Predictors of Burnout among Community Therapists in the Sustainment Phase of a System-Driven Implementation of Multiple Evidence-Based Practices in Children's Mental Health

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Abstract

Burnout among community mental health (CMH) therapists has been associated with poorer therapist health, high agency turnover, poorer client outcomes, and compromised quality of care. Recent mandates to learn and implement multiple evidence-based practices (EBPs) within CMH settings are intended to improve the quality of community care, yet there is mixed evidence concerning the impacts on workforce burnout. The current study sought to identify correlates of therapist emotional exhaustion, a key aspect of burnout, during the sustainment phase of a system-driven implementation of multiple EBPs in children's mental health services. We hypothesized that high workload and unfavorable organizational climate would relate to therapist emotional exhaustion, but that positive experiences with EBPs adopted would relate to lower exhaustion. Although agency-level indices of organizational climate were unrelated to exhaustion, a multilevel model revealed that therapists' weekly work hours, caseload, and number of EBPs delivered were associated with increased emotional exhaustion. Additionally, activities associated with the EBP implementation efforts (e.g., hours spent in EBP-related activities, supervision or consultation, or outcome monitoring), were not associated with emotional exhaustion. Therapists' knowledge and confidence delivering EBPs and their positive perceptions of EBPs were protective against emotional exhaustion, but these perceptions did not buffer the risks associated with heavy workload. Findings point to implementation strategies to prevent burnout and associated turnover that compromise the returns on investments in EBP implementation.

Keywords

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Burnout, characterized by emotional exhaustion, depersonalization, and decreased sense of self-efficacy in response to job-related stressors (Maslach et al., 1998), has been widely documented among mental health professionals (Ackerley et al., 1988; Lim et al., 2010). While burnout occurs across professions, research suggests that mental health therapists are at increased risk for experiencing burnout (Awa et al., 2010), with up to 67% of therapists reporting high levels (Morse et al., 2012). Burnout has been associated with a host of negative outcomes for therapists themselves, their clients, and the mental health agencies in which they work. For instance, therapist burnout has been associated with stress-related physical symptoms (Maslach et al., 2001), increased risk of substance use and internalizing disorders (Morse et al., 2012), poor work engagement, and low job satisfaction (Green et al., 2014). Therapist reported burnout also predicts poorer client treatment outcomes and drop out (Garman et al., 2002; McCarthy & Frieze, 1999).

Burnout is pronounced within community mental health (CMH) settings where therapists often carry large caseloads characterized by poverty, and clinical severity, complexity and comorbidity (Aarons, Wells, Zagursky, Fettes, & Palinkas, 2009; Southam-Gerow et al., 2008), client factors that are associated with therapist burnout (Morse et al., 2012). Additionally, work flows in CMH settings can also be characterized by long work hours and trends toward field-based treatment delivery, which may require considerable travel time to client homes and community locations (Christensen, 1995; Lindblad-Goldberg et al., 1998). Each of these factors may contribute to therapist burnout and compromised quality of care.

In recent years, there has been a push toward implementing evidence-based practices (EBPs) within CMH settings to improve the quality of community care. A majority of state mental health systems have promoted the use of EBPs, with an increasing number mandating their use (Cooper & Aratani, 2009). However, there has been limited study of the impact of large-scale EBP implementation initiatives on workforce well-being. To the extent that training therapists in EBPs improves their perceived self-efficacy (Barnett et al., 2017) and observable client outcomes (Novins, Green, Legha, & Aarons, 2013; Brookman-Frazee, Drahota, & Stadnick, 2012), EBP implementation may result in increased job satisfaction and decreased burnout. Some qualitative and mixed methods studies indicate that therapist have positive perceptions of their training in EBPs, particularly when practices are structured and when ongoing consultation is provided (e.g., Barnett et al., 2017; Nelson, Steele, & Mize, 2006).

On the other hand, adding the required activities associated with EBP training, delivery and fidelity monitoring may be onerous for already taxed therapists (Beidas et al., 2015). This outcome may be more likely when EBPs were not developed or tested for use in the types of CMH settings where community therapists operate (Hoagwood, Burns, Kiser, Ringeisen, & Schoenwald, 2001). Implementing EBPs within CMHs may pose challenges not typically encountered in research settings, including serving the needs of more disadvantaged, ethnically diverse and clinically complex client populations underrepresented in clinical trials (Guan et al., 2016; Weisz et al., 2015; Baker-Ericzén, Hurlburt, Brookman-Frazee, Jenkins, & Hough, 2010; Weisz et al., 2006; Southam-Gerow, Weisz, & Kendall, 2003). Indeed, complex clinical presentations in usual care, and time demands of training, supervision, and consultation are commonly cited barriers to EBP implementation among

CMH therapists (Nelson et al., 2006). For instance, community therapists, many of whom have not been trained in EBPs, may find requirements for ongoing consultation burdensome (Christian et al. 2014; Lyon et al. 2013).

