Exploring the association between teachers’ perceived student misbehaviour and emotional exhaustion: the importance of teacher efficacy beliefs and emotion regulation

Costas N. Tsouloupas⁎, Russell L. Carson, Russell Matthews, Matthew J. Grawitch and Larissa K. Barber

aDepartment of Kinesiology, Louisiana State University, Baton Rouge, USA; bDepartment of Psychology, Louisiana State University, Baton Rouge, USA; cSchool for Professional Studies, Saint Louis University, Saint Louis, USA; dDepartment of Psychology, Saint Louis University, Saint Louis, USA

(Received 19 June 2009; final version received 17 November 2009)

The purpose of this study is to examine the relationship between teachers’ perceived student misbehaviour and emotional exhaustion, and the role of teacher efficacy beliefs (related to handling student misbehaviour) and emotion regulation in this relationship. Additionally, we examined teacher turnover intentions in relation to emotional exhaustion. Data were collected from 610 elementary, middle- and high-school teachers using an online survey. Results indicate that despite the significant direct effect between the two emotion regulation strategies (cognitive reappraisal, expressive suppression) on emotional exhaustion, both strategies failed to show a mediating effect between perceived student misbehaviour and emotional exhaustion. However, teacher efficacy in handling student misbehaviour was found to mediate the relationship between perceived student misbehaviour and emotional exhaustion. In turn, a significant relationship was found between emotional exhaustion and turnover intentions. Furthermore, teacher perception of student misbehaviour was found to have a considerable indirect effect on teacher turnover intentions. Findings signify the importance of developing strategies that enhance teachers’ situation-specific efficacy beliefs.

Keywords: emotional; teaching efficacy; problem behaviour; belief; teacher burnout

Teacher burnout is a driving force behind the struggle to keep teachers satisfied and committed at work (Chan, 2006; Evers, Tomic, & Brouwers, 2004). Like most human service professionals, teachers are prone to experience burnout due to their intense, everyday interaction with students, colleagues, administration and parents (Friedman, 1995, 2006; Schaufeli & Enzmann, 1998). It is not surprising that burnout has received a great deal of attention within the teaching community (Friedman, 2006; Schwab, Jackson, & Schuler, 1986).

Burnout is generally defined as the experience of emotional exhaustion, depersonalisation and reduced personal accomplishment (Maslach, Leiter, & Schaufeli, 2008). Consistently though, emotional exhaustion has been shown to be more strongly related to important outcomes such as job performance, work attitudes and employee satisfaction.
behaviours compared to the other two components (i.e. depersonalisation and reduced personal accomplishment), suggesting that emotional exhaustion is the core dimension of burnout (Cropanzano, Rupp, & Byrne, 2003; Demerouti, Bakker, Nachreiner, & Schaufeli, 2001; Koeske & Koeske, 1993; Schaufeli & Enzmann, 1998). Furthermore, conceptual work by Shirom (1989) and findings from empirical studies by Lee and Ashforth (1993, 1996) and Cropanzano et al. (2003) imply that future studies adopt emotional exhaustion as the sole indicator to burnout. Following this line of work, teacher burnout was operationalised as emotional exhaustion in this study.

The most prevalent driver of burnout in teachers at work stems from their everyday dealings with the classroom behaviour of students (Friedman, 2006). More specifically, the act of disciplining students has been linked with teacher emotional exhaustion (Chan, 2006; Evers et al., 2004; Friedman, 1995; Sutton & Wheatley, 2003) causing distress, negative attitudes and feelings of helplessness, hopelessness and embarrassment (Friedman, 2006). Typically, student misbehaviour includes student distractibility, hyperactivity, social rejection, disobedience and hostile aggression (Almog & Shechtman, 2007), all of which are exacerbated by frequent, negative interactions of great intensity. Kokkinos (2007) found that one reason burnout is associated with student misbehaviour is because teachers become emotionally exhausted from the time and effort they put into handling these student misbehaviours. Additionally, Kokkinos suggested that burnout is associated with teacher perceptions of student misbehaviour because teachers often develop negative feelings and become discouraged about their ability to manage and instruct their students. We propose that two processes are important in understanding the relationship between perceptions of student misbehaviour and emotional exhaustion: (1) teacher efficacy related to handling student misbehaviour, and (2) teacher emotion regulation processes when handling student misbehaviour.

**Teacher efficacy in handling student misbehaviour**

Student misbehaviour is a disconcerting challenge for teachers and their beliefs about their ability to effectively manage the classroom environment (Almog & Shechtman, 2007; Ross & Bruce, 2007; Shechtman, Levy, & Leichtentritt, 2005; Tucker et al., 2005). Stemming from social cognitive theory, Bandura (1989, 1997) referred to beliefs about one’s ability to successfully produce a desired outcome as *self-efficacy*. Self-efficacy can be applied to specific populations (e.g. teachers) and specific situations (e.g. handling misbehaviour problems; Almog & Shechtman, 2007; Emmer & Stough, 2001; Ross & Bruce, 2007; Shechtman et al., 2005; Tucker et al., 2005). Therefore, teachers might vary in the beliefs they hold about their ability to effectively manage misbehaving students. Hereafter, we refer to this form of perceived efficacy as *teacher efficacy in handling student misbehaviour* (TEHSM).

