



Assessing the interplay: teacher efficacy, compassion fatigue, and educator well-being in Australia

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Abstract

In Australia, there is a growing concern about the well-being of teachers with many expressing their intention to leave the profession or indeed have already left. Various reasons have been suggested for this trend, with burnout being identified as one of the factors. This study investigates burnout in Australian teachers as one of the constructs which make up compassion fatigue (CF), a reduced ability to empathise with others. Moreover, it explores secondary traumatic stress (STS), which also contributes to CF and occurs when a person learns about the traumatic experiences of someone under their care. Both constructs may severely impact the ability of teachers to form close relationships with their students. As part of the present study, 1939 Australian teachers were surveyed about their quality of life, well-being, classroom efficacy, and trauma awareness. Findings demonstrate that teachers with higher levels of well-being and with higher perceived classroom efficacy are less prone to burnout, reducing the risk of emotional exhaustion and disengagement often associated with this phenomenon. Conversely, connections were found between lower well-being of teachers and educators' awareness of trauma and their susceptibility to STS. Recommendations are made for further research exploring the barriers and enablers of compassion fatigue as well as positive teacher well-being, in order to develop targeted initiatives to better prepare and protect teachers to work with a cohort of students who are increasingly demonstrating symptoms of trauma and poor well-being.

Keywords Compassion satisfaction · Burnout · Secondary traumatic stress · Teacher efficacy · Classroom efficacy · Teacher well-being

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Introduction

Symptoms associated with childhood trauma and poor mental health are becoming increasingly visible in classrooms. Hiscock et al. (2018) observed a 6.5% annual rise in mental health-related visits to pediatric emergency departments since 2009, predating the COVID-19 pandemic. This increase is driven by various factors, including natural disasters, the pandemic itself, and a range of global and local influences, which may have disproportionately affected children from less resourced families, thus widening the educational gap and adding to teachers' burdens (L'Estrange & Howard, 2022). Additionally, a significant number of Australian children (3% in 2019–2020) already experience adverse childhood experiences annually (AIHW, 2021).

Teachers frequently manage emotional and behavioral crises, learning about students' traumatic experiences, and this direct engagement with trauma has become more complex (L'Estrange & Howard, 2022). Such interactions significantly contribute to stress and anxiety among educators (Alisic, 2012; Blitz et al., 2016; Caringi et al., 2015), leading to increased teacher turnover (Caringi et al., 2015). A 2021 study found that 78% of U.S. teachers faced mental health issues during the COVID-19 pandemic, indicating a higher susceptibility compared to the general population (Cohan-Fraade & Donahue, 2022). Despite these challenges, support for teachers working with traumatized children remains limited (Berger & Nott, 2023; Hydon et al., 2015).

The emergence of compassion fatigue, burnout, and secondary traumatic stress is a critical factor driving teachers out of the profession in Australia (Heffernan et al., 2022; Lee, 2019). These emotional burdens are intertwined with factors like personal crises, professional stagnation, and inadequate compensation (Borman & Dowling, 2008; Brill & McCartney, 2008; Clandinin et al., 2014; DeAngelis et al., 2013; Hughes, 2012; Mäkelä & Whipp, 2015; Parker, 2015; Skaalvik & Skaalvik, 2011). This scenario threatens the protective nature of schooling for children experiencing trauma, potentially undermining the efficacy of educational environments as safe havens for emotional and social learning (Post et al., 2020; Ronfeldt et al., 2013). Thus, a comprehensive strategy is needed to address the root causes of emotional distress among teachers to maintain both education quality and teacher well-being.

Teacher stress and burnout not only affect their well-being but also negatively impact student outcomes. Research shows that students with highly stressed teachers exhibit increased negative behaviors and lower academic performance (Herman et al., 2018; Madigan & Kim, 2021). Additionally, high levels of teacher burnout correlate with increased antisocial behaviors among students (Schonert-Reichl, 2017), and frequent teacher absences disrupt classroom management and instructional continuity (Jennings & Greenberg, 2009). A systematic review by Madigan and Kim (2021) highlights the link between teacher burnout and lower student achievement and motivation, emphasising the need to address teacher burnout as part of strategies to enhance educational outcomes (Carrol et al., 2021).

This study employs the Compassion Fatigue and Satisfaction Model (Figley, 1995; Stamm, 2010) to explore the relationship between empathetic engagement with students and compassion fatigue among teachers, and how compassion satisfaction can act as a protective factor. The research aims to investigate levels of compassion fatigue among Australian teachers post-COVID-19, examining correlations between burnout, secondary traumatic stress, teacher efficacy, and well-being. By understanding these relationships, the study seeks to develop strategies that support teachers and foster positive educational environments, especially for students experiencing trauma. The research questions guiding this study are: "What are the current levels of compassion satisfaction, burnout, and secondary traumatic stress in Australian teachers?" and "What relationships exist between these constructs and teachers' trauma-awareness, classroom efficacy, and well-being?".

Defining compassion fatigue and compassion satisfaction

Stamm (2010) proposes that the compassion fatigue–compassion satisfaction theory offers insights into the dual nature of a teacher's experience when aiding trauma-affected students. Compassion satisfaction, as delineated by Stamm (2002, 2010), describes the personal enrichment that professionals, like teachers and therapists, gain when assisting those impacted by trauma. Notably, increased interactions with trauma-stricken students can elevate teachers' susceptibility to depression, burnout, substance misuse, and Post Traumatic Stress Disorder (Stamm, 2010). A dyadic model of compassion fatigue has been identified, incorporating burnout and secondary traumatic stress (Christian-Brandt et al., 2020; Yang, 2021).