Few studies have examined burnout among CMH therapists while considering the landscape of requirements for EBP implementation. Among these studies, findings are mixed on the impact of EBP implementation on burnout. Two studies of system-sponsored EBP initiatives in urban public mental health settings have reported that therapists in EBP-delivering organizations reported lower levels of workplace engagement and higher levels of stress than therapists in organizations not using EBPs (Wolf, Dulman, & Maguin, 2012; Skriner et al., 2017). In contrast, Aarons and colleagues (2009) found that statewide implementation of an EBP for parents of children at risk of maltreatment predicted lower levels of social worker emotional exhaustion, a key component of burnout, and that in fact, EBP implementation buffered the impact of high caseload on emotional exhaustion. Finally, a study of therapists involved in an EBP rollout in CMH settings found that burnout predicted turnover; however, the turnover rate was lower than that observed in usual care settings not involved in EBP implementation (Beidas et al., 2016).

It is plausible that these differences may be explained by different therapist perceptions of the EBP implementation experience. In the context of system-driven implementations of multiple EBPs in mental health services, therapists' negative perceptions of EBPs were found to be associated with burnout (Barnett et al., 2017). Likewise, community therapists who express positive attitudes toward adopted EBPs were more likely to stay at their agency than therapists with less positive attitudes toward EBPs (Beidas et al., 2016). Furthermore, consistent with the results of Aarons and colleagues (2009), it is plausible that positive experience with EBP implementation may buffer against the strains of job demands in CMH settings. Past research clearly identifies high workload (e.g., caseload, hours of work, field work) as a correlate of therapist burnout (Aarons, Fettes, Flores, & Sommerfeld, 2009; Edwards et al., 2000; Harper & Minghella, 1997). However, it is unclear whether positive experiences with EBP implementation may moderate the relationship between workload and therapist burnout. For instance, it stands to reason that training in EBP models that ultimately reduces treatment-planning demands or makes treatment more efficient and effective may help community therapists manage high caseloads.

Furthermore, therapists' perceptions of their own skills may have particularly important impacts on burnout within the context of mandates to learn and deliver new EBPs. For instance, EBP mandates may leave therapists feeling that their previous experiences and skills are not valued, thus they may perceive limited autonomy and influence in shaping decision making which may collectively contribute to burnout (Beidas et al., 2016). However, it may also be possible that system reforms involving EBP training may yield new opportunities for professional development and clear performance feedback and incentives that build a therapists' sense of growth and agency and protect against job dissatisfaction (Aarons et al., 2009).

In such times, perceptions of organizational support may be particularly crucial (Aarons & Palinkas, 2007). Unsurprisingly, limited performance feedback and perceived lack of

workplace autonomy are associated with higher levels of burnout (Morse et al., 2012). However, past studies have often referred to organizational context broadly, without attending to discrete perceptions that proximally shape therapist satisfaction on the job, such as involvement in decision making, autonomy, and receipt of performance feedback (e.g., Aarons & Sawitzky, 2006). These particular factors may be especially relevant in the context of mandated requirements to learn and deliver EBPs in place of previously used therapy practices.

Despite the evidence linking therapist burnout to poorer therapist well-being, turnover and poorer quality of care, there have been few studies of organizational and therapist factors that predict burnout within the context of system-driven multiple EBP implementation efforts. The Los Angeles County Department of Mental Health (LACDMH) Prevention and Early Intervention (PEI) Transformation, a system-driven, fiscally mandated implementation of multiple EBPs, provided a unique naturalistic opportunity for us to examine predictors of therapist burnout. The present study focused on emotional exhaustion, because it has been identified as a primary driver of burnout (Rosenberg & Pace, 2006; Bakker, Schaufeli, Sixma, & Bosveld, 2001; Truchot, Keirsebilck, & Meyer, 2000). Furthermore, changes in emotional exhaustion have been linked to EBP training in past investigations (Aarons et al., 2009). First, we examined the associations between emotional exhaustion and therapist background characteristics, workload factors, perceptions of organizational context, and attitudes toward EBPs during the sustainment phase of the PEI Transformation, approximately five years after initial implementation. Examining burnout in the sustainment phase allows us some temporal distance from the major upheavals associated with a system-wide transformation (Regan et al., 2017), isolating the ongoing demands of required EBP delivery in CMH settings. Consistent with past research, we hypothesized that therapist burnout would be associated with higher workload and less supportive organizational climate. Second, we hypothesized that therapists' positive perceptions of the EBPs they deliver would predict lower emotional exhaustion. Third, we hypothesized that within the context of mandated EBP delivery, positive perceptions of adopted EBPs might moderate the negative effects of workload characteristics on therapist emotional exhaustion.