Perceived TEHSM is important for several reasons. First, teacher efficacy beliefs are imperative to establishing managerial excellence in the classroom. Research suggests that individual characteristics, such as teacher efficacy, predispose teachers to perceive undesirable work events (i.e. student misbehaviour) in ways that either thwart or facilitate teachers’ adaptation and reaction to such events (Kaplan, 1996; Kokkinos, 2007). Therefore, teachers with higher TEHSM will likely be more adaptive and responsive when faced student misbehaviour than teachers with lower TEHSM. Second, previous conceptual and empirical research has also demonstrated
that teacher efficacy is a key component in the burnout process (Friedman, 2006; Lee & Ashforth, 1996). In past studies, teachers with high beliefs in their teaching ability (i.e. teacher efficacy) have demonstrated less burnout than teachers with low levels of efficacy (Betoret, 2006; Egyed & Short, 2006; Evers, Brouwers, & Tomic, 2002).

Taken together, we argue that teacher beliefs in their ability to effectively handle student misbehaviour is a central feature in the relationship between perceptions of student misbehaviour and the core dimension of burnout – emotional exhaustion. Therefore, the first aim of this study is to explore if TEHSM helps explain the relationship between teacher perceptions of student misbehaviour and emotional exhaustion. Specifically, we hypothesise that:

H1: Teacher perceptions of student misbehaviour will be positively related to emotional exhaustion.
H2: Teacher perceptions of student misbehaviour will be indirectly and negatively related to emotional exhaustion through TEHSM.

**Emotional regulation process when handling student misbehaviour**

Another potentially fruitful, but overlooked, explanation for describing the relationship between teacher perceptions of student misbehaviour and emotional exhaustion is the emotion regulation process. Emotion regulation can be defined as our actions that determine which emotions we choose to allow or contain, at what point we should use them and how should we experience or express those emotions (Gross, 1998a, 1998b; Gross & John, 2003). In their review of literature on teacher emotions, Sutton and Wheatley (2003) concluded that teacher emotions and student discipline are two fields that should come together to explain the teacher burnout phenomenon. Clearly, more systematic research is needed to examine how emotion regulation may influence the experience of emotional exhaustion, especially when considering ineffective dealings with student misbehaviour.

Individuals may regulate their emotions in one of the two ways: cognitive reappraisal and expressive suppression. Cognitive reappraisal is used to reinterpret and decrease negative emotions and behavioural expressions by altering thoughts of potentially inducing events. For example, a teacher who is about to deal with a disruptive student in class might cognitively reappraise the stressful situation by referring to pre-established routines s/he has already imagined and rehearsed. This way, the negative emotions that may ensue from handling student misconduct are altered to less intense negative emotions. Previous studies have shown that this form of cognitive reinterpretation is associated with decreased stress (Yamasaki, Sakai, & Uchida, 2006) and improved social interactions and overall health (Folkman & Moskowitz, 2000; Tugade & Fredrickson, 2007).

Expressive suppression, on the other hand, affects behaviour by ‘shutting-down’ emotions viewed as threatening to one’s emotional equilibrium (Gross, 1998a). Suppression of emotions implies that individuals hide the true emotions they experience to avoid negative outcomes while increasing the likelihood of desired outcomes. Using student misbehaviour as an example, a teacher might attempt to hide feelings of anger and frustration by choosing to ignore the student talking during class. Although research is inconclusive regarding whether suppressing emotions negatively affects a person’s feelings and overall well-being (Grandey, 2000), expressive
suppression is often associated with less optimal outcomes, such as pessimism and depressive symptoms, job dissatisfaction and intentions of job turnover (Barsade & Gibson, 2007; Côté & Morgan, 2002; Richards & Gross, 2000).

Teaching is a profession filled with feelings and emotions (Hargreaves, 1998). Unwanted feelings can accumulate and influence the emotional state of teachers, which can become draining and result in burnout (Chan, 2006; Evers et al., 2004; Friedman, 1995). For this reason, the second aim of this study is to explore if the well-documented relationship between student misbehaviour and burnout is due to teacher emotion regulation. That is, the use of effective emotion regulation strategies when dealing with student misbehaviour may reduce the experience of emotional exhaustion. We hypothesise that:

H₃ₐ: Teachers’ perceived student misbehaviour is indirectly and negatively related to emotional exhaustion through cognitive reappraisal.
H₃ₖ: Teachers’ perceived student misbehaviour is indirectly and positively related to emotional exhaustion through expressive suppression.