Secondary traumatic stress is depicted in academic discourse as an intense stress response (Figley, 2013). This can manifest as avoidance behaviours, disturbed sleep, or intrusive flashbacks stemming from knowledge of another's traumatic ordeal. Such exposure can disrupt a teacher's personal and professional life due to the weight of their students' traumatic histories (Caringi et al., 2015; O'Toole & Dobutowisch, 2023).

Burnout, traditionally conceptualised as a syndrome with three key dimensions—emotional exhaustion, depersonalisation or cynicism, and reduced personal accomplishment (Maslach & Jackson, 1981; Skaalvik & Skaalvik, 2020)—can exacerbate this. For educators, burnout translates into diminished self-belief and job contentment, heightened stress and anxiety, and reduced empathy, effectiveness, and well-being, both mentally and physically (Essary et al., 2020; Stamm, 2010; Ziaian-Ghafari & Berg, 2019). Moreover, burnout is described as an erosion of engagement, where emotional weariness undermines the ability to maintain personal and professional responsibilities (Maslach & Leiter, 1997). The roots of burnout have been traced back to a scarcity of trauma-sensitive training, limited resources, and excessive expectations of educators (Hydon et al., 2015; Stamm, 2010). Burnout is often examined as a unique construct resulting from long-term occupational stress (Skaalvik & Skaalvik, 2020), but research has also found it to contribute to compassion fatigue when STS is present (Russo et al., 2020; Stamm, 2010).

Studies have indicated a link between compassion fatigue and the attrition rates in various caregiving professions, including healthcare, mental health, and social work (Bride, 2007; Bunce & West, 1996; Krauss et al., 2005). More recently, there has been an increased acknowledgment of the significance of STS, burnout, and compassion satisfaction in teacher retention (Christian-Brandt et al., 2020; Oberg et al., 2023a). For instance, in a survey of 163 educators from underserved U.S. elementary schools, Christian-Brandt et al. (2020) discovered that teachers experiencing lower compassion satisfaction coupled with heightened burnout had increased inclinations to exit the educational sector.

While the consensus among researchers is that educators' stress levels differ based on specific school settings and circumstances (Ramberg et al., 2020), pre-COVID-19 studies indicated that educational staff encountered considerable risks of burnout and STS (Hydon et al., 2015; McCarthy, 2019). As an illustration, research involving 229 educational staff across six schools in the northwestern U.S. revealed that their self-reported STS levels mirrored those seen among mental health professionals (Borntrager et al., 2012). Although research with Australian teachers has been sparse, a recent Australian study of 302 teachers in Victoria by Berger and Nott (2023) found high levels of compassion satisfaction (45.7%), elevated levels of burnout (41.4%), and moderate levels of secondary traumatic stress (44.0%).

Teacher self-efficacy and how it can impact and be impacted by levels of CF and CS

Self-efficacy is a psychological attribute, rooted in an individual's evaluation of their competence to successfully complete tasks (Bandura, 1997). Numerous studies have drawn connections between teacher self-efficacy and burnout, framing burnout as either an erosion of this efficacy (Friedman, 2003) or as an efficacy crisis (Leiter, 1992). Notably, teacher self-efficacy is considered a shield against burnout (Dicke et al., 2014; Friedman, 2000). However, the landscape of teaching in Australia has evolved, especially with rising emotional, cognitive, and behavioural challenges among students, amplified by the COVID-19 pandemic's ramifications and escalating cases of complex trauma in youth (Calvano et al., 2022; Oberg et al., 2023b). Consequently, many educators voice concerns that their training has not sufficiently prepared them to assist students grappling with trauma (Grybush, 2020; Levkovich & Gada, 2020; Oberg & Bryce, 2022). In light of the increasing presence of students manifesting complex trauma symptoms, grasping the implications of teachers' diminished self-efficacy in aiding these students—especially in relation to teachers' susceptibility to CF, STS, and burnout—is crucial.

Teacher self-efficacy plays a highly significant role in the school environment. It not only serves as a protective factor against emotional overload and burnout (Boujut et al., 2017; Shead et al., 2016) but also exerts a notable influence on students' academic achievement (Carroll et al., 2021; Klassen & Tze, 2014; Zee & Kooman, 2016). The teaching profession inherently carries a high risk of stress and burnout (Johnson et al., 2005), and as the emotional impact on teachers working with trauma-exposed students becomes more evident, it is increasingly clear

that teachers may be susceptible to symptoms of secondary traumatic stress (STS) (Koenig et al., 2018).

The importance of teacher well-being

Emotional exhaustion and job satisfaction are pivotal factors for teacher well-being, significantly influencing teaching effectiveness and positive educational outcomes (Arens & Morin, 2016). Therefore, prioritising teacher well-being is essential for creating supportive and productive learning environments (Beltman et al., 2011; Skaalvik & Skaalvik, 2018). Safeguarding and nurturing the well-being of educators is of utmost importance in upholding the quality of education, particularly within demanding teaching environments (Beltman et al., 2011).

Positive teacher-student relationships play a crucial role in promoting the mental health of children and young people (Kidger et al., 2012; Plenty et al., 2014). These relationships foster a sense of belonging and connectedness among students, thereby improving their overall well-being (Aldridge & McChesney, 2018), as well as their connection to the school itself (Harding et al., 2019). Conversely, research suggests that teachers with poor mental health may struggle to develop and model positive relationships with their students (Jennings & Greenberg, 2009; Kidger et al., 2010). Moreover, increased teacher absenteeism can negatively impact the quality of teacher-student relationships (Jamal et al., 2013).