Method

Participants

Participants for the current study were drawn from the larger "4KEEPS" study in which CMH agencies were contacted to participate in research examining the sustainment of EBPs within the Los Angeles County PEI initiative (Lau & Brookman-Frazee, 2016). Therapist participants were recruited through a direct email campaign for the 4KEEPS study in which agency management and administration provided contact information for eligible therapists at agencies directly operated or contracted through the Los Angeles County Department of Mental Health. Eligibility included therapists who reported being trained in one of the six practices being followed for the 4KEEPS study (i.e., Seeking Safety [SS], Child Parent Psychotherapy [CPP], Cognitive Behavioral Intervention for Trauma in Schools [CBITS], Managing and Adapting Practice [MAP], Trauma-Focused-Cognitive Behavioral Therapy

[TF-CBT], Positive Parenting Program [Triple P]). Of the 98 eligible agencies, 69 agencies (70.4%) were recruited into the study.

Direct email invitations were sent with personalized survey links to 1,656 therapists at community mental health centers of which 688 therapists completed the survey, indicating a response rate of 41.5% for the direct email campaign. Management in an additional six agencies elected not to release staff contact information, but instead agreed to forward an email to therapists that would allow them to provide their contact information to the research team to opt-in to the survey; 89 community therapists participated in the survey through this opt-in process. Between March and July 2015, a total of 777 therapists completed the survey in which they reported on their background, training, and experiences implementing the PEI practices. Of the 777 therapists, 23 therapists indicated that they were not currently delivering one of the six practices in our study and were therefore excluded from analyses. An additional 21 therapists were excluded from analyses given extreme values on variables of interest (i.e., greater than three standard deviations above the mean on caseload, hours worked weekly, and travel time for client contact). Thus, the sample for the current analyses included 733 therapists drawn from 65 agencies who completed the 4KEEPS survey. See Lau & Brookman-Frazee, 2016 and Barnett et al., 2017 for further details on study context and recruitment procedures.

Measures

Therapist characteristics—Therapists completed the Therapist Background Questionnaire (Brookman-Frazee et al., 2012) reporting on their demographic and professional characteristics. Demographic variables included age, gender, and race/ethnicity. Professional background variables included licensure status, highest degree obtained (i.e., Associate, Bachelor's, Master's, Doctorate), therapist-reported theoretical orientation, and years of clinical practice at their current agency. In order to capture if particular theoretical orientations were more or less associated with burnout, we created a binary variable to categorize therapists who reported a behavioral or cognitive behavioral orientation (the largest theoretical orientation group) versus another orientation.

Therapist workload—Workload variables included therapist report of their caseload (i.e., number of clients the therapist is providing services to) and the total number of hours of worked per week. Of these hours, therapists reported the average number of hours they spent weekly on EBP-related activities (e.g., reviewing EBP materials, preparing certification materials), outcome monitoring, supervision and consultation, and hours of travel time for client contact. Therapists were also asked to report how many of the six practices of interest they were currently delivering to clients.

Organizational Climate—Three subscales of the Organizational Climate Measure (OCM; Patterson et al., 2005) were administered to therapists reporting on their perception of organizational climate. On a 4-point Likert-type scale (1= *Definitely false* to 4 = *Definitely true*), therapists responded to six items tapping into their sense of *Involvement* in agency decision making (e.g., Management involves people when decisions are made that affect them), five items tapping into their sense of *Autonomy* within the agency (e.g., Management

let people make their own decision much of the time), and five items tapping into *Performance Feedback* (e.g., People usually receive feedback on the quality of work they have done). Each subscale showed good reliability within our sample ($a_{\text{involvement}} = .85$, $a_{\text{autonomy}} = .72$, $a_{\text{performance feedback}} = .80$). Consistent with existing studies of organizational climate, therapists' reports on the OCM items were averaged and included in the multilevel model at the agency level in order to capture each agency's organizational climate (e.g., Aarons & Sawitzky, 2006; Stadnick et al., 2017).