Emotional exhaustion and teacher turnover

It is critical to be concerned about emotional exhaustion. Besides being the main contributor to burnout, feelings of emotional exhaustion have been linked to the impairment of overall job performance, well-being, and health (Ducharme, Knudsen, & Roman, 2008). An additional adverse outcome associated with emotional exhaustion is job turnover (Lee & Ashforth, 1993, 1996).

The turnover of teachers in today’s schools has, in many ways, reached epidemic proportions. The most recent teacher turnover estimates, 16.5% in public schools and 19.5% in private schools, are not only considerably higher than the nationwide employee average (U.S. Department of Education, 2007) but have increased by more than a third since the 1991–1992 school year (Boe, Cook, & Sunderland, 2008). Clearly, teacher turnover, defined as a combination of the teachers who leave the profession entirely (i.e. attrition) and those who transfer to another school setting (i.e. migration), produces the same end result: a high demand for committed, stable teachers today (Ingersoll, 2001). The relationship between teachers’ emotional exhaustion and turnover intentions has only been suggested in past research (Schwab et al., 1986). The third aim of this paper is to add to the literature by clarifying this relationship and also identifying potential pathways that suggest indirect effects on turnover intentions. As such, we hypothesise that:

H₄ₐ: Emotional exhaustion is positively related to teacher attrition.
H₄ₖ: Emotional exhaustion is positively related to teacher migration.

Purposes and significance of the study

This study explores teacher perceptions of student misbehaviour as a potential predictor of two unfavourable psychological outcomes of teachers – emotional exhaustion and turnover intentions. Teacher perceptions and psychological outcomes have multiple origins, and therefore, it was considered practical and beneficial to identify mediators that might explain this relationship (Baron & Kenny, 1986). Consequently, the primary purpose of the current study is to examine TEHSM and emotional
regulation as two potential mediators between the teacher perceptions of student misbehaviour and emotional exhaustion relationship.

In order to argue for mediation, one condition is to demonstrate a direct path between the predictor (e.g. teachers’ perceived student misbehaviour) and outcome variable (e.g. emotional exhaustion). A second condition for mediation is to show that the variable(s) (e.g. teachers’ perceived student misbehaviour, emotional regulation), operating as a mediator, contribute to this direct relationship via indirect paths between the predictor and the outcome variable whereby the predictor directly influences the mediator and the mediator directly influences the outcome variable (Baron & Kenny, 1986; Schwarzer & Hallum, 2008). Therefore, this study expands on past teacher efficacy and emotion regulation literature by investigating both the direct and indirect paths that TEHSM and the two emotion regulation strategies (i.e. cognitive reappraisal, expressive suppression) have between teacher perceptions of student misbehaviour and emotional exhaustion. Additionally, the secondary purpose of this study is to confirm past suggestions that emotional exhaustion is related to teacher turnover intentions. Findings may shed light into how perceptions of student misbehaviour and teacher burnout are linked, and by doing so, help researchers and practitioners design future interventions that consider teacher efficacy and emotion regulation strategies for effectively handling student misbehaviour.

**Methods**

**Participants**

Participants were 610 full-time elementary \( (n = 300) \), middle-school \( (n = 115) \) and high-school \( (n = 195) \) teachers (female = 527, male = 83; 91% Caucasian-American, 8% African-American, 1% other) from four school districts (three in southeast, one in midwest) in the USA. Teachers represented nine subject areas (e.g. math, science, English, art and physical education) and a diverse range of teaching experience with the majority being either beginning (0–5 years) or mid- to late-career (11+ years) teachers, (35% and 45%, respectively). Only 20% of the teachers had 6–10 years of experience.

**Procedure**

After approval was granted from the affiliated Institutional Review Board and the superintendents of the five participating school districts, data were collected using an online survey. The assistants to the superintendents from each school district sent the 2484 total teachers the consent form and the survey link in an email. Teachers were informed that clicking the survey link meant they consented to participate in the study. Teachers were given two weeks to submit a completed survey before a reminder email was distributed by the same assistant to the superintendent. Seven hundred and thirty-four teachers submitted online surveys (30% response rate), of which 610, adequately completed the surveys for this study (total response rate of 25%).

**Measures**

**Teacher perceptions of student misbehaviour**

Three items were created to assess the teachers’ overall perception of student discipline issues at school. The first item asked, ‘How frequently do you experience
negative interactions with students?’ The second item asked, ‘How often do you deal
with student discipline problems?’ The third item asked, ‘On average, how emotion-
ally intense are your dealings with student discipline problems?’ Items were scored on
a five-point scale ranging from 1 (almost never occurs) to 5 (occurs very frequently).