Teachers experiencing poor mental health may also exhibit reduced confidence in their ability to support the well-being and mental health of their students, particularly if they are grappling with their own well-being and mental health issues (Sisask et al., 2014). Consequently, the well-being of teachers is intertwined with student well-being (Carroll et al., 2021; Harding et al., 2019).

Additionally, research demonstrates that teachers who engage in “presenteeism” or continue to work despite poor well-being and mental health, may find it challenging to effectively manage their classrooms and are less likely to develop positive classroom and behaviour management strategies (Harding et al., 2019). This, in turn, affects their relationships with students (Jennings & Greenberg, 2009), student well-being (Harding et al., 2019), and overall teacher performance (Beck et al., 2011; Jain et al., 2013).

Notably, a relationship is evident between higher teacher well-being and lower student psychological difficulties (Harding et al., 2019), as well as between lower teacher depression and improved student well-being (Harding et al., 2019). Moreover, a connection exists between teacher presenteeism and student well-being and psychological difficulties (Harding et al., 2019), which lends more weight to investigating the links between teacher and student mental health. This study extends these findings by delving into the correlations between teacher well-being, burnout, and compassion satisfaction, emphasising the essential role of teacher mental health in fostering supportive educational environments that benefit both educators and students.

Methods

The present study employed a cross-sectional survey design to assess the levels of compassion fatigue, burnout, and secondary traumatic stress among Australian teachers and their relationships with classroom efficacy and teacher well-being. Ethics approval for this research was granted by the appropriate ethics board, ensuring adherence to ethical standards and participant confidentiality.

Participants

Invitations were extended to teachers across all states and territories in Australia through professional and social media networks, including early childhood educators, using snowball sampling to reach a diverse population (Parker et al., 2019). The survey was open from March 8th to May 21st, 2023. A total of 2,166 teachers participated, with 1,939 progressing past initial questions and 1,612 completing all sections of the PROQOL for prevalence calculations. Responses were primarily from Queensland, with a majority (93.76%) being female and over 50% from the Primary sector. Participants' teaching experience ranged from less than 1 year to over 30 years, as detailed in Table 1.

Measures

The Professional Quality of Life Scale (Pro QOL-5: Stamm, 2010)

The Professional Quality of Life Scale—Version 5 (ProQOL; Stamm, 2010) was used to measure Compassion Satisfaction (CS), Secondary Traumatic Stress (STS), and Burnout among teachers. The ProQOL consists of 30 items divided into three subscales (10 items each): compassion satisfaction, burnout, and secondary traumatic stress. Modifications were made to the questionnaire to tailor it for the educational environment. The scale is rated on a 5-point Likert scale from 1 (Never) to 5 (Very Often). High scores on compassion satisfaction indicate rewarding feelings associated with one's work, while high scores on burnout and secondary traumatic stress reflect potential struggles with emotional exhaustion and vicarious trauma. Example items include: "I feel invigorated after working with students I teach or help" (compassion satisfaction), "I feel bogged down by the system" (burnout), and "I feel depressed because of the traumatic experiences of the children I teach/help" (secondary traumatic stress). For the present study, the reliability estimates were $\alpha = 0.91$ (compassion satisfaction), $\alpha = 0.81$ (burnout), and $\alpha = 0.84$ (secondary traumatic stress).

Table 1 Demographic breakdown of participants

Category	Count	Percentage (%)
<i>Gender</i>		
Female	1818	93.76
Male	105	5.42
Prefer not to say	9	0.46
Non-binary/third gender	7	0.36
<i>State</i>		
Queensland	1120	57.76
Victoria	276	14.23
Western Australia	248	12.79
New South Wales	199	10.26
Australian Capital Territory	61	3.15
South Australia	18	0.93
Tasmania	17	0.88
<i>Sector</i>		
Primary	1190	61.37
Secondary	686	35.38
Early childhood	63	3.25
<i>Time teaching</i>		
Early career (1–5 years)	23	1.19
Mid career (5–20 years)	1132	58.38
Late career (20 years +)	784	40.43
<i>Roles outside of Teaching</i>		
Principal	23	1.19
Deputy Principal	37	1.91
Head of Dept	183	9.44
Head of curriculum	199	10.26
SENCO	22	1.19
Guidance Officer	114	5.88

School Faculty/Staff and Trauma Survey (Crosby et al., 2018)

The School Faculty/Staff and Trauma Survey (Crosby et al., 2018) measures trauma awareness, teacher perceptions of student behavior, and teacher responses to student behavior. The Awareness of Trauma (TTS) scale, with a reliability of $\alpha=0.91$ in prior research and $\alpha=0.81$ in the current sample, includes items like “I recognize trauma’s effects in student behavior.” The Teacher Perceptions of Student Behaviour (TPSB) subscales for “acting out” ($\alpha=0.86$) and “shutting down” ($\alpha=0.82$) include items such as “I understand the reasons behind a student’s withdrawal,” with current reliabilities of $\alpha=0.80$ and $\alpha=0.74$, respectively. The Teacher Responses to Student Behaviour (TRSB) measures responses to behavior with “acting out” ($\alpha=0.79$) and “shutting down” ($\alpha=0.81$) subscales, including items like “I apply specific strategies for disruptive behaviors,” with

current reliabilities of $\alpha=0.80$ and $\alpha=0.74$. All items are rated on a 5-point Likert scale from 1 (Strongly Disagree) to 5 (Strongly Agree). High scores indicate strong knowledge and implementation of trauma-informed principles.