Perceived characteristics of practices—The *PCIS* (Cook et al., 2015) measures perceived characteristics of practice innovation that may influence therapists' own attitudes toward and delivery of practices. Therapists rated their agreement with each of eight statements assessing therapists' sense of *Relative Advantage* (e.g., "[The practice] is more effective than other therapies I have used."), *Compatibility* (e.g., "[The practice] is aligned with my clinical judgment."), *Complexity* (e.g., "[The practice] is easy to use."), and *Potential for Reinvention* (e.g., "[The practice] can be adapted to meet the needs of my patients.") on a 5-point Likert-type scale (1 = *Not at all* to 5 = *A very great extent*). The therapists' responses to the eight items were averaged for each practice they reported delivering. For therapists who delivered more than one practice, we calculated the mean of separate PCIS scores (one per practice delivered). The measure showed good reliability for each practice ($a_{\text{CBITS}} = .96$, $a_{\text{CPP}} = .94$, $a_{\text{MAP}} = .92$, $a_{\text{SS}} = .93$, $a_{\text{TF-CBT}} = .93$, $a_{\text{Triple-P}} = .94$) and a mean reliability of $a_{\text{mean}} = .94$.

Perceived self-efficacy with EBPs

<u>**Knowledge and Confidence:**</u> (Lau & Brookman-Frazee, 2016) was assessed via the 2-item scale developed for the 4KEEPS study and taps into therapists' sense of self-efficacy with regards to each specific practice that the therapist reported utilizing. For each practice that the therapist reported utilizing, they answered the items: 1) "I am well prepared to deliver [practice] even with challenging clients" and 2) "I am confident in my ability to implement [practice]." Therapists rated the extent of their agreement for each item on a 5-point Likert-type scale (1 = *Not at all* to 5 = *A very great extent*). We calculated the mean of the two items for each EBP that the therapist reported utilizing (i.e., therapist reported separate knowledge and confidence indices for each practice they used). In instances where therapists reported using more than one practice, the mean of the practices utilized was calculated to represent therapists' overall sense of efficacy with the practices they reported utilizing. The measure showed good reliability for each practice ($a_{\text{CBITS}} = .94$, $a_{\text{CPP}} = .92$, $a_{\text{MAP}} = .84$, $a_{\text{SS}} = .86$, $a_{\text{TF-CBT}} = .87$, $a_{\text{Triple-P}} = .90$) and a mean reliability of $a_{\text{mean}} = .89$ across the six practices.

Emotional Exhaustion—The 5-item Emotional Exhaustion subscale of the Organizational Social Context Questionnaire (Glisson et al., 2008) was used to capture the fatigue and stress dimension of burnout. Each therapist reported their level of agreement on a 7-point Likert-type scale (0 = *Strongly disagree* to 6 = *Strongly agree*) to statements about their sense of emotional exhaustion from their clinical work (e.g., "I feel burned out from my work."). The measure showed good reliability ($a = .89$) in our sample.

Data Analysis

All analyses were conducted in Stata 14.2 (StataCorp, 2017). Given the multi-level structure of the data (i.e., therapists within agencies), all analyses were completed using the Mixed command in Stata with maximum likelihood estimation.

A null model was conducted to assess the variance attributed to between agency variation, specifically with regards to the organizational climate variables. Null models predicting organizational climate illustrated that 11–21% of the variation was attributed to agency differences ($ICC_{involvement} = .21$, $ICC_{autonomy} = .11$, $ICC_{performance\ feedback} = .13$). As such, we accounted for clustering of therapists and related non-independent errors by utilizing a multilevel structure (i.e., therapists nested within agencies). Additionally, individual therapists' perceptions of organizational climate were aggregated to the agency level and included as agency-level predictors of emotional exhaustion (i.e., mean OCM involvement, autonomy, and performance feedback for each agency). Aggregating OCM scales to the agency level is the recommended approach to capture each agency's organizational climate (e.g., Aarons & Sawitzky, 2006; Stadnick et al., 2017). All continuous therapist-level predictor variables were grand mean centered; organizational climate variables included at the agency-level were centered around the grand mean of agencies. Therapist gender, race, and licensure status were included as covariates. Therapists' total number weekly hours of work and number of practices delivered were included as random effects to allow for variability across therapists. We then tested for moderation via EBP attitudes by creating interaction terms between attitudes and workload variables.

Results

Information on therapist demographics is presented in Table 1 and descriptives of study variables of interested are presented in Table 2. Results from the mixed model predicting emotional exhaustion are presented in Table 3. No therapist background and demographic characteristics were significantly associated with emotional exhaustion.