Perceived teacher efficacy in handling student misbehaviour
Teacher efficacy in dealing with misbehaving students was assessed using the 13-item
Perceived Self-Efficacy in Classroom Management (PSEC) questionnaire (Brouwers
& Tomic, 2001). Teachers were asked to reflect on their true feelings and thoughts when
dealing with disruptive behaviour and stressful situations. The items were reported on
a six-point scale ranging from 1 (strongly disagree) to 6 (strongly agree). Two sample
items include, ‘I can keep defiant students involved in my lessons,’ and ‘If students
stop working, I can put them back on track.’

Emotion regulation strategies
Cognitive reappraisal and expressive suppression were each assessed using a reduced
version of the Emotional Regulation Questionnaire (ERQ; Gross & John, 2003) that
consists of six cognitive reappraisal items and four expressive suppression items.
Because this study was exploratory in nature, only the four items that assessed the
emotional regulation strategies generally, without any regard to the valence of emotion
(positive or negative) being regulated, were used in this study. Two items assessed
cognitive reappraisal (‘I control my emotions by changing the way I think about the
situation I am in’ and ‘When I am faced with a stressful situation, I make myself think
about it in a way that helps me stay calm’) and two for expressive suppression
(‘I control my emotions by not expressing them’ and ‘I keep my emotions to myself’).
The author of the ERQ approved this breakdown of the subscales (J. Gross, personal
communication, November 19, 2008). Teachers were asked to reflect on how well each
item related to their everyday life in general, rather than to specific work tasks, using
a seven-point scale, ranging from 1 (strongly disagree) to 7 (strongly agree).

Emotional exhaustion
Emotional exhaustion was assessed using a reduced four-item version of the
emotional exhaustion subscale from the Maslach Burnout Inventory – Educators
Survey (MBI-ES; Maslach, Jackson, & Schwab, 1996). An example item is, ‘I feel
emotionally drained from my work.’ Teachers were asked to respond to these ques-
tions indicating ‘how often’ they experience these feelings at their job by using a
seven-point scale ranging from 0 (never) to 6 (every day). The original nine-item
emotional exhaustion subscale has been shown to not be invariant across intermediate
and secondary teachers, and therefore, these items were chosen because they had the
best structure invariance and factor loadings above .60 across teaching groups and sex
according to Byrne (1991, 1994).

Teacher turnover intentions
Teacher turnover intentions were assessed using Lee and Mowday’s (1987) two-item
turnover intention questionnaire. Teachers were asked to reflect on their current
thoughts regarding their teaching job using a six-point Likert scale that ranged from 1 (strongly disagree) to 6 (strongly agree). Two items were listed for attrition (i.e. ‘I frequently think of ending my career in teaching’) and migration (i.e. ‘If I had my own way, I would be working for this school district a year from now’), respectively. Migration items were reversed scored to ensure that the migration items were scored consistent with the attrition items. Items were treated as separate indicators of turnover intentions in the conceptual model tested.

**Results**

In Table 1, means, standard deviations, internal consistency reliability information and bivariate correlations for the measures used in the current study are reported. No correlation was so high as to imply multi-collinearity (Tabachnick & Fidell, 1996). The alpha coefficients for the emotion regulation strategies were lower than the .70 criterion (Nunnally & Bernstein, 1994) but given that they are two-item measures, high-internal consistency estimates were not expected. It is also noteworthy to report that teachers in this study who frequently experienced student behaviour problems were more prone to using cognitive reappraisal than expressive suppression.

The structural equation modelling (SEM) software package AMOS 7 (Arbuckle, 2006) was used to test the relationships among the study variables. To test our hypotheses, a hybrid SEM was used. A full SEM model was not used mainly because there were not enough indicators for cognitive reappraisal and expressive suppression (the two two-item measures), attrition and migration (the two single-item measures), and because the PSECM scale was 13 items, which was a lot of items for one scale.

Four measures of model fit were calculated; $\chi^2$: comparative fit index (CFI), root mean square error of approximation (RMSEA), and standardised root mean residual (SRMR). A non-significant $\chi^2$ indicates good model fit; however, because $\chi^2$ is sensitive to sample size, we were concerned primarily with values for the remaining fit indices in assessing model fit. A CFI value of .95 or higher, a RMSEA value of .06 or lower and a SRMR value of .08 or lower are indicative of good model fit (Hu & Bentler, 1999).

The first step was to calculate a measurement model. In the measurement model, the three items assessing teacher perceptions of student misbehaviour were loaded onto the Teacher Perception of Student Misbehaviour latent factor. The remaining multi-item measures (i.e. perceived teacher efficacy handling student misbehaviour, cognitive reappraisal, expressive suppression and emotional exhaustion) and the two single-item turnover items were included in the model as observed variables. The Teacher Perception of Student Misbehaviour latent construct and the six observed variables were then set free to correlate with one another. The measurement model demonstrated good fit $[\chi^2(12) = 20.44, p > .05, \text{CFI} = .99, \text{RMSEA} = .03, \text{SRMR} = .02]$.