Teacher Sense of Self-Efficacy for Classroom Management (TSES); Tschannen-Moran & Hoy, 2001

The Teacher Sense of Self-Efficacy Scale (TSES; Tschannen-Moran & Hoy, 2001) includes 24 items divided into three subscales: instructional activities, student engagement, and classroom management. Items are rated on a 9-point Likert scale from 1 (Nothing) to 9 (A Great Deal). Example items include “How much can you do to calm a student who is disruptive or noisy?” High scores indicate confidence in managing classrooms, engaging students, and conducting instructional activities, while low scores suggest areas of uncertainty. Previously reported reliability ranges from $\alpha=0.87$ to 0.91, with current sample reliabilities of $\alpha=0.85$ (instructional activities), $\alpha=0.86$ (student engagement), and $\alpha=0.90$ (classroom management).

The Workplace PERMA Profiler (Butler & Kern, 2016)

The Workplace PERMA Profiler (Butler & Kern, 2016) consists of 23 items measured on a 10-point Likert scale from 0 (Never) to 10 (Always). It assesses five dimensions: positive emotion, engagement, relationships, meaning, and accomplishment, along with additional items for negative emotion and health, and single-item indicators of overall happiness and loneliness. Example items include “To what extent is your work purposeful and meaningful?” and “How often do you feel you are making progress towards accomplishing your work-related goals?” Previously reported reliability scores ranged from $\alpha=0.80$ to 0.93, with current sample reliabilities within this range. High scores indicate robust well-being, while low scores suggest areas needing intervention to improve satisfaction and health.

Demographic information

Participants were also asked demographic information about what state of Australia they reside in and how long they have been teaching, as well as which educational sector they work in, and any additional roles that they hold within the school. This information was gathered in order to explore potential differences in sector or experience level.

Data analysis

In this study, hierarchical regression using STATA was conducted to examine complex constructs such as burnout, secondary traumatic stress (STS), and compassion satisfaction (CS). Demographic variables (state, sector, time teaching, gender) were categorised for clear quantification. To assess the prevalence of compassion

Table 2 Number of teachers reporting levels of compassion satisfaction, secondary traumatic stress, and burnout

Risk level	Number of respondents	Percentage (%)
<i>Compassion satisfaction (CS)</i>		
Low	479	29.71
Moderate	686	42.96
High	447	27.73
<i>Burnout</i>		
Low	422	26.18
Moderate	757	46.96
High	433	26.86
<i>Secondary traumatic stress (STS)</i>		
Low	459	28.47
Moderate	669	41.5
High	484	30.02

Note. N=1612. ProQOL=Professional Quality of Life Scale. (Stamm, 2010). Normative rank and cut scores of compassion satisfaction (low, 44, average=45–56, high, 57); burnout (low, 43, average=44–55, high, 56); and secondary traumatic stress (low, 42, average=43–55, high, 56). Adapted with permission from “The concise ProQOL manual”, by B. H. Stamm, 2010. ProQOL.org

satisfaction, burnout, and STS among teachers, participants’ scores were categorised based on established cut-off scores, as detailed in Table 2. Multiple imputation techniques, specifically multiple imputation by chained equations (MICE), were applied to address missing values (Austin et al., 2021).

Correlation analysis using Pearson’s correlation coefficients was conducted to investigate associations among variables, using Cohen’s (1988) criteria for effect size. To further understand these relationships, three separate hierarchical multiple regression analyses were performed. Initially, demographic variables were incorporated, followed by efficacy measures (Efficacy in Student Engagement, Instructional Strategies, Classroom Management), and then well-being measures (Positive Emotion, Engagement, Relationships, Meaning, Accomplishment, Overall Well-being, Negative Emotion, Health, Loneliness). The final block included measures such as Trauma Awareness and Teacher Perceptions and Responses to Student Behaviour to examine their cumulative impact on burnout, STS, and CS.

Results

Current prevalence of burnout, secondary traumatic stress, and compassion satisfaction

In order to answer the first research question and determine the prevalence of compassion satisfaction, burnout, and secondary traumatic stress among teachers,

participants' scores were categorised into cut-off scores. A total of 1,612 participants completed the items for CS, STS, and Burnout.

As can be seen in Table 2, the highest percentage of teachers was classified as experiencing moderate levels of Compassion Satisfaction (42.56%) Burnout (46.96%) and Secondary Traumatic Stress (41.5%).

Correlational analysis

Following the application of multiple imputation techniques to enhance dataset integrity and mitigate potential biases from missing values, Pearson's correlation coefficients were computed using mean scores for each variable to assess the relationships between various educational and psychological variables. The results are seen in Table 3.

Hierarchical multiple regression: burnout

In the hierarchical multiple regressions for factors influencing burnout among teachers, well-being variables were the most influential, accounting for an additional 49.5% of the variance in burnout. Negative Emotion and Loneliness were strong

Table 3 Pearson's correlation coefficients (significance)

