, $SD = 0.47$).

However, independent-samples t -tests revealed that none of these differences reached statistical significance (all $p > .24$). Specifically, no significant group differences were found for reversed personal accomplishment ($p = .670$), emotional exhaustion ($p = .246$), or depersonalization ($p = .800$). Effect size estimates further supported this pattern. While emotional exhaustion showed a small effect (Cohen's $d = -0.34$), effect sizes for reversed personal accomplishment ($d = 0.13$) and depersonalization ($d = -0.08$) were negligible and therefore statistically irrelevant. Table 3 summarizes the descriptive statistics and group comparisons for burnout dimensions between teachers with a subsidiary subject and those with a second main subject.

Table 3

Burnout differences by teaching subject

Subscale	Subsidiary (M, SD)	Main (M, SD)	t	p	d
Emotional Exhaustion	1.84 (0.61)	2.06 (0.62)	-1.17	.246	-0.34
Depersonalization	1.67 (0.58)	1.71 (0.69)	-0.26	.800	-0.08
Personal Accomplishment (rev.)	1.84 (0.43)	1.79 (0.47)	0.43	.670	0.13

The descriptive results indicate only small differences between the two subject groups across the examined burnout dimensions. In conclusion, the given results do not support Hypothesis 2, although slight tendencies were observed, suggesting somewhat higher burnout levels among teachers with a main subject, these differences were small and not statistically reliable.

3.1.3 Coping strategies by subject type

Hypothesis 3 proposed that applied coping strategies differ depending on the type of second teaching subject next to physical education. To examine this assumption, independent-samples t -tests were conducted comparing teachers with a subsidiary subject to those with a second main subject across selected coping strategies.

Descriptive analyses revealed only small and inconsistent group differences across overall coping strategies. Teachers with a main subject reported slightly higher levels of planning ($M = 3.41$, $SD = 0.61$) and emotional expression ($M = 2.53$, $SD = 0.72$) compared to teachers teaching a subsidiary subject ($M = 3.12$, $SD = 0.65$; $M = 2.26$, $SD = 0.68$). In contrast, teachers with a subsidiary subject reported marginally higher levels of active coping as well as emotional support. However, independent-samples t -tests indicated that none of the observed differences reached statistical significance (all $p \geq .133$). Effect size estimates ranged from small to moderate, but all confidence intervals included zero.

Therefore, the results do not support Hypothesis 3, as no statistically significant differences in coping strategies emerged between teachers with different subject combinations.

3.1.4 Coping strategies by experience

Hypothesis 4 proposed that experienced physical education teachers report a greater use of adaptive coping strategies than novice teachers. To test this assumption, independent-samples t -tests were conducted comparing novice teachers and experienced teachers across aggregated coping dimensions. Table 4 presents the descriptive statistics and inferential results.

Descriptive results indicated only minimal differences between the two main groups. Experienced teachers reported slightly higher levels of adaptive coping ($M = 3.00$, $SD = 0.32$) compared to novice teachers ($M = 2.96$, $SD = 0.39$). In contrast, novice teachers showed marginally higher levels of maladaptive coping ($M = 1.78$, $SD = 0.45$) than experienced teachers ($M = 1.70$, $SD = 0.48$). Ambivalent coping strategies were nearly identical across groups. However, independent-samples t -tests revealed that none of these differences were statistically significant. Specifically, no important differences were found for adaptive coping, $t(56) = -0.47$, $p = .643$, maladaptive coping, $t(56) = 0.70$, $p = .486$, or ambivalent coping, $t(56) = -0.08$, $p = .934$. Effect size estimates further supported this pattern, indicating only very small differences between experience groups (adaptive coping: $d = -0.12$; maladaptive coping: $d = 0.18$; ambivalent coping: $d = -0.02$). Table 4 provides an overview of the coping dimensions among novice and experienced physical education teachers.

Table 4*Coping differences between novice and experienced teachers*

Coping dimension	Novice (M, SD)	Experienced (M, SD)	t	p	d
Adaptive coping	2.96 (0.39)	3.00 (0.32)	-0.47	.643	-0.12
Maladaptive coping	1.78 (0.45)	1.70 (0.48)	0.70	.486	0.18
Ambivalent coping	2.28 (0.40)	2.29 (0.39)	-0.08	.934	-0.02

As displayed in Table 4, coping profiles were highly similar across both experience groups. All in all, these findings do not support Hypothesis 4, although experienced teachers showed a slight tendency toward more adaptive and less maladaptive coping, these differences were minimal and not statistically reliable.

3.1.5 Classroom stressors by teaching experience

To examine whether novice and experienced physical education teachers differ in their perceived classroom-related stressors, independent-samples t-tests were conducted across six stressor domains: classroom discipline, spatial and material constraints, motivational and grading-related problems, curricular demands, collegial interaction and physical strain.

Contrary to Hypothesis 6, no statistically significant differences were found between novice and experienced teachers for any of the examined stressor dimensions (all $p \geq .118$).

However, descriptive patterns revealed meaningful tendencies. Novice teachers reported higher levels of stress related to classroom discipline ($M = 2.70$, $SD = 0.77$ vs. $M = 2.37$, $SD = 0.80$) and curricular demands ($M = 2.74$, $SD = 0.64$ vs. $M = 2.58$, $SD = 0.88$), whereas experienced teachers showed slightly higher levels of stress related to collegial interaction ($M = 2.52$ vs. $M = 2.37$) and physical strain ($M = 2.31$ vs. $M = 2.11$).

Effect size estimates indicated small to moderate differences, particularly for discipline-related stress (Cohen's $d = 0.42$), suggesting that novice teachers may experience greater challenges in classroom management. Nevertheless, all confidence intervals included zero, indicating that these effects are not statistically robust. Table 5 summarizes the descriptive

statistics and group comparisons for classroom-related stressors among novice and experienced teachers.

Table 3

<i>Group differences in perceived stressor domains</i>							
Stressor domain	Novice M	Novice SD	Experienced M	Experienced SD	t	p	d
Classroom discipline	2.70	0.77	2.37	0.80	1.59	.118	0.42
Spatial constraints	2.03	0.94	2.14	0.92	0.43	.673	0.11
Grading problems	1.88	0.62	1.80	0.55	0.49	.625	0.13
Curricular demands	2.74	0.64	2.58	0.88	0.81	.420	0.21
Collegial interaction	2.37	0.65	2.52	0.62	0.89	.382	0.23
Physical strain	2.11	0.55	2.31	0.76	1.13	.265	0.29

Note. M = mean; SD = standard deviation.

Although several descriptive tendencies emerged, none of the classroom stressor dimensions differed significantly between the two groups. Hypothesis 6 is therefore not supported, as perceived classroom stressors did not significantly differ between novice and experienced teachers. However, the observed tendencies point toward qualitatively different stress profiles across career stages.

3.2 Correlations

To examine the relationships between burnout and coping strategies, Pearson correlation analyses were conducted. The results revealed several significant associations between burnout and different coping strategies. Maladaptive coping strategies were positively associated with burnout. In particular, behavioral disengagement showed a strong positive correlation ($r = .651, p < .001$), indicating that higher levels of withdrawal are linked to increased burnout. Additionally, denial ($r = .405, p = .002$), self-blame ($r = .408, p = .001$), and substance use ($r = .371, p = .004$) were moderately associated with higher burnout levels.