Associations between workload, organizational climate, EBP attitudes, and emotional exhaustion

In terms of the workload variables, the number of practices that therapists reported delivering ($b = .16$, $p < .05$), caseload ($b = .02$, $p < .05$), weekly hours of total work ($b = .03$, $p < .001$), were significantly associated with increased emotional exhaustion. Weekly hours of supervision/consultation ($b = .06$, $p = .06$), EBP-related activities ($b = -.03$, $p = .33$), outcome monitoring ($b = -.03$, $p = .37$), and travel time for client contact ($b = .04$, $p = .09$) were not significantly related to emotional exhaustion.

Organizational climate via each agency's average report of therapists' sense of autonomy ($b = -.24$, $p = .42$), involvement in decision-making ($b = -.09$, $p = .61$), and work performance feedback ($b = -.14$, $p = .84$) was not significantly associated with emotional exhaustion.

Greater self-efficacy with the practices as indicated by therapists' ratings of knowledge and confidence ($b = -.19$, $p < .05$) and their more positive perceptions towards practices on the PCIS ($b = -.05$, $p < .01$) were associated with lower emotional exhaustion.

EBP attitudes as potential moderator

We investigated whether positive perceptions of EBPs buffered the impact of workload variables on emotional exhaustion and found that neither PCIS nor reported knowledge and confidence moderated the role of the number of PEI practices used ($b_{PCIS} = -.002$, $p = .81$; $b_{KC} = .03$, $p = .70$), hours worked weekly ($b_{PCIS} < -.001$, $p > .99$; $b_{KC} = -.01$, $p = .21$), or caseload ($b_{PCIS} = .003$, $p = .80$; $b_{KC} = -.002$, $p = .84$) on therapists' self-reported emotional exhaustion.

Discussion

We examined the correlates of therapist emotional exhaustion, a key component of therapist burnout, in the context of their experiences within a system-driven implementation of multiple EBPs in public children's mental health services. Regarding organizational context, working in an agency characterized by therapists' perceptions of meaningful involvement in decision-making, job autonomy, and receipt of routine performance feedback *did not* protect against therapist emotional exhaustion. However, other therapist variables associated with workplace demands *were* predictive of emotional exhaustion. In line with past research, results suggest that therapist workload, as assessed by their total weekly hours of work, was related to increased emotional exhaustion (Aarons, Fettes, Flores, & Sommerfeld, 2009; Edwards et al., 2000; Harper & Minghella, 1997). With regard to their experiences with mandated EBP implementation, exhaustion was also associated with the number of EBPs in which the therapist had been trained. However, hours spent in EBP-related activities, supervision or consultation, or outcome monitoring, activities associated with the EBP implementation efforts, were not associated with emotional exhaustion. It is possible that these findings were non-significant because therapists may have a finite amount of time they can dedicate to these activities due to their requirements for direct service with clients (Southam-Gerow, Rodríguez, Chorpita, & Daleiden, 2012). Therefore increasing the number of EBPs may increase the demand on the therapists, without necessarily increasing the time they are able to dedicate to learning and implementing the models. In fact, agency leaders have recommended that therapists be trained in two to three EBPs to maximize the range of clients they are able to see, while allowing them to have adequate time and attention to gain competency in the models (Regan et al., 2017).

Therapists' sense of competency and knowledge of the EBPs they are delivering and their positive perceptions of the characteristics of the EBPs they deliver were also associated with lower reported emotional exhaustion. These findings indicate that system-driven implementation of multiple EBPs within public sector services does not inevitably lead to burnout or dissatisfaction in the years after initial adoption. Indeed, scaling up EBPs in CMH settings may improve workforce outcomes to the extent that therapists experience a sense of mastery and self-efficacy with interventions that are perceived as effective, adaptable and advantageous over other practices. An important component of EBP attitudes

may be the fit of the practice with the client's needs, as the added therapist burden of applying EBPs within ill- fitting contexts may be one driver of the association between EBP attitudes and burnout. For these reasons, researchers have developed and disseminated modular and transdiagnostic interventions, which help manage client co-morbidities and challenges that arise in treatment (Marchette & Weisz, 2017; Weisz et al., 2012). In fact, modular treatment design has been associated with improved attitudes and satisfaction with implementation (Borntrager et al., 2015; Chorpita et al., 2015).

In the context of EBP initiatives, positive attitudes toward EBPs may potentially mitigate burnout. However, our data did not support the prediction that positive experiences with mandated EBP delivery could offset or buffer the impact of high therapist workload variables such as large caseloads and long work hours. This was true for both therapists' sense of mastery and agency in delivering a given EBP as well as with their sense of the advantages and acceptability of EBPs as measured by the PCIS. Thus, regardless of if a therapist viewed EBPs as helpful versus obstructive or themselves as EBP-skilled versus bungling, clinical caseload and hours of work operated in the same way—the more strenuous the therapist's workload, the greater their experience of burnout.