Variable	CS	Burnout	STS
Accomplishment	0.58 (p < .05)	-0.58 (p < .05)	-0.37 (p < .05)
Efficacy in classroom management	0.46 (p < .05)	-0.29 (p < .05)	-0.17 (p < .05)
Efficacy in instructional strategies	0.43 (p < .05)	-0.24 (p < .05)	-0.10 (p < .05)
Efficacy in student engagement	0.56 (p < .05)	-0.34 (p < .05)	-0.14 (p < .05)
Engagement	0.63 (p < .05)	-0.54 (p < .05)	-0.24 (p < .05)
Health	0.29 (p < .05)	-0.41 (p < .05)	-0.34 (p < .05)
Loneliness	-0.30 (p < .05)	0.42 (p < .05)	0.31 (p < .05)
Meaning	0.68 (p < .05)	-0.58 (p < .05)	-0.30 (p < .05)
Negative emotion	-0.48 (p < .05)	0.63 (p < .05)	0.53 (p < .05)
Other roles	0.10 (p < .05)	-0.04 (ns)	0.03 (ns)
Overall well-being	0.57 (p < .05)	-0.61 (p < .05)	-0.36 (p < .05)
Positive emotion	0.69 (p < .05)	-0.71 (p < .05)	-0.40 (p < .05)
Relationships	0.42 (p < .05)	-0.49 (p < .05)	-0.29 (p < .05)
Sector	-0.01 (ns)	-0.04 (ns)	-0.05 (ns)
State	0.08 (p < .05)	-0.05 (ns)	-0.07 (p < .05)
TPSBActOut_Total	0.03 (ns)	0.02 (ns)	0.12 (p < .05)
TPSBShutDown_Total	0.07 (p < .05)	0.02 (ns)	0.12 (p < .05)
TRSBActOut_Total	0.19 (p < .05)	-0.02 (ns)	0.25 (p < .05)
TRSBShutDown_Total	0.21 (p < .05)	-0.03 (ns)	0.23 (p < .05)
TTS_Total	0.15 (p < .05)	-0.06 (p < .05)	0.14 (p < .05)
TimeTeaching	0.07 (p < .05)	0.01 (ns)	-0.05 (ns)

positive predictors, while Positive Emotion, Engagement, Relationships, Meaning, Accomplishment, and Overall Well-being were negative predictors. Efficacy measures also significantly contributed, adding 12.92% to the variance, suggesting higher perceived efficacy is linked to lower burnout. Demographic variables had minimal impact, accounting for only 0.54% of the variance, indicating they do not play a major role in influencing burnout. Trauma awareness, Teacher perceptions of student behaviour, and Teacher response to student behaviour added only 0.17% to the variance, indicating their modest overall impact compared to well-being and efficacy measures. This is illustrated in Table 4

Hierarchical multiple regression: secondary traumatic stress

Well-being factors had the most significant impact on secondary traumatic stress (STS), contributing an additional 29.45% to its variance. Negative Emotion increased STS, while Health and Accomplishment were linked to lower STS. Loneliness also significantly raised STS levels. Teaching efficacy factors added 3.6% to the variance, indicating higher efficacy is associated with reduced STS. Demographic factors were less influential, explaining only 1.23% of the variance. Trauma awareness and teacher perceptions and responses to student behavior added 7.4% to the explained variance in the final model block. This is shown in Table 5.

Hierarchical multiple regression: compassion satisfaction

Well-being measures had the most substantial impact on Compassion Satisfaction (CS), accounting for an additional 33.94% of the variance, with Positive Emotion and Meaning as strong positive indicators, and Relationships and Loneliness as significant negative factors. Efficacy measures in Student Engagement and Classroom Management added 30.97% to the variance, indicating higher efficacy levels are positively correlated with CS. Demographic factors, while significant, explained only 2.09% of the variance. Trauma awareness and teacher perceptions and responses to student behavior added a minor but significant 0.37% to the variance. Overall, the models explained 67.51% of the variance in CS, 41.51% in STS, and 63.13% in Burnout, making them robust for understanding factors affecting compassion satisfaction and fatigue. This can be seen in Table 6.

Discussion

The findings of the present study offer vital perspectives on the psychological well-being of school teachers and early childhood educators in Australia, revealing significant challenges in their professional quality of life. A considerable portion of teachers were found to experience moderate levels of compassion satisfaction (42.96%), burnout (46.96%), and secondary traumatic stress (41.5%), suggesting that while there are positive aspects to their roles, many educators continue to face substantial professional and emotional hurdles (Caringi et al., 2015; Essary et al., 2020). These

Table 4 Burnout: hierarchical regression summary

Predictor	Coefficient	Std. error	t-value	p-value	Stage	R ²	ΔR^2	F	p
Intercept	5.16	2.23	2.31	0.021	Stage 1	0.0054	0.0054	1.63	0.164
State	-0.08	0.08	-1.01	0.312					
Sector	-0.13	0.21	-0.64	0.524					
OtherRoles	0.14	0.06	2.22	0.026					
TimeTeaching	-0.12	0.08	-1.58	0.114					
Intercept	2.68	2.19	1.22	0.223	Stage 2	0.1346	0.1292	26.81	2.43e-34
Efficacy in student engagement	-0.52	0.40	-1.31	0.189					
Efficacy in instructional strategies	0.25	0.40	0.64	0.520					
Efficacy in classroom management	-1.03	0.35	-2.97	0.003					
Intercept	10.56	2.57	4.11	0.000	Stage 3	0.6296	0.4950	127.26	9.96e-245
Positive emotion	-0.08	0.25	-0.30	0.764					
Engagement	0.18	0.14	1.26	0.209					
Relationships	-0.02	0.14	-0.16	0.870					
Meaning	0.18	0.13	1.31	0.191					
Accomplishment	-0.57	0.15	-3.81	0.000					
Overall well-being	-0.30	0.15	-2.01	0.045					
Negative emotion	1.54	0.13	11.63	0.000					
Health	-0.50	0.09	-5.49	0.000					
Loneliness	0.19	0.08	2.49	0.013					
Intercept	6.13	2.59	2.37	0.018	Stage 4	0.6313	0.0017	97.27	9.42e-241
TTS_Total	-0.05	0.04	-1.20	0.231					
TPSBActOut_Total	0.07	0.04	1.63	0.104					
TPSBShutDown_Total	0.05	0.04	1.24	0.216					
TRSBActOut_Total	-0.07	0.04	-1.85	0.065					