In contrast, adaptive coping strategies were negatively associated with burnout. Active coping ($r = -.535, p < .001$) showed a strong negative relationship, while positive reframing ($r = -.427, p < .001$) and planning ($r = -.308, p = .019$) demonstrated moderate negative associations. These findings indicate that teachers who more frequently engage in adaptive coping strategies tend to report lower levels of burnout. Teaching experience was not

significantly correlated with burnout ($r = -.242, p = .067$). Table 6 presents the Pearson correlations between burnout and the examined coping strategies as well as teaching experience.

Table 4

Correlations between coping strategies and burnout

Variable	Burnout, r
Verhaltensrückzug	.651**
Aktive Bewältigung	-.535**
Positive Umdeutung	-.427**
Selbstbeschuldigung	.408**
Verleugnung	.405**
Alkohol	.371**
Planung	-.308*

Note. r = Pearson correlation coefficient. * $p < .05$. ** $p < .01$.

Several coping strategies demonstrated significant associations with burnout, particularly behavioral withdrawal and active coping. Overall, these findings support Hypothesis 5, indicating that adaptive coping strategies are negatively associated with burnout, whereas maladaptive coping strategies are positively associated with burnout probability.

3.3 Regression

To examine the combined influence of coping strategies and teaching experience on burnout, a multiple linear regression analysis was conducted with total burnout as the dependent variable. The overall regression model was statistically significant, $F(15, 42) = 8.73, p < .001$, indicating that the set of predictors reliably explained variance in burnout. The model accounted for a substantial proportion of variance ($R^2 = .757$; adjusted $R^2 = .671$), suggesting a strong overall model fit.

Regarding individual predictors, several variables emerged as significant contributors to burnout. Behavioral withdrawal was the strongest positive predictor ($\beta = .396, p < .001$), indicating that higher levels of withdrawal were associated with increased burnout symptoms. Humor was also positively associated with burnout ($\beta = .242, p = .012$). In contrast, active coping was negatively associated with burnout ($\beta = -.217, p = .041$), indicating that higher

levels of active coping were associated with lower burnout levels. Teaching experience additionally emerged as a significant negative predictor ($\beta = -.263, p = .005$), suggesting that more experienced teachers reported lower burnout levels when controlling for coping strategies. Several additional predictors showed non-significant trends. Religion approached statistical significance ($p = .053$), while self-blame ($p = .078$) and alcohol use ($p = .097$) demonstrated weaker positive associations with burnout. Other coping strategies, including planning, positive reframing, emotional support, instrumental support, denial, acceptance, and emotional expression, did not significantly predict burnout when controlling for the remaining variables (all $p > .05$). Table 7 summarizes the results of the multiple linear regression analysis predicting burnout from coping strategies and teaching experience.

Table 5

Multiple linear regression predicting burnout

Predictor	B	SE	β	t	p
Constant	1.73	0.45	—	3.87	< .001
Behavioral withdrawal	0.31	0.08	.40	3.86	< .001
Humor	0.14	0.05	.24	2.63	.012
Active coping	-0.17	0.08	-.22	-2.11	.041
Teaching experience	-0.24	0.08	-.26	-2.99	.005
Alcohol use	0.11	0.06	.16	1.70	.097
Self-blame	0.11	0.06	.19	1.81	.078
Religion	0.11	0.06	.17	1.99	.053
Distraction	0.11	0.07	.16	1.63	.110
Positive reframing	-0.10	0.08	-.13	-1.25	.217
Planning	-0.07	0.07	-.10	-1.09	.282
Instrumental support	-0.06	0.07	-.09	-0.79	.432
Emotional support	-0.03	0.08	-.05	-0.41	.686
Emotional expression	-0.01	0.06	-.02	-0.22	.830
Acceptance	0.04	0.07	.06	0.62	.539
Denial	0.00	0.07	.00	0.03	.975

Note. B = unstandardized coefficient; SE = standard error; β = standardized coefficient.

The regression model identified behavioral withdrawal and humor as positive predictors of burnout, whereas active coping and teaching experience were negatively associated with burnout levels.

3.4 Additional analyses

To further examine the role of school context, school types were included as predictors in a multiple regression analysis. As teachers could report teaching in multiple school types, school context was operationalized using dummy-coded variables (0 = no, 1 = yes).

The overall regression model was not statistically significant, $F(4, 53) = 1.31, p = .280$, and explained only a small proportion of variance in burnout ($R^2 = .090$; adjusted $R^2 = .021$). None of the school type variables significantly predicted burnout (all $p > .18$).

Although all regression coefficients were negative, indicating a tendency toward slightly lower burnout levels across school types, these effects were small and not statistically reliable. Overall, the findings suggest that school context does not play a significant role in explaining burnout among physical education teachers in this sample.

3.5 Summary of findings

Overall, First, partial support was found for Hypothesis 1. Novice teachers reported significantly higher levels of emotional exhaustion compared to experienced teachers, while no significant differences emerged for depersonalization or personal accomplishment. This suggests that emotional exhaustion represents the most sensitive indicator of burnout, in the early career phase.

In contrast, Hypothesis 2 was not supported. No significant differences in burnout were found between teachers with a second main subject and those with a subsidiary subject. Although slight tendencies indicated somewhat higher burnout levels among teachers with a main subject, these differences were small and not statistically significant. Similarly, Hypothesis 4 was not supported. Experienced teachers did not report significantly higher levels of adaptive coping strategies compared to novice teachers. Although minor tendencies suggested slightly more adaptive and less maladaptive coping among experienced teachers, these effects were negligible. Consistent with this pattern, no significant differences in coping strategies were found between teachers with different subject combinations. This indicates that coping behavior appears to be largely independent of both teaching experience and subject structure.

In contrast, strong support was found for Hypothesis 5. Correlational analyses revealed that burnout was significantly associated with coping strategies. Maladaptive coping strategies, particularly behavioral withdrawal, denial, self-blame, and substance use, were positively related to burnout probability. In contrast, adaptive coping strategies such as active coping, positive reframing, and planning were negatively associated with burnout. These findings highlight coping behavior as a central factor in understanding burnout.

The results for classroom stressors (Hypothesis 6) showed no statistically significant differences between novice and experienced teachers. However, descriptive patterns indicated that novice teachers tend to experience more stress related to classroom discipline and curricular demands, whereas experienced teachers reported slightly higher levels of stress related to collegial interaction and physical strain. These findings suggest qualitative differences in stress experiences across career stages rather than clear quantitative differences. Finally, the multiple regression analysis provided the strongest evidence for the central role of coping strategies. The model explained a substantial proportion of variance in burnout. Behavioral withdrawal emerged as the strongest positive predictor of burnout, while active coping and teaching experience were identified as protective factors. Notably, not all coping strategies contributed equally, indicating that specific coping patterns are particularly relevant for burnout development. Additional analyses showed that school type did not significantly predict burnout, suggesting that contextual school characteristics play a minor role compared to individual coping processes.

All in all, burnout among physical education teachers is primarily driven by coping strategies rather than by teaching experience, subject combination, or school context, according to these results.

4 Discussion

The present study aimed to examine how burnout symptoms among Austrian physical education teachers are associated with teaching experience, classroom-related stressors, and coping strategies. Drawing on the Maslach Burnout Inventory (MBI) as the central conceptual basis, the analysis focused primarily on differences between novice and experienced teachers, while also considering the role of subject combinations. Overall, the results indicate that burnout in physical education teaching cannot be sufficiently explained by structural characteristics alone. While differences in teaching experience were evident in specific dimensions of burnout, most group comparisons did not reach statistical significance.