Although past studies have identified increased years of experience as predictive of therapist burnout (e.g., Prosser et al., 1999; Farber, 1990), we found that years of experience within the agency and therapist licensure status were not associated with emotional exhaustion when therapist workload, perceived organizational climate, and perceptions of EBPs were accounted for. Therapists' reports of time spent at work and the number of EBPs they were delivering to current clients were associated with emotional exhaustion. This suggests that the number of EBPs therapists must learn and implement may prove strenuous in the context of already demanding public sector service delivery often marked by long work hours. It is also plausible that aside from the potential demands of mastering and delivering multiple EBPs, the nature of switching between delivering different EBPs within a given day or week may prove onerous. Delivering additional EBPs may require increased attention for therapists to ensure that the requirements of each unique EBP is met within delivery. Consistent with past examinations (e.g., Aarons 2009), we also found that therapists' caseload was strongly associated with burnout, even when accounting for hours of work and multiple EBP demands, indicating that the sheer number of clients therapists carry on their caseload uniquely contributes to emotional exhaustion over and beyond the contributions of caseload on EBP-related work demands.

Despite previous research establishing the importance of organizational climate on emotional exhaustion amongst therapists (Morse et al., 2012; Corrigan et al., 2002), we found that average levels of therapists' sense of involvement in decision making within the agency and autonomy and performance feedback were not significantly associated with decreased exhaustion. It should be noted that the present study utilized therapist reports aggregated to the agency-level to index organizational climate. This is consistent with previous studies that have aggregated to the agency-level, as using the aggregated rating allowed us to have a better understanding of an agency's organizational climate as a whole as opposed to an individual's perceptions (Aarons & Sawitzky, 2006; Stadnick et al., 2017). Indeed, this decision was supported by analyses demonstrating significant variation in

organizational climate between agencies. However, it is possible that utilizing a therapist's individual ratings of organizational climate might be associated with their reports of burnout, given that individual perceptions are more proximal predictors (e.g., Green et al., 2015; Glisson et al., 2006). This could suggest that there is marked variability within a single agency such that the average perceptions of organizational climate may not be associated with burnout, but that therapists' individual differences in their experience of their agency's climate may predict their own experience of burnout.

Unsurprisingly, therapists' positive attitudes regarding EBPs and their own self-efficacy with delivering EBPs appeared protective against emotional exhaustion on the job. Within community implementation initiatives, it is crucial that training, consultation and supervision function to cultivate therapists' openness to learning about the advantages, compatibility and utility of EBPs. Training in EBPs should help therapists perceive alignment with their past training, theoretical orientation, and/or clinical wisdom, as perceived fit along these dimensions has been linked to EBP adoption, fidelity and sustainment outcomes (Aarons, Wells, Zagursky, Fettes, & Palinkas, 2009; Jensen-Doss et al., 2009; Reding et al., 2014; Nelson & Steele, 2007). In addition to individual intervention programs such as those teaching coping skills to therapists suffering emotional exhaustion (e.g., Salyers et al., 2011), interventions specifically targeting attitudes through additional training has been shown to effectively reduce burnout among therapists (Corrigan et al., 1997) as well as other health professionals (Ewers et al., 2002). Especially within the context of rapid EBP implementation and adoption within agencies, a program assessment to provide targeted training may be one clear avenue to intervening on therapists' attitudes and in turn ameliorate burnout (Corrigan et al., 1997).

Further, ongoing consultation is likely a necessary component of implementation for these positive outcomes, as it has been associated with improved attitudes towards EBPs and increased competence (Barnett et al., 2017; Edmunds et al., 2014; Herschell, Kolko, Baumann, & Davis, 2010). Though supervision time was not significantly associated with burnout in our sample, it is certainly plausible that EBP-specific supervision may mediate therapists' sense of efficacy and mastery with the EBP, which was associated with decreased burnout in our sample. On the other hand, time spent in broad supervision not providing precise support for challenges in EBP delivery may not ameliorate therapist workload burden and subsequent burnout.

Our results also suggest that responsive EBP training practices may also protect against job burnout. The significant main effects of EBP attitudes lead to potential points of intervention for decreasing therapist emotional exhaustion that may ultimately prevent costly therapist turnover. For one, ongoing fidelity monitoring coupled with good values-innovation fit have been shown to protect against service provider turnover within EBP implementation, pointing to how fidelity monitoring that provides EBP support and guidance may impact perceptions of fit, therapist buy-in, and ultimately therapist attitudes and retention (Aarons, Sommerfeld, Hecht, Silovsky, & Chaffin, 2009). Despite this, therapists' attitudes and own sense of self-efficacy in EBP delivery did not moderate the relationship between therapist workload and emotional exhaustion in the current study. Instead, the generally strong main effects of workload factors on emotional exhaustion appeared robust across therapists with

different levels of buy-in to the EBP models of interest. As such, organizations are wise to avoid changes that would increase productivity expectations when evidence-based, brief, structured interventions are introduced.