Table 4 (continued)

Predictor	Coefficient	Std. error	t-value	p-value	Stage	R ²	ΔR ²	F	p
TRSSShutDown_Total	-0.07	0.04	-1.64	0.101					

Table 5 STS: hierarchical regression summary

Predictor	Coefficient	Std. Error	t-value	p-value	Stage	R ² _Δ	F	p
Intercept	4.23	2.20	1.93	0.054	Stage 1	0.0123	3.76	0.0048
State	-0.01	0.08	-0.12	0.901				
Sector	0.11	0.21	0.52	0.606				
OtherRoles	-0.02	0.06	-0.38	0.703				
TimeTeaching	0.09	0.08	1.10	0.270				
Intercept	1.92	2.17	0.89	0.374	Stage 2	0.0360	8.75	1.61e-10
Efficacy in student engagement	0.17	0.40	0.42	0.676				
Efficacy in instructional strategies	-0.07	0.40	-0.17	0.862				
Efficacy in classroom management	-0.38	0.35	-1.07	0.286				
Intercept	7.58	2.71	2.80	0.005	Stage 3	0.2945	39.04	2.18e-97
Positive emotion	-0.40	0.26	-1.54	0.123				
Engagement	-0.08	0.14	-0.59	0.555				
Relationships	-0.06	0.14	-0.46	0.647				
Meaning	0.03	0.14	0.24	0.809				
Accomplishment	-0.61	0.16	-3.80	0.000				
Overall well-being	-0.34	0.15	-2.22	0.026				
Negative emotion	1.00	0.14	7.01	0.000				
Health	-0.50	0.09	-5.30	0.000				
Loneliness	0.45	0.08	5.44	0.000				

Table 6 CS: hierarchical regression summary

Predictor	Coefficient	Std. Error	t-value	p-value	Stage	R ²	ΔR ²	F	p
Intercept	11.06	2.50	4.43	0.000	Stage 1	0.0209	0.0209	6.45	0.0000393
State	0.06	0.10	0.58	0.565					
Sector	0.23	0.29	0.81	0.419					
OtherRoles	0.06	0.08	0.79	0.429					
TimeTeaching	-0.09	0.11	-0.88	0.380					
Intercept	8.58	2.36	3.63	0.000	Stage 2	0.3306	0.3097	85.16	1.09e-100
Efficacy in student engagement	1.01	0.42	2.39	0.017					
Efficacy in instructional strategies	0.49	0.42	1.16	0.246					
Efficacy in classroom management	0.69	0.35	1.96	0.051					
Intercept	11.06	2.50	4.43	0.000	Stage 3	0.6700	0.3394	152.02	1.37e-274
Positive emotion	0.72	0.24	3.01	0.003					
Engagement	0.25	0.13	1.88	0.061					
Relationships	0.12	0.13	0.95	0.341					
Meaning	0.58	0.13	4.51	0.000					
Accomplishment	0.44	0.14	3.22	0.001					
Overall well-being	0.41	0.15	2.72	0.007					
Negative emotion	-0.88	0.14	-6.35	0.000					
Health	0.50	0.09	5.47	0.000					
Loneliness	-0.53	0.08	-6.88	0.000					
Intercept	10.90	2.47	4.42	0.000	Stage 4	0.6737	0.0037	117.31	3.72e-272
TTS_Total	-0.01	0.04	-0.24	0.812					
TPSBActOut_Total	0.05	0.04	1.24	0.216					
TPSBShutDown_Total	-0.01	0.04	-0.23	0.815					
TRSBActOut_Total	0.13	0.05	2.56	0.010					

Table 6 (continued)

Predictor	Coefficient	Std. Error	t-value	p-value	Stage	R ²	ΔR ²	F	p
TRSBSshutDown_Total	0.13	0.05	2.36	0.018					

figures indicate a pressing need for targeted interventions to bolster teachers' well-being and mitigate the impact of occupational stressors.

This gains relevance due to the elevated occurrence of childhood trauma and the likely increase in student traumatic stress resulting from the COVID-19 pandemic (Cowie & Myers, 2021), international conflicts (Wilson, 2008), and climate-related disasters (Berger & Nott, 2023; L'Estrange & Howard, 2022). In practical terms, the study's outcomes offer insights into how schools should tackle the issue of emotional exhaustion of their teaching staff, including addressing the less recognised but equally debilitating phenomenon of compassion fatigue. This condition, characterised by a deep emotional and physical exhaustion due to chronic exposure to traumatic situations through students, complements the discussion on burnout by highlighting a critical area of teacher well-being that requires attention and intervention (Figley, 1995). The findings point towards the benefit of taking a proactive approach aimed at the primary prevention of burnout and compassion fatigue. According to Brown and Quick (2013), primary prevention of burnout involves altering the foundational conditions that could potentially give rise to burnout. This is deemed to be more efficient compared to tertiary interventions, which are designed to address already manifested burnout (Madigan & Kim, 2021). Such primary prevention initiatives could encompass organisational changes like workload modification or redistribution, creating clear role definitions, and equipping teachers with sufficient resources such as social or supervisory support (Madigan & Kim, 2021). Similarly, introducing mechanisms to mitigate compassion fatigue, such as ensuring emotional support and adequate recovery time, can prevent the onset of this condition, thereby maintaining teacher efficacy and emotional resilience (Figley, 1995; Madigan & Kim, 2021).