This indicates that factors such as experience, subject combination, or school context may play a more limited role than initially assumed. Similar observations have been reported in previous research, where structural variables showed inconsistent or weak associations with burnout outcomes (Richards et al., 2018; Klinge, 2018). Instead, the results point toward a more differentiated pattern, in which burnout appears to be predominantly linked to specific psychological processes. Coping strategies showed the strongest and most consistent associations with burnout. This is especially evident in the strong positive correlation between behavioral withdrawal and burnout ($r = .651$), as well as the negative association with active coping. These results are in line with existing research emphasizing that individual responses to stressors are often more predictive of burnout than the stressors themselves (Knoll et al., 2005; Roloff et al., 2022). At the same time, the present findings extend this perspective by demonstrating that not all coping strategies contribute equally, but that specific forms of coping are more relevant than others.

Regarding teaching experience, the results confirm existing literature partially. While novice teachers reported higher levels of emotional exhaustion, no consistent differences were observed for other burnout dimensions, coping strategies, or classroom stressors. This suggests that the role of experience is more limited and dimension-specific than assumed, rather than functioning as a general protective factor against burnout. Taken together, the results contribute to a more differentiated understanding of burnout in physical education teaching. Rather than being driven by single factors such as teaching experience or working conditions, burnout appears to emerge from the interaction between occupational demands and individual coping processes. This interpretation is consistent with the transactional model of stress and coping (Lazarus & Folkman, 1984), which emphasizes that stress outcomes depend on how individuals appraise and manage situational demands.

Consequently, in relation to the research question, the results suggest that differences between novice and experienced teachers are less relevant for explaining burnout than initially assumed. Instead, the way teachers cope with classroom-related demands appears to be the central mechanism underlying burnout risk. This highlights the importance of moving beyond purely structural explanations and adopting a more process-oriented perspective on burnout in physical education teaching.

4.1 Summary of key findings and hypothesis evaluation

The empirical findings provide a differentiated picture of burnout among physical education teachers and offer only limited support for the initially proposed group differences. While some hypotheses were partially confirmed, the overall pattern suggests that burnout is not consistently associated with structural characteristics such as teaching experience or subject combination.

Regarding teaching experience, Hypothesis 1 was only partially supported. Novice teachers reported significantly higher levels of emotional exhaustion, $t(56) = 2.61, p = .012, d = 0.69$, whereas no differences were observed for aspects of depersonalization or personal accomplishment. This indicates that early-career vulnerability is primarily reflected in emotional exhaustion, while other dimensions of burnout remain comparatively stable across experience levels. In contrast, the remaining group-based hypotheses (H2, H3, H4, and H6) were not supported. Neither subject combination nor teaching experience was associated with significant differences in coping strategies or with classroom-related stressors. Although some descriptive tendencies were observed, these did not reach statistical significance levels, suggesting that such structural factors may be less influential than assumed.

A different pattern emerged for Hypothesis 5, which was clearly supported. Adaptive coping showed a significant negative association with burnout ($r = -.374, p = .004$), while maladaptive coping strategies, particularly behavioral withdrawal, were strongly positively associated with burnout ($r = .651$). These effect sizes indicate that coping strategies represent a more powerful explanatory factor than the examined group differences.

Taken together, the results from this analysis suggest that burnout among physical education teachers is not primarily determined by experience-related or even by contextual differences, but rather by the way individual teachers respond to occupational demands social occupations bring. While novice teachers appear to be more vulnerable towards emotional exhaustion, adaptive coping strategies emerge as the central mechanism underlying burnout risk. Table 8 provides an overview of the six hypotheses of this thesis and their underlying empirical evaluation.

Table 6*Summary of hypotheses and results*

Hypothesis	Statement	Result
H1	Novice PE teachers report higher burnout	Partially supported
H2	Subsidiary vs main subject differences	Not supported
H3	Coping differs by subject	Not supported
H4	Experienced use more adaptive coping	Not supported
H5	Adaptive coping negatively related to burnout	Supported
H6	Differences in stressors	Not supported

Overall, only a limited number of the proposed group differences were supported, whereas coping-related hypotheses received stronger empirical support. At the same time, the limited number of supported hypotheses highlights the need to reconsider common assumptions about the determinants of teacher burnout. In particular, the absence of consistent group differences suggests that burnout may be less dependent on structural characteristics than often assumed and may instead reflect more individualized processes.

4.2 Interpretation of findings in the context of the literature

4.2.1 Early-career vulnerability and burnout development

One of the clearest findings of the present study is that novice physical education teachers reported significantly higher levels of emotional exhaustion than experienced teachers, $t(56) = 2.61, p = .012, d = 0.69$, whereas no statistically significant differences were found for depersonalization or personal accomplishment. Accordingly, early-career vulnerability in this sample appears to be reflected primarily in emotional exhaustion rather than in a fully developed burnout profile.

This analysis corresponds closely with the conceptualization of burnout proposed by Maslach et al. (1996), who describe emotional exhaustion as the central and earliest component of the syndrome. From this perspective, exhaustion represents an immediate response to persistent occupational demands, whereas depersonalization and reduced personal accomplishment tend

to emerge more gradually over time. The present results support this multidimensional understanding, as only the exhaustion component differed significantly between novice and experienced teachers.

Research on teacher burnout further reinforces this interpretation. Klusmann et al. (2012) and Roloff et al. (2022) emphasize that the transition into the teaching profession is often characterized by uncertainty, high personal expectations, and the simultaneous development of professional routines. Especially during the first years of teaching, many educators experience a discrepancy between idealized expectations of the profession and the realities of everyday school life. In this regard, emotional exhaustion may reflect not only high workload, but also the psychological demands associated with professional adaptation and role development.

At the same time, the absence of significant differences in depersonalization and personal accomplishment suggests that novice teachers in the present sample have not yet developed the more chronic or distancing aspects of burnout. This finding partly contrasts with meta-analytic evidence reported by Aloe et al. (2014), who identified stronger associations between low teaching experience and depersonalization. However, the present results align more closely with studies suggesting that early-career teachers often remain highly motivated and professionally engaged despite elevated stress levels (Roloff et al., 2022). Particularly in physical education, teaching is frequently associated with high levels of interaction, movement, and immediate feedback from students, which may contribute to maintaining a sense of competence and involvement even under stressful conditions. Beyond the specific context of physical education, the findings also support transactional models of stress and coping (Lazarus & Folkman, 1984), according to which stress outcomes depend less on objective demands alone and more on the subjective appraisal of these demands and the resources available to manage them. Novice teachers may therefore experience emotional exhaustion not solely because they encounter more stressors, but because they have not yet developed stable routines, professional confidence, or effective coping repertoires to the same extent as experienced teachers.

In relation to the research question, the findings indicate that differences between novice and experienced teachers are more limited and dimension-specific than initially assumed. While early-career teachers appear particularly vulnerable to emotional exhaustion, broader differences in burnout were not observed. This suggests that teaching experience alone is

insufficient to explain burnout development and that psychological and situational processes must also be considered.

4.2.2 Subject combination and occupational strain

This study did not reveal any statistically significant differences in burnout symptoms between physical education teachers with a second main subject and those with a subsidiary subject. Although teachers with a second main subject reported slightly higher levels of emotional exhaustion and depersonalization on a descriptive level, these tendencies remained relatively small and statistically non-significant. As a result, Hypothesis 2 could not be supported in the context of this research.