Based on this measurement model, we tested our conceptual model (see Figure 1). This model demonstrated adequate fit $[\chi^2(22) = 41.94, p < .01, \text{CFI} = .98, \text{RMSEA} = .04, \text{SRMR} = .03]$. Although the $\chi^2$ statistic was significant, the other three fit indexes met their respective cut-off levels. Standardised path estimates for the model are reported in Figure 1; squared multiple correlations are reported in italics. As reported in Figure 1, H1 was supported; teacher perceptions of student misbehaviour were positively related to emotional exhaustion ($\beta = .49, p < .01$). Teachers who scored higher on the three indicators of perceived student misbehaviour were more likely to report higher levels of emotional exhaustion.
Table 1. Means, standard deviations and bivariate correlations for study variables ($N = 610$).

<table>
<thead>
<tr>
<th></th>
<th></th>
<th>M</th>
<th>SD</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Perceived student misbehavior</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Negative interactions</td>
<td></td>
<td>2.94</td>
<td>.95</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Misbehaviour problems</td>
<td></td>
<td>3.49</td>
<td>1.08</td>
<td>.59**</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Emotional intensity</td>
<td></td>
<td>2.57</td>
<td>.89</td>
<td>.37**</td>
<td>.40**</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Coping process variables</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>TEHSM</td>
<td></td>
<td>3.72</td>
<td>.80</td>
<td>-.22**</td>
<td>-.18**</td>
<td>-.17**</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>(.94)</td>
</tr>
<tr>
<td>Cognitive reappraisal</td>
<td></td>
<td>4.13</td>
<td>1.16</td>
<td>-.05</td>
<td>.01</td>
<td>-.12**</td>
<td>.14**</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Expressive suppression</td>
<td></td>
<td>2.68</td>
<td>1.40</td>
<td>.05</td>
<td>.04</td>
<td>.01</td>
<td>.03</td>
<td>.13**</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Outcomes</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Emotional exhaustion</td>
<td></td>
<td>3.19</td>
<td>1.63</td>
<td>.40**</td>
<td>.39**</td>
<td>.28**</td>
<td>-.23**</td>
<td>-.13**</td>
<td>.13**</td>
<td></td>
<td></td>
<td>(.89)</td>
</tr>
<tr>
<td>Leave the profession</td>
<td></td>
<td>3.48</td>
<td>2.13</td>
<td>.23**</td>
<td>.14**</td>
<td>.13**</td>
<td>-.15**</td>
<td>-.08</td>
<td>.10*</td>
<td>.51**</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Leave the district</td>
<td></td>
<td>5.43</td>
<td>1.91</td>
<td>.15**</td>
<td>.10*</td>
<td>.10*</td>
<td>-.18**</td>
<td>-.08*</td>
<td>.06</td>
<td>.35**</td>
<td>.41**</td>
<td></td>
</tr>
</tbody>
</table>

*p < .05; **p < .01.

Note: Internal consistency reliability alphas are reported in parentheses along the diagonal. Dashes indicate that reliabilities were not calculated for one-item measures.
H2, H3a and H3b suggested that the effect of teacher perceptions of student misbehaviour may be indirectly related to emotional exhaustion via TEHSM (H2), cognitive reappraisal (H3a) and expressive suppression (H3b). Direct, indirect and total effects for the model are reported in Table 2. Maximum likelihood bootstrapping within AMOS 7 was used to estimate standard errors and confidence intervals (90%) for all relevant indirect, direct and total effects (1000 samples were drawn).

H2 was fully supported. First, teacher perceptions of student misbehaviour were negatively related to TEHSM (β = −.27, p < .01) and TEHSM was negatively related to emotional exhaustion (β = −.09, p < .05). Although small, teacher perceptions of student misbehaviour were observed to have a significant indirect effect (.03) on emotional exhaustion.

H3a and H3b were not supported. As reported in Figure 1, significant direct effects were not observed between teacher perceptions of student misbehaviour and cognitive reappraisal (β = −.06, p > .05), or expressive suppression (β = .04, p > .05). Given that no direct effects were observed between these constructs, it is not possible for teacher perceptions of student misbehaviour to indirectly affect emotional exhaustion via these constructs. However, cognitive reappraisal and expressive suppression did have direct effects on emotional exhaustion (β = −.10 and .12, p < .01, respectively). When teachers reported engaging in cognitive reappraisal, they reported experiencing less emotional exhaustion. On the other hand, when teachers reported engaging in expressive suppression, they reported more emotional exhaustion.