The results of this study also underscore the paramount importance of well-being concerning burnout, compassion satisfaction (CS), and secondary traumatic stress (STS) in teachers. These findings highlight that teachers with higher levels of well-being are less prone to burnout, reducing the risk of emotional exhaustion and disengagement often associated with this phenomenon (Essary et al., 2020). Additionally, by fostering an environment that promotes compassion satisfaction, educators can experience a greater sense of fulfillment and satisfaction in their roles, which acts as a buffer against the negative impacts of compassion fatigue, ultimately enhancing their professional quality of life (Essary et al., 2020; Stamm, 2010).

Our results support the findings of Caringi et al. (2015), indicating that teachers with lower well-being may be more vulnerable to Secondary Traumatic Stress (STS), as their emotional resilience and ability to cope with the traumatic experiences of students may be compromised. This susceptibility to STS may be further complicated by the duration of their teaching careers. Previous research by Fernandez-Berrocal et al. (2017) and Gastaldi et al. (2014) has found that longer teaching experience was found to be a determinant of a reduction in well-being among teachers, suggesting a cumulative effect of stress over time. Other research highlights that teachers with fewer years of service tend to be more satisfied than those with more years of service (Alves et al., 2021) pointing to a potential decline in job satisfaction and emotional well-being as teachers advance in their careers. This pattern underscores the need for sustained support systems throughout a teacher's professional

lifecycle to mitigate the risks of STS and preserve their well-being and efficacy in the classroom.

According to research conducted by Koenig et al. (2018), it is recommended that self-care strategies be incorporated into the initial teacher training and early career stages to reduce the susceptibility of younger educators to compassion fatigue. Although it should be also noted that research has found that there is limited benefit in individualistic approaches alone if they do not also address the well-being impact of systems and structures that are inherently harmful, overwhelming, discriminatory or stressful (Hine et al., 2022).

Integrating these self-care practices early on not only benefits new teachers but also serves as a critical support for more experienced educators. Although years of teaching experience, which is an unchangeable variable, has been found to contribute to a decrease in well-being among teachers, the negative impact of this experience can be mitigated by fostering a strong sense of mood repair (ability to improve your emotional state; Fernandez-Berrocal et al., 2017). By emphasising self-care and emotional regulation across all stages of a teaching career, educators can maintain higher levels of well-being and job satisfaction, even as the challenges and demands of the profession intensify with time. This proactive approach supports sustained teacher effectiveness and personal well-being, enhancing the overall educational environment.

This, in turn, has the potential to enhance the mental health and well-being of both teaching staff and students. The existing body of literature underscores the positive correlation between teacher well-being and student well-being, as well as improved learning outcomes (Carroll et al., 2022; Harding et al., 2019). However, it is noteworthy that there is a limited availability of evidence-based programs specifically designed to address teacher well-being, as highlighted by Berger et al., (2022a, 2022b).

The present study also reveals the substantial role of efficacy variables in explaining burnout, compassion satisfaction (CS), and secondary traumatic stress (STS) among educators. In the case of burnout, efficacy measures significantly contributed by adding 12.92% to the variance. This indicates that teachers with higher perceived classroom efficacy tend to experience lower levels of burnout. Meanwhile, in the context of CS, efficacy measures had a considerable impact, contributing an additional 30.97% to the variance. However, for STS, efficacy measures added only 3.6% to the variance, indicating a more limited role in mitigating secondary traumatic stress. Overall, these findings emphasise the considerable influence of classroom efficacy on educator well-being, burnout, and CS, which support the findings of Hajovsky et al. (2020) who found that teacher self-efficacy is a contributing factor to strong teacher-student relationships. Although our study found no significant correlations between efficacy and demographic variables, previous research presents mixed findings. Positive correlations between teacher self-efficacy (TSE) and factors like age and experience have been noted by Chester and Beaudin (1996) and Ross et al. (1996), while other studies like those by Klassen and Chiu (2010) and Hoy and Spero (2005) describe a non-linear relationship where TSE initially increases with experience before declining. In terms of gender, some studies found differences in TSE between male and female teachers (Coladarci, 1992; Ross et al., 1996),

while others found no significant effects (Malmberg et al., 2014). This highlights the importance of fostering self-efficacy in various aspects of teaching practice in order to support the well-being of teaching staff.

Trauma awareness variables demonstrated a nuanced relationship in the present study with Compassion Satisfaction (CS), Burnout, and Secondary Traumatic Stress (STS) in teachers. In the context of CS, trauma awareness variables marginally increase the explanatory power of the model by 0.37%, indicating a minor but statistically significant contribution. Similarly, in the prediction of Burnout, these variables add only 0.17% to the variance, suggesting a limited role. However, the influence of trauma awareness becomes more pronounced in the context of STS, contributing an additional 7.4% to the variance. This elevated impact reflects the closer connection between teachers' awareness of trauma and their susceptibility to STS (Ormiston, 2022).

While the data indicates that a significant proportion of teachers will encounter traumatised students, multiple studies consistently reveal that teachers often do not possess the necessary skills or knowledge to effectively assist these students (Alisic, 2012; Oberg & Bryce, 2022). Furthermore, teachers frequently lack a comprehensive understanding of how trauma and adversity can affect childhood development and academic performance (Alisic, 2012; Berger & Samuel, 2020). The act of working with traumatised students can potentially impact teachers' well-being and create emotional strain, as they grapple with the dual responsibilities of delivering academic instruction and tending to students' emotional welfare (Alisic, 2012; Brunzell et al., 2018).