From a theoretical perspective, this result appears somewhat unexpected. Existing literature has repeatedly suggested that teachers with academically demanding second subjects may experience higher occupational strain due to increased preparation requirements, grading responsibilities, and organizational workload (Richards & Templin, 2012; Klinge, 2018). Based on these assumptions, teachers with a second main subject would theoretically be expected to report higher burnout scores than teachers whose second subject plays a more subsidiary role. However, present findings indicate that structural workload characteristics alone may not sufficiently explain burnout risk. This interpretation is consistent with research emphasizing that burnout is influenced less by objective working conditions than by the interaction between perceived demands, available resources as well as by individual coping processes (Bakker & Demerouti, 2017; Klusmann et al., 2012). In this context, it is possible that teachers experience similar workload conditions quite differently depending on factors such as perceived control, self-efficacy, or even professional identity.

Another important consideration concerns the role of professional meaning and subject identification. Previous research has shown that physical education teachers often report strong intrinsic motivation and high emotional involvement in their subject area (Richards et al., 2018). It is therefore conceivable that teachers with a second main subject do not necessarily perceive this broader teaching profile exclusively as an additional burden, but potentially as professional enrichment or increased variety within their work. Such positive appraisals may compensate for some of the additional organizational demands associated with a second main subject. At the same time, methodological factors should also be considered when interpreting the findings. The group sizes within the present sample were

unequally distributed, with substantially more teachers belonging to the subsidiary-subject group than to the main-subject group. This imbalance may have reduced the statistical power necessary to detect smaller group differences. Consequently, subtle workload-related effects cannot be ruled out entirely.

Taking everything into account shows that subject combination may play a less central role in burnout development than initially assumed. Rather than reflecting purely structural characteristics of teaching, burnout among physical education teachers appears to be shaped more strongly by subjective appraisal processes and individual coping behavior. This interpretation corresponds with the broader pattern of results observed throughout the present study.

4.2.3 Experience and coping behavior

The overall assumption of experienced teachers reporting more adaptive coping strategies than their novice counterparts was not supported by the present findings. Although experienced physical education teachers showed slightly higher levels of using adaptive coping strategies and somewhat lower levels of maladaptive coping usage, these differences were small and statistically non-significant. Consequently, coping behavior in this sample appears to be less strongly associated with professional experience than expected.

Within the literature on teacher stress and coping, coping strategies are frequently conceptualized as processes that develop alongside professional competence and occupational experience. The transactional stress theory assumes that repeated exposure to stressful situations contributes to more differentiated appraisal processes and increasingly effective coping responses over time (Lazarus & Folkman, 1984). Similarly, Cramer and Merk (2018) argue that experienced teachers often develop greater confidence and behavioral stability when managing occupational stressors. Based on these assumptions, stronger differences between novice and experienced teachers would have been theoretically plausible. At the same time, empirical findings in this area remain inconsistent. While some studies report positive associations between professional experience and adaptive coping, others emphasize that coping styles are influenced more strongly by personality-related characteristics, perceived self-efficacy, and situational factors than by years of experience alone (Knoll et al., 2005; Roloff et al., 2022). The present results support this latter interpretation. Despite minor descriptive differences, the coping profiles of novice and

experienced teachers were remarkably similar overall. One possible explanation for that would be that coping behavior reflects relatively stable on individual tendencies that are not fundamentally altered through professional experience. Teachers may differ less in whether they experience stress and more in how they habitually respond to demanding situations or stressful situations. In this regard, coping may function as a comparatively stable psychological process shaped by appraisal patterns, emotional regulation, and perceived control rather than by career stage and age alone.

Moreover, the present findings indicate that coping should not primarily be understood as a group-related characteristic, but rather as an individual-level predictor of burnout. This interpretation is strongly supported by the correlation and regression analyses, which identified coping strategies as the most substantial predictors of burnout symptoms within the entire study. In particular, behavioral withdrawal showed a strong positive association with burnout, whereas active coping emerged more as a protective factor. These results suggest that the relevance of coping lies less in differences between novice and experienced teachers and more in the specific strategies individuals apply when dealing with occupational demands. With regard to the research question, these specific findings therefore indicate that professional experience alone does not adequately explain differences in coping behavior among physical education teachers. Instead, burnout risk appears to depend more strongly on individual coping patterns and subjective stress appraisal processes than on years of teaching experience.

4.2.4 Coping strategies and subject combination

The present study did not identify statistically significant differences in coping strategies between physical education teachers with a second main subject and those with a subsidiary subject. Although some descriptive tendencies were observable, particularly regarding planning as well as emotional expression, the overall pattern remained inconsistent and also statistically non-significant. Accordingly, the assumption that teachers with different subject combinations would display distinct coping profiles could not be confirmed.

Previous research has frequently suggested that occupational demands and workload characteristics influence the selection of coping strategies (Lazarus & Folkman, 1984; Knoll et al., 2005). From this perspective, teachers facing greater organizational and cognitive demands would be expected to rely more strongly on certain coping mechanisms to manage

professional stress. In the context of physical education teaching, it therefore appeared plausible that teachers with a second main subject might develop different coping patterns due to the broader range of instructional responsibilities and preparation requirements associated with their teaching profile. However, the present findings indicate that coping behavior may be less dependent on formal teaching characteristics than assumed. Rather than reflecting structural differences between subject combinations, coping strategies appear to be shaped more strongly by individual appraisal processes and personal coping tendencies. This interpretation corresponds with research emphasizing that coping represents a highly individualized process influenced by factors such as self-efficacy, emotional regulation, personality traits, and perceived control over stressful situations (Knoll et al., 2005; Roloff et al., 2022). Additionally, the absence of clear group differences may also suggest that physical education teachers share similar occupational experiences regardless of their second subject. Previous studies have highlighted that PE teachers often develop strong professional identities linked to movement, interaction, and practical teaching experiences (Richards et al., 2018). Such shared professional characteristics may contribute to relatively similar coping profiles across different subject combinations, even when structural workload differences exist. At the same time, the descriptive tendencies observed in the present study should not be disregarded completely. Teachers with a second main subject reported somewhat higher levels of planning and emotional expression, which could indicate a greater need for organizational and emotional regulation strategies when dealing with more complex teaching responsibilities. Although these differences were not statistically significant, they may still point toward subtle variations that could become more visible in larger and more balanced samples.

Overall, the findings suggest that coping strategies among physical education teachers are not necessarily determined mainly by subject combination. Instead, the results support the broader pattern observed throughout the study, namely that burnout-related processes are shaped less by structural teaching characteristics and more by individual ways of perceiving and managing occupational demands.

4.2.5 Predictors of burnout: a multivariate perspective

A particularly important finding of the present study emerged from the correlation and regression analyses examining the combined influence of coping strategies and teaching experience on burnout. In contrast to the comparatively weak effects observed for structural

characteristics such as subject combination or classroom stressors, several coping strategies showed strong and consistent associations with burnout symptoms. Most notably, behavioral withdrawal emerged as the strongest positive predictor of burnout, whereas active coping was overall negatively associated with burnout levels. In addition, teaching experience remained a significant negative predictor within the regression model, even after controlling for coping variables.