Both H4a and H4b were supported. Teachers who reported higher levels of emotional exhaustion were more likely to report a desire to end their teaching career (attrition; β = .51, p < .01; H4a supported), and change schools within their current school district (migration; β = .35, p < .01; H4b supported). Generally speaking, teachers who reported experiencing higher levels of emotional exhaustion gave more consideration to both types of turnover.

**Ad hoc analysis**

In addition to testing the six proposed hypotheses, we observed two additional results that deserve mention. As reported in Table 2, teacher perceptions of student misbehaviour had significant indirect effects on both attrition (.26, p < .01) and migration.
Table 2. Standardised indirect, direct and total effects for the conceptual model; bootstrapping used to estimate SE and CI.

<table>
<thead>
<tr>
<th>Predictors</th>
<th>Emotional exhaustion</th>
<th></th>
<th></th>
<th></th>
<th>Migration</th>
<th></th>
<th></th>
<th></th>
<th>Attrition</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Direct</td>
<td>Indirect</td>
<td>Total</td>
<td>Direct</td>
<td>Indirect</td>
<td>Total</td>
<td>Direct</td>
<td>Indirect</td>
<td>Total</td>
<td>Direct</td>
</tr>
<tr>
<td>Teacher perception of student misbehaviour</td>
<td>Estimate</td>
<td>.49**</td>
<td>.03**</td>
<td>.51**</td>
<td>—</td>
<td>.18**</td>
<td>.18**</td>
<td>—</td>
<td>.26**</td>
<td>.26**</td>
<td>—</td>
</tr>
<tr>
<td></td>
<td>90% CI</td>
<td>(.42/.55)</td>
<td>(.01/.05)</td>
<td>(.45/.58)</td>
<td>(.22/.14)</td>
<td>(.22/.14)</td>
<td>(.22/.31)</td>
<td>(.22/.31)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>TEHSM</td>
<td>Estimate</td>
<td>-.09*</td>
<td>-.01</td>
<td>-.10**</td>
<td>—</td>
<td>-.03**</td>
<td>-.03**</td>
<td>—</td>
<td>-.05**</td>
<td>-.05**</td>
<td>—</td>
</tr>
<tr>
<td></td>
<td>90% CI</td>
<td>(-.15/.02)</td>
<td>(.03/.01)</td>
<td>(-.16/.03)</td>
<td>(-.01/.06)</td>
<td>(-.01/.06)</td>
<td>(-.08/.02)</td>
<td>(-.08/.02)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Expressive suppression</td>
<td>Estimate</td>
<td>.13**</td>
<td>.00</td>
<td>.13**</td>
<td>—</td>
<td>.05**</td>
<td>.05**</td>
<td>—</td>
<td>.07**</td>
<td>.07**</td>
<td>—</td>
</tr>
<tr>
<td></td>
<td>90% CI</td>
<td>(.06/.19)</td>
<td>(.00/.00)</td>
<td>(.07/.19)</td>
<td>(.07/.02)</td>
<td>(.07/.02)</td>
<td>(.03/.10)</td>
<td>(.03/.10)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cognitive reappraisal</td>
<td>Estimate</td>
<td>-.11**</td>
<td>.00</td>
<td>-.11**</td>
<td>—</td>
<td>-.04**</td>
<td>-.04**</td>
<td>—</td>
<td>-.06**</td>
<td>-.06**</td>
<td>—</td>
</tr>
<tr>
<td></td>
<td>90% CI</td>
<td>(-.18/.05)</td>
<td>(.00/.00)</td>
<td>(-.18/.05)</td>
<td>(-.02/.07)</td>
<td>(-.02/.07)</td>
<td>(-.10/.02)</td>
<td>(-.09/.02)</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*p < .05; **p < .01.

Note: Maximum likelihood bootstrapping was used with bias-corrected confidence intervals; 1000 samples drawn. CI = Confidence Intervals. All SE and CI reported are based on the bootstrapping results.
Discussion

The primary focus of this study is to investigate the mediating role of TEHSM and the two emotion regulation strategies in the relationship between teacher perceptions of student misbehaviour and emotional exhaustion. To this end, we examined both direct and indirect effects of TEHSM, cognitive reappraisal and expressive suppression in relation to teacher perceptions of student misbehaviour and emotional exhaustion. Additionally, we investigated whether emotional exhaustion was positively associated with attrition and migration.

Support for H1 in the current study confirms previous literature by demonstrating that teacher perceptions of student misbehaviour is directly and positively associated with emotional exhaustion (Brouwers & Tomic, 2000; Friedman, 1995; Kokkinos, 2007). This finding further confirms the first condition for mediation in that teacher perceptions of student misbehaviour (i.e. predictor) is a significant stressor directly affecting teacher mental well-being (i.e. outcome). Given the strength of the relationship, research that seeks to identify other potential mediators in the relationship between teacher perceptions of student misbehaviour and emotional exhaustion seems warranted.

