

Research Article

The Dynamics of Daily Life in Custodial Grandmothers

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Abstract

Objective: Guided by a life-course perspective, we examine the nature of daily life among custodial grandmothers (CGM) through documenting daily positive and negative affect, reporting daily negative and positive events, and emotional reactivity/responsiveness to daily negative and positive events. We also examine whether CGM age, adverse childhood experiences (ACEs), and social relationship quality with grandchild are associated with each indicator.

Methods: We applied multilevel models to 200 CGM ($M_{age} = 61, SD = 5.66$) who were recruited from across the United States and completed a daily survey for 14 consecutive days prior to commencing a randomized clinical trial.

Results: Older age and reporting fewer ACEs were associated with better overall and less variability in daily well-being. Positive events were reported on 83% of days and negative events were reported on 56% of days. Daily well-being was lower when a negative event was reported and higher when a positive event was reported. Reporting more ACEs was associated with greater exposure to daily negative events and stronger gains in daily well-being when a daily positive event was reported. Older age was associated with lesser declines in daily well-being on days when a negative event was reported. Discussion: In accordance with the life-course perspective, our findings illustrate how the timing of being a CGM (age) and the cumulative nature of development (ACEs) affect daily well-being and negative and positive events for CGM. Our discussion focuses on resources to consider when building resilience-focused interventions for promoting the health and well-being of CGM.

Keywords: Adverse childhood experiences, Custodial grandmothers, Daily positive and negative affect, Multilevel modeling, Social support

Midlife is a period in the life span where individuals are engaged in caregiving roles that span generations that include caregiving for aging parents, raising children and (re)launching adult children into adulthood, and grandparenting (Fingerman, 2017; Infurna et al., 2020; Lachman, 2004). Much less research has focused on grandparenting; there is a great deal of heterogeneity in the nature of grandparenting that ranges from infrequent interactions to frequent visits and/or babysitting to custodial grandparenting (Meyer & Kandic, 2017). Upsides of grandparenting include engagement in fulfilling family functions and providing an avenue for generativity to help younger generations (Hayslip & Smith, 2013). Challenges associated with grandparenting include when grandparents become custodial caregivers for their grandchildren (Bowers & Myers, 1999). This latter case can burden grandparents and their families, but is oftentimes a necessity due to the circumstances necessitating the custodial care (e.g., child abuse/neglect or substance use; Hayslip et al., 2017). Custodial grandparents, on average, are more likely to confront financial strain, lifestyle disruptions, and are demonstrated to have negative mental and physical health outcomes (Hughes et al., 2007; Musil et al., 2009).

Our objective was to examine the nature of daily well-being, defined as levels of positive and negative affect, and daily negative and positive events in custodial grandmothers (CGM). A majority of previous research on custodial grandparenting has used cross-sectional or longitudinal surveys using traditional research designs. Hayslip et al. (2017) suggested daily hassles within custodial grandfamilies could result in long-term negative mental and physical health outcomes among grandparents, yet no studies have examined the daily dynamics of CGMs to shed light on this prediction. We overcome such limitations in our study of 200 CGMs who completed a daily survey for 14 consecutive days. We examine whether age, adverse childhood experiences (ACEs), and social relationship quality with grandchildren are associated with levels and variability in daily well-being, exposure to positive and negative daily events, and emotional reactivity/responsiveness to such daily events.

Significance of Custodial Grandmothers

A life-course perspective motivates our study of examining the daily dynamics in CGMs. Several key concepts are of particular relevance for CGMs within this framework, including non-normative event transitions, linked lives, and cumulative advantage/disadvantage (see Dannefer, 2003; Ferraro, 2001). Non-normative event transitions refer to the movement into and exit from various roles and statuses, with the timing and sequencing of being of utmost importance (Pearlin, 2010). For many CGMs, assuming responsibility for the care of grandchildren is often considered an "off time" role that can affect grandparent well-being (Hayslip et al., 2017). Even CGM who expect to be heavily involved in the care of their grandchild may still experience custodial care as non-normative due to financial and emotional demands of caregiving that oftentimes co-occur with CGM who are typically more disadvantaged.