It is important to recognize the role of professional psychologists, who not only provide EBPs, but frequently serve in the roles of managing, directing, and supervising dissemination and implementation efforts, in helping buffer against therapist's experiences with emotional exhaustion (Southam-Gerow et al., 2012). Based on findings from this study, professional psychologists in these roles may want to be especially attentive to the role that EBP attitudes, competence, and knowledge could have on the emotional exhaustion of therapists whom they oversee. Within a context where multiple EBPs are implemented, emotional exhaustion might be reduced by matching therapists to be trained in EBPs that fit with their interests, to promote positive attitudes towards the practices being delivered (Regan et al., 2017). Furthermore, professional psychologists involved in EBP implementation should include active learning (e.g., role plays and video review) into training and consultation, which have been identified as critical to promote competent delivery of EBPs (Bearman et al., 2013; Beidas & Kendall, 2010).

Of course, findings must be considered in light of study limitations. Due to the cross-sectional nature of the study, we are currently unable to establish temporal precedence and therefore are not able to establish the causal direction in the associations between emotional exhaustion and our variables of interest. It is certainly plausible that the relationship is bidirectional with therapist emotional exhaustion also influencing therapists' perceptions of their workload, their sense of agency and involvement within their organization, and their assessments of the advantages and utility of EBPs. The study relied on therapists' self-reported perceptions of exhaustion as well as their work hours and caseload, yielding shared method variance. Future studies should investigate determinants of therapist emotional exhaustion prospectively and with multiple data sources on work conditions. Identifying variables that may contribute to increases in emotional exhaustion as well as characteristics that may prove to lessen therapist emotional exhaustion will be crucial for workforce interventions, particularly in the context of EBP implementation or system reform. Further, as this study only focused on emotional exhaustion, it would be valuable to investigate how other components of burnout, such as cynicism and lack of efficacy, are impacted by EBP implementation.

Notwithstanding these limitations, this study provides the first examination of predictors of CMH therapist emotional exhaustion, a primary driver of burnout, within the landscape of system-mandated implementation of multiple EBPs in children's mental health services. Findings revealed that emotional exhaustion was negatively associated with therapists' sense of agency and integration within the organization and sense of self-efficacy with and perceived fit of adopted EBPs. These findings point to potential targets of intervention for preventing therapist burnout within system driven reforms toward EBP implementation. Study findings may have implications for improving quality of care for clients, therapists' own well-being, and agency workforce vitality.

Biographies

Joanna Kim received her M.A. in Psychology at the University of California, Los Angeles where she is currently a doctoral candidate in the Clinical Psychology Program. She is interested in identifying factors that contribute to and counteract disparities in mental health care access, utilization, and delivery for ethnic minority and immigrant youth. She is also interested in family processes that may influence child risk and resilience across diverse cultural contexts.

Resham Gellatly, M.A., is a doctoral student in the Clinical Psychology Program at the University of California, Los Angeles. Resham's research focuses on increasing access to mental health services for underserved youth and families through the dissemination and implementation of evidence-based practices. She is especially interested in working with community stakeholders to understand how adaptations can address issues of cultural fit for ethnically diverse populations.

Nicole Stadnick received her Ph.D. in clinical psychology from San Diego State University/ University of California, San Diego Joint Doctoral Program in Clinical Psychology and her MPH from San Diego State University. She is currently an Assistant Professor in the Department of Psychiatry at the University of California, San Diego and a research investigator at the Child and Adolescent Services Research Center. Her areas of professional interest include implementation science, pediatric integrated care, evidence-based practice, and caregiver-mediated interventions for children with autism spectrum disorder.

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Public Significance Statement

This study suggests that among community therapists delivering evidence-based practices (EBPs) within a system driven EBP implementation context, weekly work hours, caseload, and number of EBPs delivered were associated with increased burnout. However, agency-level indices of organizational climate and activities associated with the EBP implementation efforts (e.g., hours spent in EBP-related activities, supervision or consultation, or outcome monitoring), were not associated with emotional exhaustion. Therapists' knowledge and confidence delivering EBPs and their positive perceptions of EBPs were protective against emotional exhaustion, pointing to implementation strategies to prevent burnout and associated staff turnover.