Extending previous literature (Friedman, 1995; Kulinna, Cothran, & Regualos, 2003), the supportive evidence for H2 indicated that teacher perceptions of student misbehaviour were indirectly related to emotional exhaustion through TEHSM. This result confirms the second condition for mediation. This finding also suggests that specific forms of teacher efficacy is an important mediating factor that should be considered and further explored in frameworks studying teacher perceptions of student misbehaviour and emotional exhaustion. Therefore, improving situation-specific efficacy, such as TEHSM, may help teachers effectively cope with challenging student misconduct before unpleasant emotions escalate over time. Perhaps high-efficacy teachers in specific situations, as suggested by past research (e.g. Almog & Shechtman, 2007), may be using certain coping mechanisms during stressful events that protect them from emotional exhaustion. Further research is needed to identify such efficacy-related techniques so that educators and school authorities are able to cultivate highly efficacious teachers.

Contrary to our predictions (H3a and H3b), neither emotional regulation strategies (cognitive reappraisal and expressive suppression) mediated the relationship between teacher perceptions of student misbehaviour and emotional exhaustion. More specifically, a portion of the second condition for mediation was not met since teacher perceptions of student misbehaviour (i.e. predictor) did not significantly influence either emotion regulation strategies (i.e. mediator). One possible explanation for the null indirect findings is that questions on the ERQ (Gross & John, 2003) were not specific to how emotions are regulated with regard to the work-related event of handling student misbehaviour. Rather, the ERQ questions included in this study asked teachers to reflect on how they generally engaged in emotion regulation, rather than focusing on how they regulated their emotions during student misbehaviour situations. It is possible that individuals regulate their emotions differently in specific situations (Gross & Thompson, 2007). A suggestion for future research is to use a
more job-specific assessment tool for emotion regulation, such as the emotional labour scale (ELS; Brotheridge & Lee, 2003). However, the ELS may even have to be modified to address the specific situation of handling student misbehaviour.

Similarly, it is also possible that the two emotional regulation strategies of cognitive reappraisal and expressive suppression identified by Gross (1998a) may not have adequately captured the relationship between teacher perceptions of student misbehaviour and emotional exhaustion. Several other regulation strategies (Larsen, 2000) and even coping strategies (Carver & Scheier, 1999) have been suggested for managing one’s emotions to deal with the perception of adverse situations and impending stress. Moreover, the general affect tendency (i.e. affectivity) of teachers could predispose teachers to feel certain emotions across situations at work regardless of whether emotional regulation strategies are utilised. It has been well-documented that negative affectivity (i.e. temperamentally predisposed to feel unpleasant emotions) is positively related to emotional exhaustion in service work (Grandey, Dickter, & Sin, 2004). A worthy future research endeavour might be to explore if other regulation strategies or teachers’ affectivity influence the association between teacher perceptions of student misbehaviour and emotional exhaustion.

Another potential reason for the unexpected null findings for the mediation of either emotion regulation strategy is that 45% of the study sample reported more than 11 years of teaching experience. It is possible that, over time, teachers may develop their own strategies to deal with student misbehaviour. Kounin (1970) argues that contrary to experienced teachers, inexperienced teachers face many challenges because everything is new and, thus, more demanding. During these induction years, inexperienced teachers often struggle to maintain control over their classrooms, which often leads to ineffective student management (Feiman-Nemser, 2003). The large percentage of experienced teachers could have negated the potential indirect effects of emotion regulation in this study. It might be advantageous in future studies to test whether the mediation of emotional regulation between teacher perception of student misbehaviour and emotional exhaustion exists with beginning teachers only.

Despite the lack of mediation support for emotion regulation strategies, it was found that both emotion regulation strategies directly related to emotional exhaustion. This finding confirmed part of the second condition for mediation in that the alleged mediator directly influenced the outcome variable. A direct negative relationship was found between cognitive reappraisal and emotional exhaustion but a direct positive relationship was found between expressive suppression and emotional exhaustion. These results echo similar relationships found between both emotion regulation strategies and burnout with service workers (Grandey, 2003; Grandey et al., 2004). Cognitive reappraisal is typically considered to be an effective coping strategy for reducing negative emotions from stressful situations and thus decreases the likelihood of becoming emotionally overwhelmed (Folkman & Moskowitz, 2000; Tugade & Fredrickson, 2007; Yamasaki et al., 2006). On the other hand, the suppression of emotions is often associated with less optimal outcomes, such as pessimism, depressive symptoms, job dissatisfaction and intentions of job turnover (Barsade & Gibson, 2007; Côté & Morgan, 2002; Richards & Gross, 2000; Sutton, 2004). Accordingly, exploring practical ways that help teachers to engage in cognitive reappraisal appears to be a worthy line of future research and application.