These findings are largely consistent with previous research emphasizing the central role of coping processes in the development and maintenance of burnout symptoms (Knoll et al., 2005; Roloff et al., 2022). Within transactional stress models, burnout is not understood as a direct consequence of occupational demands alone, but rather as the result of how individuals appraise and respond to these specific demands (Lazarus & Folkman, 1984). From this perspective, maladaptive coping strategies such as behavioral withdrawal may intensify burnout because they reduce active engagement with stressful situations and limit opportunities for problem-solving or emotional regulation. The particularly strong association between behavioral withdrawal and burnout observed in the present study is also supported by previous findings in teacher burnout research. Disengagement-oriented coping strategies have repeatedly been associated with emotional exhaustion, reduced professional efficacy, and psychological strain (Cramer & Merk, 2018). Teachers who increasingly withdraw from occupational demands may temporarily reduce situational stress, but over time such strategies may contribute to feelings of helplessness, loss of control, and chronic exhaustion. In this regard, the present findings support the assumption that avoidance-related coping strategies represent a substantial risk factor for burnout development. Hence, active coping emerged as a protective factor against burnout. Teachers who reported higher levels of active coping also tended to report lower burnout symptoms. This finding corresponds with studies suggesting that problem-focused coping strategies are associated with greater perceived control, higher self-efficacy, and lower occupational strain (Knoll et al., 2005). However, the present results also indicate that coping should not simply be divided into “adaptive” and “maladaptive” categories. Not all theoretically adaptive strategies showed protective effects in the regression model, and humor was even positively associated with burnout. This suggests that the effectiveness of coping strategies may depend strongly on context, frequency, and underlying motivational processes.

Another important aspect of the regression analysis is that teaching experience remained a significant predictor of lower burnout levels once coping variables were included in the model, despite the comparatively small direct correlations observed in earlier analyses. This result suggests that professional experience may still provide certain protective resources, such as greater professional confidence, emotional stability, or more effective stress appraisal processes. Nevertheless, the considerably stronger effects of coping variables indicate that burnout among physical education teachers is influenced more strongly by individual coping patterns than by experience alone.

Taken all this into account, the multivariate analyses support a process-oriented understanding of the overall burnout development. While structural and demographic factors showed comparatively limited explanatory value throughout the study, coping strategies consistently emerged as the most relevant predictors of burnout symptoms. In relation to the research question, the findings therefore suggest that burnout risk among physical education teachers is shaped less by external teaching conditions and more by the ways in which occupational demands are psychologically processed and managed.

4.2.6 Classroom stressors and professional demands

The present study did not reveal statistically significant differences between novice and experienced physical education teachers regarding classroom-related stressors. Although novice teachers reported slightly higher levels of stress associated with classroom discipline and curricular demands, these differences remained below conventional significance thresholds. Consequently, Hypothesis 6 could not be supported. Nevertheless, the descriptive tendencies observed in the data still provide valuable insights into how occupational demands may be experienced across different career stages.

Within the literature on teacher stress, classroom-related demands are consistently described as one of the most relevant sources of occupational strain (Aloe et al., 2014; Richards & Templin, 2012). In physical education specifically, stressors such as maintaining discipline, ensuring student safety, managing group dynamics, and organizing lesson transitions are often emphasized as particularly demanding aspects of the teaching profession (Richards et al., 2018; Klinge, 2018). Based on these results, it appeared plausible that novice teachers would experience significantly higher stress levels, especially in areas requiring classroom management and organizational control. Although the present results did not confirm significant group differences, the descriptive pattern partly aligns with previous research.

Novice teachers reported somewhat higher stress related to classroom discipline and curricular demands, which may reflect the challenges associated with developing professional routines and establishing authority within the classroom. Early-career teachers often enter the profession with limited practical experience and may therefore perceive demanding classroom situations as more stressful than their more experienced colleagues (Klusmann et al., 2012). In this regard, the observed tendencies correspond with the broader literature on early-career teacher vulnerability. Furthermore, the relatively small differences between experience groups suggest that occupational demands in physical education are not experienced exclusively as early-career challenges. Certain stressors may remain relatively stable throughout the teaching career because they are closely connected to the structural characteristics of school environments rather than to individual teaching experiences. Factors such as curricular expectations, institutional constraints, student behavior, or organizational pressure affect teachers across all career stages and may therefore contribute to a comparatively shared stress profile among physical education teachers. Therefore, the results support previous research indicating that the relationship between occupational demands and burnout is not purely direct but depends strongly on the resources available to teachers and on their individual coping processes (Bakker & Demerouti, 2017). This interpretation is particularly relevant considering the regression analyses conducted in the present study, where coping strategies explained considerably more variance in burnout than classroom stressors themselves. Accordingly, stressful classroom situations do not automatically lead to burnout but may become problematic when teachers lack effective coping resources or perceive limited control over occupational demands.

Another important aspect concerns the possibility that classroom stressors are perceived differently depending on subjective appraisal processes rather than objective exposure alone. Two teachers may encounter similar classroom situations while evaluating and managing these demands in fundamentally different ways. This perspective corresponds closely with transactional stress models (Lazarus & Folkman, 1984), which emphasize that stress reactions are shaped by individual interpretation and coping rather than by situational demands alone.

Overall, these findings suggest that classroom-related occupational demands remain an important aspect of physical education teaching, but their influence on burnout appears to be more complex than initially assumed. Rather than producing clear group differences between

novice and experienced teachers, classroom stressors seem to interact with individual appraisal and coping processes in shaping burnout risk. This interpretation aligns with the broader pattern observed throughout the present study, in which psychological and coping-related factors emerged as more substantial predictors of burnout than structural teaching characteristics alone.

4.3 Alternative explanations and methodological considerations

Although the present study identified several meaningful relationships between coping strategies, teaching experience, and burnout symptoms, alternative explanations should be considered when interpreting these findings. In particular, the results suggest that burnout among physical education teachers may represent a more individualized and context-dependent process than initially assumed.

One important aspect concerns the relationship between coping strategies and burnout dimensions themselves. Certain coping strategies, especially behavioral withdrawal and self-blame, conceptually overlap with characteristics commonly associated with emotional exhaustion and psychological strain. Teachers experiencing elevated burnout symptoms may therefore also be more likely to report disengagement-oriented coping behaviors. Similar concerns regarding the conceptual proximity between coping constructs and burnout dimensions have been discussed in previous burnout research (Greenglass et al., 1997; Roloff et al., 2022). Consequently, the strong associations observed between maladaptive coping and burnout should not automatically be interpreted as strictly causal relationships. Hence, the present findings indicate that subjective appraisal processes may play a more important role than objective occupational conditions alone. Throughout the study, structural characteristics such as subject combination, school context, and classroom stressors showed comparatively limited explanatory value, whereas coping strategies emerged as substantially stronger predictors of burnout. This pattern corresponds closely with transactional stress models (Lazarus & Folkman, 1984), which emphasize that stress outcomes depend largely on how occupational demands are interpreted and managed rather than on the demands themselves.

Another relevant consideration concerns the functional meaning of coping strategies within different contexts. The positive association between humor and burnout illustrates that coping strategies cannot always be categorized clearly as either adaptive or maladaptive. While humor is frequently described as a protective coping mechanism, previous research suggests

that it may also function as a form of distancing or defensive coping under conditions of prolonged stress (Knoll et al., 2005). Similarly, strategies such as emotional expression or distraction may serve different psychological functions depending on perceived controllability and available resources. This may partly explain why some coping strategies showed inconsistent relationships with burnout within the present study.

Furthermore, it is possible that unmeasured occupational resources influenced the observed findings. Variables such as collegial support, school climate, leadership quality, or mentoring opportunities were not assessed directly, despite their well-established relevance within teacher stress research (Bakker & Demerouti, 2017; Richards & Templin, 2012). Teachers with greater access to such resources may perceive occupational demands differently and apply more effective coping strategies, thereby reducing burnout risk independently of structural teaching characteristics. These considerations suggest that burnout among physical education teachers cannot be explained solely through workload or demographic characteristics. Instead, the present findings support a process-oriented perspective in which subjective appraisal, coping behavior, and available psychological resources interact in shaping burnout development. This interpretation is consistent with both existing theoretical models and the broader pattern of results observed throughout the study.