Table 1

Descriptives of therapist background and demographics (*N*=733)

	M	SD	Range
Age (in years)	36.93	9.16	18–73
Years practicing therapy	6.89	6.15	0–45
Years at current agency	4.36	4.47	0–39
Client race as percent of caseload			
Non-Hispanic White	9.94	16.07	0–100
Hispanic	71.03	29.60	0–100
Black, African American	13.74	20.54	0–100
Asian American, Pacific Islander	1.92	7.69	0–100
American Indian or Alaska Native	0.58	6.05	0–100

	N	%
Therapist gender		
Female	650	88.68
Male	83	11.32
Therapist race		
Non-Hispanic White	256	34.92
Hispanic	317	43.25
Black, African American	49	6.68
Asian American, Pacific Islander	85	11.60
Staff type		
Staff	659	89.90
Trainee	50	6.82
Independent contractor	24	3.27
Primary theoretical orientation		
Behavioral	33	4.50
Cognitive behavioral	384	52.39
Humanistic	39	5.32
Family systems	115	15.69
Psychodynamic	62	8.46
Eclectic	88	12.01
Other (e.g., DBT, attachment)	12	1.64
Language status		
Monolingual	319	43.82
Able to deliver services in more than one language	409	55.80
Licensure status		
Licensed	335	45.83
Not licensed	396	54.17
Highest level of education		
Bachelor's degree	14	1.91

	M	*SD*	**Range**
Master's degree[a]	631	86.08	
Doctoral degree[b]	88	12.01	

Note.

[a]Of those with a Master's degree, the majority reported Marriage and Family Therapy as their primary discipline (63.43%, n=411), followed by social work (33.80%, n=219), psychology (2.47%, n=16), and other (.31%, n=2).

[b]Of those with a doctoral degree, the vast majority reported psychology as their primary discipline (87.64%, n=78), followed by Marriage and Family Therapy (10.11%, n=9), social work (1.12%, n=1) and other (1.12%, n=1).

Table 2

Descriptives of study variables

	M	*SD*	**Range**
Therapist level (N=733)			
Burnout	3.25	1.53	0–6
Workload			
Caseload	14.02	8.57	0–44
Number of practices delivered	2.39	1.02	1–5
Weekly hours of EBP-related activities	1.67	2.17	0–22
Weekly hours of outcomes monitoring	1.57	1.98	0–19
Weekly hours of travel time for client contact	2.47	2.89	0–12
Weekly hours receiving supervision/consultation	2.46	1.84	0–12
Weekly total hours of work	41.18	8.13	0–65
EBP attitudes			
Knowledge and confidence	3.59	.79	1–5
PCIS Mean	27.44	5.56	9–40
Agency level (N=65)			
Organizational climate			
Involvement	2.61	.32	1–3.50
Autonomy	2.43	.23	1–3.30
Performance feedback	2.92	.28	2.12–3.56

Note. PCIS=Perceived Characteristics of Innovation Scale.

Table 3

Model of variables predicting therapist burnout

	B	SE	z-ratio
Intercept	3.28	.15	23.17 ***
Therapist level			
Demographic and background characteristics			
Therapist gender (Female)			
Male	−.23	.17	−1.33
Therapist race (Non-Hispanic White)			
Hispanic	.02	.16	.11
Other	.05	.16	.32
Licensure status (Not licensed)			
Licensed	−.03	.14	−.21
Language status (Monolingual)			
Able to provide treatment in non-English language	−.17	.15	−1.17
Years at current agency	.01	.02	.11
Theoretical Orientation (Not cognitive or behavioral)			
Cognitive behavioral or behavioral	−.05	.11	−.42
Workload			
Caseload	.02	.01	2.23 *
Number of practices delivered	.16	.06	2.74 **
Weekly hours of EBP-related activities	−.03	.03	−.97
Weekly hours of outcomes monitoring	−.03	.03	−.90
Weekly hours of travel time for client contact	.04	.02	1.68 †
Weekly hours receiving supervision/consultation	.06	.03	1.85 †
Weekly hours of total work	.03	.01	3.25 **
Therapist attitudes			
Knowledge and confidence	−.19	.10	−1.97 *
PCIS mean	−.05	.01	−3.33 **
Agency level			
Organizational climate			
Involvement	−.09	.31	−.28
Autonomy	−.24	.32	−.75
Performance feedback	−.14	.33	−.43

Note. Therapist level variables grand mean centered, organizational climate variables centered at the agency level. For categorical variables, reference group in parentheses.

†
p < .10

*
p < .05

**
p < .01

***
p < .001.