As predicted in H4a and H4b, a significant and positive relationship exists between emotional exhaustion and both types of turnover intentions (i.e. migration and
attrition). Confirming that emotional exhaustion is a significant predictor of teacher turnover makes a substantial contribution to the literature, which, to date, has only implied the existence of this relationship (Schwab et al., 1986). This finding reinforces the necessity to prevent, alleviate or treat teacher feelings of emotional exhaustion before it drives teachers out of the profession or school district (Boe et al., 2008). Identifying emotional exhaustion as a significant contributor to teacher turnover intentions may spark new approaches in the study of teacher turnover and retention (Ingersoll, 2001). In light of this study, one worthy approach may be to develop intervention programmes that specifically focus on decreasing teacher emotional exhaustion. The few intervention programmes available to develop teacher social and emotional competence may serve as useful guides (Jennings & Greenberg, 2009).

Additional findings, as part of our post hoc analysis, suggest that teacher perceptions of student misbehaviour have an indirect effect on teacher turnover intentions through emotional exhaustion. This finding indicates that frequent experience with student misbehaviour can lead to emotional exhaustion, potentially leading to damaging career-related thoughts such as leaving the profession entirely or changing job locations. Researchers argue that there is a need to better understand emotional exhaustion and how it affects work experiences (Côté & Morgan, 2002; Wright & Cropanzano, 1998). The results from this study document the need to further investigate and consider student misbehaviour as a key variable in keeping teachers in the workforce and at their current school.

**Limitations**

The first limitation relates to the cross-sectional design of this study and the use of self-reported measures to assess all constructs. One time measures do not always provide a full picture of what is assessed and research experts recommend that qualitative measures and longitudinal studies can significantly add to the breadth of a study (Brouwers & Tomic, 2000; Côté & Morgan, 2002; Yamasaki et al., 2006). A second limitation is related to the sample of the study. Teachers from two sections of the country voluntarily participated in the study and therefore some caution is advised when generalising the results. The third limitation relates to the use of one-item scales to assess some of the constructs such as teacher perceptions of student misbehaviour. However, this study provided an exploratory snapshot of the mechanism by which teacher perceptions of student misbehaviour may affect emotional exhaustion and turnover, which can be further tested with more nuanced methodologies and measurement approaches.

**Implications**

Despite these limitations, the study confirms and extends past research regarding the contributing role of teacher perceptions of student misbehaviour to emotional exhaustion. One important implication from this study is that specific forms of teacher efficacy play a fundamental role in explaining emotional exhaustion. Teachers who constantly doubt their skills in establishing a controlled classroom environment can suffer emotionally, which can influence the decision to continue working in the profession or at one’s current school.

Teachers should realise that continuous preparation in improving their classroom management skills is imperative since it could influence perceptions of efficacy in
handling their students. Therefore, professional development programmes need to prepare teachers to face and confront their students efficiently by training them to develop strategies, rules and guidelines in handling student misconduct. Another implication is the need to equip teachers with coping resources to avoid emotional exhaustion. We suggest that research should continue to assess emotion regulation strategies as one way to explain the emotional exhaustion process.

An additional implication is that teachers having to cope with adverse situations, such as student misbehaviour, should not be taken lightly, since our results show that teachers can become emotionally drained and more susceptible to turnover. This implies the urgency for professional development programmes, school administrators and researchers to offer strategies to alleviate teacher emotional exhaustion. Reducing emotional exhaustion may result in decreased turnover intentions as well. Thus, teaching teachers the skills to improve their efficacy is critical.

The exploratory purpose of the current study was geared towards testing a theory-driven conceptual model that examined teacher perceptions regarding specific job stressors, coping strategies and adverse outcomes. This study is the first attempt to understand the mediating processes inherent in the emotional experience of disciplining students. Furthermore, it was decided that an omnibus context level of analysis was more appropriate to investigate our study variables since no theoretical arguments were yet formed (Johns, 2006). Consequently, the proposed relationships were studied within a broad scope rather than focusing on discrete or particular moderators (e.g. school location, school level, teacher experience) that could potentially influence the proposed relationships. For this reason, caution is warranted in generalising the results of the current study. Researchers attempting to replicate or expand on the current findings are advised to consider moderating variables such as personal characteristics or school demographic/environmental factors that potentially influence teacher perceptions and efficacy in handling student misbehaviour, emotional exhaustion and turnover intentions (Betoret, 2006; Blasé, 1982; Goddard & Goddard, 2006; Kulinna, Cothran, & Regualos, 2006).

In conclusion, future studies that address teachers’ self-efficacy regarding classroom conduct may be a valuable approach for enhancing teachers’ emotional experiences and overall retention. Although the mediating findings of emotion regulation were not supported, this study is the first attempt to understand the intervening processes inherent to the emotional experience of disciplining students. Researchers are now able to narrow the focus of future studies and find other emotion regulation or self-efficacy strategies to effectively handle student misbehaviour.

References