4.3.1 Practical implications

The findings of the present study highlight several practical implications for teacher education and burnout prevention in physical education. Most importantly, the elevated levels of emotional exhaustion among novice teachers suggest that the transition into professional teaching represents a particularly vulnerable phase. Accordingly, induction and mentoring programs should provide greater support for early-career teachers, particularly regarding classroom management, professional self-efficacy, and stress regulation in demanding teaching situations.

Additionally, the strong associations between coping strategies and burnout underline the importance of integrating coping-related competencies more explicitly into teacher education and professional development programs. Since behavioral withdrawal emerged as a strong predictor of burnout, interventions should focus on strengthening active and problem-focused coping strategies as well as reflective stress management skills. Previous research has

similarly emphasized the protective role of self-efficacy and adaptive coping processes in reducing occupational strain among teachers (Knoll et al., 2005; Lazarus & Folkman, 1984).

At the organizational level, the findings suggest that burnout prevention should extend beyond purely structural workload adjustments. While factors such as subject combination and school context showed comparatively limited effects within the present study, supportive professional environments may still represent important protective resources. Collegial exchange, mentoring structures, and accessible psychological support systems may help teachers manage occupational demands more effectively and reduce long-term emotional strain.

Overall, the present findings emphasize that sustainable teacher well-being in physical education depends not only on reducing occupational demands, but also on strengthening individual coping resources and supportive professional environments.

4.3.2 Limitations and future research

Despite the theoretically grounded framework and the meaningful empirical patterns identified in the present study, several limitations should be considered when interpreting the findings. These limitations concern the sample characteristics, methodological design, and measurement approaches used throughout the study.

A first limitation relates to the relatively small sample size ($N = 58$), which restricted statistical power, particularly regarding detecting smaller group differences. Although several relevant associations emerged, especially within the correlation and regression analyses, non-significant findings should be interpreted cautiously. This is particularly relevant for the analyses concerning subject combination and classroom stressors, where descriptive tendencies were observable despite the absence of statistical significance. Larger samples may therefore reveal more differentiated patterns than those identified in the present study. Closely related to this issue is the unequal distribution of participants across comparison groups. In particular, considerably more teachers belonged to the subsidiary-subject group than to the main-subject group. This imbalance may have further reduced the reliability of group comparisons and limited the ability to detect subtle effects associated with subject combinations. Consequently, potential workload-related differences between these groups cannot be ruled out entirely.

Another important limitation concerns the cross-sectional design of the study. Since all variables were assessed at a single point in time, causal conclusions cannot be drawn. Although coping strategies emerged as strong predictors of burnout symptoms, it remains unclear whether maladaptive coping contributes to burnout development or whether burnout itself influences coping behavior over time. Existing research increasingly conceptualizes burnout as a dynamic and reciprocal process (Maslach et al., 1996; Cramer & Merk, 2018), suggesting that longitudinal approaches would be more appropriate for examining developmental trajectories and causal relationships. Furthermore, all data were collected using self-report questionnaires. While self-report instruments are widely established in burnout research and particularly suitable for assessing subjective perceptions of stress and coping, they are also associated with several methodological limitations, including common method variance, retrospective bias, and social desirability effects. Teachers experiencing elevated emotional exhaustion, for example, may perceive occupational demands differently or evaluate their coping behavior more negatively than less strained participants. Future studies could therefore benefit from combining quantitative self-report data with qualitative interviews, observational methods, or physiological indicators of stress.

The assessment of coping strategies also presents certain limitations. The present study used a shortened German version of the Brief COPE (Knoll et al., 2005), which allowed for efficient data collection but may have reduced the differentiation between specific coping functions. In addition, coping strategies may vary substantially depending on situational context. Strategies such as humor, distraction, or emotional expression may function adaptively in some situations while becoming maladaptive in others. Standardized questionnaire measures can only capture these contextual differences to a limited extent. Future research could therefore benefit from diary-based or event-centered approaches examining coping responses in relation to specific occupational situations.

Another aspect that should be considered concerns the range of stressors included in the present study. Although classroom-related demands were assessed in detail, additional occupational stressors frequently discussed in the literature on physical education teachers were not examined directly. These include extracurricular sports responsibilities, organizational coordination outside regular lessons, administrative duties, and broader institutional pressures (Richards et al., 2018; Klinge, 2018). Including such factors may

provide a more comprehensive understanding of occupational strain within physical education teaching.

Finally, the generalizability of the findings is limited. The sample consisted exclusively of Austrian physical education teachers, and participation was voluntary. Self-selection effects therefore cannot be excluded, as teachers experiencing particularly high or particularly low levels of stress may have been more likely to participate. Consequently, the findings should be interpreted cautiously when transferring them to other educational systems, school contexts, or subject areas. Nevertheless, despite these limitations, the present study contributes valuable insights into burnout processes among physical education teachers. In particular, the findings emphasize the importance of coping strategies and subjective stress appraisal in understanding burnout development. Future research using larger samples, longitudinal designs, and more differentiated assessments of occupational demands and coping processes may further clarify how burnout develops across different stages of the teaching profession.

5 Conclusion

The present study examined burnout symptoms among Austrian physical education teachers with a particular focus on teaching experience, classroom-related stressors, and coping strategies. Drawing on the multidimensional burnout model of Maslach et al. (1996) as well as transactional approaches to stress and coping (Lazarus & Folkman, 1984), the study aimed to contribute to a more differentiated understanding of burnout processes within the specific context of physical education teaching. In order to address the research question, quantitative analyses were conducted comparing novice and experienced teachers as well as teachers with different subject combinations. Furthermore, correlation and regression analyses were used to examine the relationships between coping strategies, occupational stressors, and burnout symptoms.

All in all, the findings indicate that burnout among physical education teachers cannot be explained sufficiently through structural characteristics such as teaching experience, subject combination, or school context alone. Although novice teachers reported significantly higher levels of emotional exhaustion than experienced teachers, no broader differences emerged regarding depersonalization, personal accomplishment, coping behavior, or classroom stressors. These findings suggest that early-career vulnerability exists primarily in the form of

emotional exhaustion rather than in a fully developed burnout profile. This result is largely consistent with previous burnout research, which conceptualizes emotional exhaustion as the earliest and most central component of burnout (Maslach et al., 1996; Aloe et al., 2014).

At the same time, several initially expected group differences could not be confirmed. Teachers with different subject combinations did not differ significantly in burnout symptoms or coping strategies, despite theoretical assumptions suggesting increased workload and occupational strain for teachers with a second main subject (Richards & Templin, 2012; Klinge, 2018). Similarly, classroom-related stressors showed only limited differences between novice and experienced teachers. These findings are noteworthy because they challenge the assumption that structural and contextual teaching characteristics alone represent the primary determinants of burnout risk in physical education teaching.

Instead, the strongest and most consistent findings of the study emerged in relation to coping strategies. Both the correlation and regression analyses demonstrated that burnout symptoms were associated substantially more strongly with individual coping patterns than with demographic or structural variables. Particularly, behavioral withdrawal emerged as the strongest positive predictor of burnout, whereas active coping showed protective effects. These findings support transactional models of stress and coping, according to which burnout develops not only as a consequence of occupational demands, but also through the way these demands are cognitively appraised and behaviorally managed (Lazarus & Folkman, 1984). At the same time, the results highlight that coping strategies cannot simply be divided into adaptive and maladaptive categories, as their effectiveness appears to depend strongly on situational and psychological context.