Numerous studies also highlight the prevalent lack of confidence among teachers in their ability to support traumatised students, with insufficient training in trauma-aware practices undermining their self-efficacy (Alisic, 2012; Brunzell et al., 2018; Luthar & Mendes, 2020; Oberg & Bryce, 2022). Educators who are in contact with traumatised students should be provided with opportunities to build their understanding of the potential adverse impacts that such interactions can have on their mental health and overall well-being. It is also recommended that these teachers receive training in interventions designed to enhance their well-being and efficacy in the classroom. This training can empower them with the tools and strategies necessary to effectively manage the challenges associated with working with traumatised students while promoting their own mental and emotional health. Indeed, it may be useful to explore models of self-care, supervision, and organisational support for professionals in fields like child welfare (Miller et al., 2018) to determine how they may be adapted for use in school settings.

A review of trauma-specific programs in schools conducted by Berger (2019) revealed a scarcity of trauma-informed initiatives that cater to the needs of teachers. The collective findings from previous research and the current study emphasise the ongoing importance of addressing the well-being, knowledge, and confidence of teachers who are tasked with managing the requirements of traumatised students within their classrooms.

Considering the impact of the COVID-19 pandemic on teachers, as discussed in studies by Berger et al., (2022a, 2022b) and Chan et al. (2021), it is evident that further research is necessary to explore teachers' perceptions regarding their well-being

as well as those parts of the job which they believe contribute to or protect from compassion fatigue and burnout.

Limitations and recommendations for future research

While this study provides valuable insights, it is important to acknowledge its limitations. Firstly, the use of a cross-sectional design presents a limitation as it precludes the establishment of causal relationships between teacher well-being, efficacy and levels of burnout, STS, and CS (Neuman, 2014). Future research would benefit from employing longitudinal designs to better ascertain causality. Furthermore, this study was unable to investigate whether specific school characteristics, such as public versus private school or the availability of school-based mental health programs and professionals, influenced levels of compassion fatigue and satisfaction among teachers.

The second limitation pertains to the measures utilised in this study, which relied on self-report assessments of burnout, secondary traumatic stress, and compassion satisfaction. This approach may have limitations compared to less subjective measures. Research conducted by Brown (2016) and Lepore (2016) using the ProQOL scale found that qualitative data from teachers revealed elevated levels of secondary traumatic stress not captured by the ProQOL items. Moreover, the present study employed a modified Trauma Awareness measure, and further research is necessary to assess the psychometric properties of this scale as it was developed for use in residential facilities and has yet to be tested in large, traditional school settings (Crosby et al., 2016). Future studies may consider exploring variables that delve into the frequency and nature of teachers' interactions with trauma-affected students and how this relates to their experiences of compassion fatigue and satisfaction. Similarly, although trauma awareness was found to have only a small correlation with Burnout, STS, and CS, examining the types and frequency of teachers' prior trauma training as well as their own lived experience of trauma, and its relationship with their experiences of compassion fatigue and satisfaction could provide valuable insights.

In addition to these limitations related to the measures used, although some demographic questions were asked, participants were not asked about their cultural background including their Indigeneity. Considering that it has been found that Aboriginal and/or Torres Strait Islander educators face additional well-being challenges as do educators from culturally and linguistically diverse backgrounds (Hine et al., 2022), this is a limitation which may impact the ability to apply these results to diverse populations.

It is worth noting however, that while the results did not reveal a significant association between trauma-awareness and compassion fatigue or satisfaction among teachers, perceived knowledge and confidence were found to be linked to teachers' well-being. Further research in this area may shed more light on the influence of training in trauma-awareness on teacher well-being in response to trauma-impacted students.

Considering these findings, several recommendations emerge: Firstly, further research is needed to explore the barriers and enablers of CF and how to better

prepare and protect teachers as they work with a cohort of students who are increasingly demonstrating symptoms of trauma and poor well-being. In addition, educational institutions should prioritise the well-being of teachers by implementing programs and initiatives aimed at promoting mental and emotional health. These efforts can significantly reduce the risk of burnout and contribute to a more satisfied and engaged teaching workforce. Lastly, addressing efficacy factors should be an integral part of teacher support and development programs. Identifying and addressing these variables can help mitigate burnout and secondary traumatic stress among educators, leading to a more resilient and satisfied teaching workforce in Australia.

Conclusion

This research advances our understanding of compassion fatigue and compassion satisfaction among educators in Australia. It highlights a crucial connection between teacher well-being and their susceptibility to burnout, with improved well-being serving as a protective factor against emotional exhaustion and disengagement, both of which are commonly associated with burnout. Furthermore, the study underscores the positive relationship between enhanced well-being and higher levels of compassion satisfaction, ultimately contributing to greater fulfilment and job satisfaction among educators.

The study highlights the crucial role of efficacy variables in managing burnout, enhancing compassion satisfaction, and mitigating secondary traumatic stress among teachers, underscoring the need for educational institutions to systematically support teacher well-being. By implementing targeted mental and emotional health programs, providing training to boost compassion satisfaction, and managing efficacy factors effectively, schools can cultivate a more resilient and satisfied teaching workforce in Australia.

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Data availability Access to data sets can be requested from the principal author.

Declarations

Competing Interests All authors certify that they have no affiliations with or involvement in any organisation or entity with any financial interest or non-financial interest in the subject matter or materials discussed in this manuscript.

Ethical approval This study was granted ethics approval by the ethics board of the University of Queensland.

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