Another important contribution of this study lies in the differentiated interpretation of burnout dimensions. While emotional exhaustion showed clear associations with teaching experience and coping-related variables, depersonalization and personal accomplishment remained comparatively stable across groups. This result underlines the importance of understanding burnout as a multidimensional and dynamic process rather than as a uniform psychological condition. In this regard, the present study extends existing research by demonstrating that burnout risk among physical education teachers may develop in more differentiated ways than commonly assumed.

Concludingly, the results of this study suggest that burnout among physical education teachers is shaped less by objective teaching conditions alone and more by the interaction between occupational demands, subjective appraisal processes, and coping behavior. Consequently, this research supports a process-oriented understanding of burnout development, in which psychological and situational factors appear more relevant than structural teaching characteristics alone. From a practical perspective, these findings underline the importance of supporting teachers not only through organizational measures, but also through interventions aimed at strengthening adaptive coping resources, professional self-efficacy, and reflective stress management skills, particularly during the early stages of the teaching career.

Despite several limitations, including the relatively small sample size and the cross-sectional design, the present study contributes valuable insights into burnout processes within physical education teaching. In particular, the findings emphasize the importance of considering individual coping behavior when examining occupational stress and burnout among teachers. Future research using longitudinal designs and larger samples may further clarify how coping processes, professional development, and occupational demands interact over time in shaping burnout risk among physical education teachers.

5.1 Use of artificial intelligence in the writing process

Artificial intelligence tools, specifically ChatGPT (OpenAI), were used selectively during the writing process of this thesis. The tool was primarily utilized for linguistic support, including the rephrasing of sentences, improvement of academic wording, structural organization of text passages, and assistance with formatting-related questions. In addition, AI-supported feedback was occasionally used to improve coherence, readability, and transitions between sections.

The development of the research question, the literature review and the overall scientific content of the thesis were conducted independently by the author. All analyses and conclusions are based on the author's own work and critical evaluation of the relevant literature. The use of AI served exclusively as a supportive writing and language tool and not as a substitute for scientific reasoning, data analysis, or independent academic work.

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7 Attachments

7.1 Questionnaire



stressorencoping → base

17.07.2025, 18:25

Seite 01

A001

1. Stressbelastung im Schulalltag und die damit verbundenen Coping Strategien von Lehrpersonen

Liebe Teilnehmerin, lieber Teilnehmer,

herzlich willkommen zu meinem Fragebogen, welcher im Rahmen meiner Masterarbeit erstellt wurde. Ziel dieser Befragung ist es, die Stressoren, Burnoutwahrscheinlichkeit und Coping Strategien im Lehrberuf zu untersuchen. Ihre Teilnahme an dieser Studie ist von großer Bedeutung, da sie wertvolle Einblicke in die Stressbelastung von Lehrpersonen ermöglicht.

Die Befragung wird etwa 5-10 Minuten Ihrer Zeit in Anspruch nehmen. Ihre Antworten werden anonym erfasst und streng vertraulich behandelt. Die Teilnahme ist freiwillig und es werden keine personenbezogenen Daten gespeichert. Es gibt keine richtigen oder falschen Antworten, es geht darum, Ihre persönlichen Erfahrungen und Ansichten zu erfassen.

Ich bedanke mich herzlich für Ihre Bereitschaft, an dieser Studie teilzunehmen. Ihre Unterstützung trägt maßgeblich zum Erfolg meiner Forschung bei und hilft, wertvolle Erkenntnisse zu gewinnen, die zur Förderung von Gesundheit und Wohlbefinden beitragen können.

Vielen Dank für Ihre Unterstützung!

Seite 02

2. Welchem Geschlecht fühlen Sie sich zugehörig?

A101



☐☐☐☐

männlich

weiblich

divers

A102

3. Wie alt sind Sie?

☐☐

A103 

4. Seit wie vielen Jahren unterrichten Sie bereits?

kürzer als 5 Jahre

länger als 5 Jahre

A107 

5. Wo befindet sich Ihr Schulstandort?

☐☐☐☐☐☐☐☐

Niederösterreich

Wien

Oberösterreich

Burgenland

Kärnten

Steiermark

Tirol

Vorarlberg

A106



6. in welcher Schulform unterrichten Sie?

☐

NMS

☐

AHS

☐☐

Unterstufe

AHS

Oberstufe

BHS (HAK,HLW, HLA,....)

7. Ist das zweite Unterrichtsfach ein Nebenfach oder ein Hauptfach in Ihrer^{A105} Schulform?

☐☐

Nebenfach

Hauptfach

8. Welches Unterrichtsfach unterrichten Sie neben Bewegung und Sport?^{A104}

Seite 03

Bitte beurteilen Sie, inwiefern die folgenden Aussagen auf Ihr Denken und Handeln^{A201} in schwierigen Situationen im Sportunterricht zutreffen. Machen Sie für jede Aussage eine Angabe auf der vorgeschlagenen Skala.

9. zur Stressbewältigung nach dem Unterricht beschäftige ich mich mit noch^{A202} mehr Arbeit oder anderen Dingen um beschäftigt zu bleiben und um auf andere Gedanken zu kommen.

- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

10. Wenn ich mich gestresst fühle ändere ich etwas an meiner Situation^{A203}

- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft
etwas zu trifft
zu

11. Bei Stress in der Schule überzeuge ich mich davon, dass das alles nicht^{A204} wahr ist.

- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft
etwas zu trifft
zu

12. Bei Stressbelastungen nehme ich Alkohol zu mir um mich besser zu fühlen.

☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

manchmal zu

trifft zu

13. Bei Stressbelastungen nehme ich andere Substanzen zu mir um mich besser zu fühlen^{A206}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

manchmal zu

trifft zu

14. Bei Stressbelastungen suche ich aufmunternde Unterstützung von anderen^{A207}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

15. Ich habe es aufgegeben mich mit meinen Stressbelastungen zu beschäftigen

A208



- ☐ trifft nicht
- ☐ zu trifft
- ☐ kaum zu
- ☐ trifft

etwas zu trifft

zu

16. Ich arbeite aktiv daran meine Situation zu verbessern ^{A209}



- ☐ trifft nicht
- ☐ zu trifft
- ☐ kaum zu
- ☐ trifft

etwas zu trifft

zu

17. Ich kann nicht wahrhaben, dass mich etwas so sehr belastet ^{A210}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

18. Ich kann meine Gefühlen in Stresssituationen freien Lauf lassen A211

☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

19. Ich bitte andere Menschen um Rat und Hilfe in Stresssituationen A212

☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

A213

20. Um den Stress durchzustehen besänftige ich mich mit Alkohol oder anderen Mitteln

- ☐ trifft nicht
- ☐ zu trifft
- ☐ kaum zu
- ☐ trifft

etwas zu trifft

zu

21. Ich versuche die Dinge von einer positiveren Seite zu betrachten A214



- ☐ trifft nicht
- ☐ zu trifft
- ☐ kaum zu
- ☐ trifft

etwas zu trifft

zu

22. Ich kritisiere mich in Stresssituationen selbst und mache mir Vorwürfe A215



- ☐ trifft nicht
- ☐ zu trifft
- ☐ kaum zu
- ☐ trifft

etwas zu trifft

zu

23. Ich überlege mir bei Stresssituationen einen Plan, was ich tun könnte^{A216}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

A217



24. In Stresssituationen benötige ich eine Person die mich tröstet und mir Verständnis entgegenbringt

☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

25. Bei Stresssituationen probiere ich gar nicht mehr die Situation in den Griff zu kriegen sondern gebe auf^{A218}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

26. Bei Stresssituationen versuche ich etwas Gutes in dem zu finden was mir^{A219} passiert



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

27. Ich mache Witze darüber was mich gerade stresst A220



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

28. In Stresssituationen unternehme ich etwas dagegen um mich abzulenken^{A221}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

29. Ich finde mich damit ab, dass ich gestresst bin ^{A222}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

30. In Stresssituationen zeige ich offen wie schlecht ich mich fühle

A223



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

31. Wenn ich gestresst bin versuche ich Halt in meinem religiösen Glauben^{A224} zu finden



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

A225



32. In Stresssituationen versuche ich von anderen Menschen Rat und Hilfe einzuholen

☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

33. Ich habe gelernt mit dem Stress zu leben^{A226}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

34. Ich mache mir viele Gedanken darüber was der richtige Umgang mit dem^{A227} Stress ist



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

35. Ich gebe mir für die Dinge die mir widerfahren selbst die Schuld ^{A228}



☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu

36. Ich bete oder meditiere wenn ich gestresst bin

A229
74

☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu



37. Ich nehme Stresssituationen mit Humor A230

☐ trifft nicht

☐ zu trifft

☐ kaum zu

☐ trifft

etwas zu trifft

zu



38. Es gelingt mir gut, mich in meine SchülerInnen hineinzusetzen. ^{A301}

- ☐ trifft nicht
☐ zu trifft
☐ kaum zu
☐ trifft eher
zu trifft zu

39. Mit den Problemen meiner SchülerInnen kann ich sehr gut umgehen. ^{A302}

- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

40. Es fällt mir leicht, eine entspannte Atmosphäre mit meinen SchülerInnen ^{A303} **herzustellen.**

- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

A304



41. Ich fühle mich geistig angeregt, wenn ich mit meinen SchülerInnen intensiv gearbeitet habe.

- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

42. Bei der Arbeit gehe ich mit emotionalen Problemen ruhig und ausgeglichen um.

A305



- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

43. Durch meine Arbeit bin ich gefühlsmäßig am Ende.

A306



- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

44. Am Ende des Schultages fühle ich mich erledigt.

A307



- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

**45. : Ich fühle mich schon müde, wenn ich morgens aufstehe und wieder
einen Schultag vor mir habe.**

A308



- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

46. Den ganzen Tag mit SchülerInnen zu arbeiten, ist eine Strapaze für mich.

A309



- ☐ trifft nicht
☐ zu trifft
☐ wenig zu
☐ trifft eher
zu trifft zu

47. Durch meine Arbeit fühle ich mich ausgelaugt.

A310



- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft eher
zu trifft zu

48. Meine Arbeit frustriert mich.

A311



- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft eher
zu trifft zu

A312



49. Ich glaube, ich arbeite zu hart.

- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft eher
zu trifft zu

50. Mit jungen Menschen in der direkten Auseinandersetzung arbeiten zu^{A313} müssen, belastet mich sehr.



- ☐ trifft nicht
 - ☐ zu trifft
 - ☐ wenig zu
 - ☐ trifft eher
- zu trifft zu

51. Ich glaube, ich bin mit meinem Latein am Ende.^{A314}



- ☐ trifft nicht
 - ☐ zu trifft
 - ☐ wenig zu
 - ☐ trifft eher
- zu trifft zu

52. Ich glaube, ich behandle SchülerInnen zum Teil ziemlich unpersönlich.^{A315}



- ☐ trifft nicht
 - ☐ zu trifft
 - ☐ wenig zu
 - ☐ trifft eher
- zu trifft zu

A316



53. Seit ich LehrerIn bin, bin ich gleichgültiger gegenüber Menschen geworden.

- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft eher
- zu trifft zu

54. Ich befürchte, dass diese Arbeit mich emotional verhärtet. A317



- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft eher
- zu trifft zu

55. Bei manchen SchülerInnen interessiert es mich im Grunde nicht, was aus^{A318} ihnen wird.



- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft eher
- zu trifft zu

56. Ich habe den Eindruck, die SchülerInnen geben mir die Schuld für ihre^{A319} eigenen Probleme.



- ☐ trifft nicht
 - ☐ zu trifft
 - ☐ wenig zu
 - ☐ trifft eher
- zu trifft zu

Seite 05

57. Einzelne SchülerInnen stören den Sportunterricht erheblich durch ihr^{A401} aggressives Verhalten.



- ☐ trifft nicht
 - ☐ zu trifft
 - ☐ wenig zu
 - ☐ trifft
- manchmal zu
- trifft zu

58. Der Unterricht leidet durch Konflikte zwischen den SchülerInnen. ^{A402}



- ☐ trifft nicht
 - ☐ zu trifft
 - ☐ wenig zu
 - ☐ trifft
- manchmal zu
- trifft zu

59. Die mangelnde Disziplin in der Klasse macht einen geregelten Unterricht^{A403} unmöglich



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

A404



60. SchülerInnen halten sich nicht an Abmachungen.

☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

61. Die räumlichen Verhältnisse lassen einen vernünftigen Unterricht nicht^{A405} zu.



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

62. Es fehlen Geräte, um einen vernünftigen Sportunterricht zu machen.^{A406}



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

63. Ich kann bestimmte Sportarten aufgrund der räumlichen Verhältnisse^{A407} **nicht anbieten**



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

64. Einzelne SchülerInnen protestieren gegen meine Benotung ^{A408}



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

A409

65. Die SchülerInnen nehmen nur lustlos am Sportunterricht teil.

☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

66. SchülerInnen machen mir Vorwürfe, weil sie keine Fortschritte machen.^{A410}



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

67. Einzelne SchülerInnen fühlen sich ungerecht bewertet.

A411

☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

A412



68. Die Mehrzahl der SchülerInnen ist im Sportunterricht nicht ganz bei der Sache.

☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

69. Der im Lehrplan vorgesehene Stoff überfordert die SchülerInnen

A413



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

70. Einige Vorgaben des Lehrplans lassen sich im Unterricht nicht umsetzen.^{A414}



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

71. Der Stoff des Lehrplans stimmt nicht mit den Wünschen der SchülerInnen^{A415} überein.



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

72. Ein Großteil der SchülerInnen erreicht die curricularen Vorgaben nicht.^{A416}



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

73. Notwendige Absprachen mit KollegInnen erfolgen zu spät. A417



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

74. Organisatorische Absprachen mit KollegInnen werden ad hoc getroffen. A418



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

75. Ich erfahre erst zu Unterrichtsbeginn von KollegInnen, welche Unterrichtsmittel (Geräte, Bälle, etc.) ich einsetzen kann.

A419



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

76. Ich muss meinen Sportunterricht wegen unvorhersehbarer Dinge spontan^{A420} umstellen.

- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft

manchmal zu

trifft zu

77. Bestimmte Übungen lasse ich lieber von SchülerInnen vormachen. ^{A421}

- ☐ trifft nicht
- ☐ zu trifft
- ☐ wenig zu
- ☐ trifft

manchmal zu

trifft zu

78. Beim Vormachen gerate ich außer Atem. ^{A422}

☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

79. Nach dem Sportunterricht ist meine Stimme ziemlich angegriffen A423



☐ trifft nicht

☐ zu trifft

☐ wenig zu

☐ trifft

manchmal zu

trifft zu

Letzte Seite

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