Custodial grandparents refer to grandparents raising grandchildren on a full-time basis in absence of the grandchild's birth parents (Meyer & Kandic, 2017; Smith & Dolbin-MacNab, 2013). The number of grandparents raising grandchildren has risen in the past decade (Livingston & Parker, 2010). The circumstances leading to custodial care typically involve adversity among the birth parents, such as divorce, substance use, incarceration, mental and physical illness, and child abuse/neglect (Musil & Ahmad, 2002). Given the circumstances surrounding the formation of custodial grandfamilies and the demands of caregiving, this can lead to increased risk for declines 457

in grandparent mental and physical health (Hayslip et al., 2017). A 20-year longitudinal study showed that custodial grandparents had poorer mental and physical health and more activity limitations, compared with noncaregivers (Strawbridge et al., 1997). Numerous other studies have demonstrated that custodial grandparents are at risk for elevated depressive symptoms and long-term physical health issues (Hughes et al., 2007; Musil et al., 2009), further suggesting the need to understand challenges associated with this non-normative life event.

The concept of linked lives refers to how people do not live in a social vacuum, but instead, are typically embedded in social networks composed of many types of relationships, some formal and others informal, some involving close ties and others loose (Pearlin, 2010). The conditions and actions that initiate and give form to one individual's life-course trajectories may set in motion reciprocal effects between the individual and those with whom they have social relationships. In this regard, there are also positive aspects to custodial grandparenting that have been documented (see Smith & Dolbin-MacNab, 2013). Custodial grandparenting may lead to feelings of self-gain, a second chance at parenting, and a sense of personal enrichment or character building that comes with caring for grandchildren (Smith & Lee, 2021). Grandchildren being raised by grandparents are given more life opportunities and perceive themselves as being on a better developmental trajectory, than if they remained in their birth parents' care (Dolbin-MacNab & Keiley, 2009). Caregiving for grandchildren can also lead to a sense of grandparent satisfaction because of knowledge that they are contributing to a better life for their grandchildren (Hayslip & Kaminski, 2005). The relationship between custodial grandparents and their grandchildren is an important linkage to explore because it involves positive aspects, but may also be a source of stress (e.g., parenting challenges; Hayslip et el., 2017).

An approach that has been underutilized when studying custodial grandfamilies is daily surveys. Daily survey methodology offers the opportunity to capture within-person dynamics involving fluctuations in daily well-being, the reporting of daily negative and positive events, and how daily negative and positive events shape daily well-being (Almeida, 2005). It is in these daily events, experiences, interactions, and challenges, which are both negative (stressors) and positive (uplifts), that have downstream effects on mental and physical health (Almeida, 2005; Zautra et al., 2005). Studies of this nature afford the opportunity to examine (a) whether individuals report or are "exposed" to certain daily negative or positive events, in addition to (b) how much daily well-being changes on days when an event transpires. In a community sample of middle-aged adults, Infurna et al. (2015) evaluated such daily dynamics in 191 participants who were given a 30-day daily survey. Negative events were reported on 60% of days and positive events were reported on 79% of days. On average, daily negative events were linked to lower positive affect

and higher negative affect and vice versa for daily positive events. Empirical evidence suggests that emotional reactivity to daily negative events is associated with long-term onset of mental health disorders, sleep disturbances, disease, and premature mortality (Charles et al., 2013; Hardy & Segerstrom, 2017; Mroczek et al., 2015; Ong et al., 2013; Piazza et al., 2013).

As discussed by Hayslip et al. (2017), because there is limited understanding of the mechanisms associated with CGM outcomes, daily survey methodology could help better understand the how and why of the well-documented CGM negative physical and mental health outcomes. Few studies have incorporated daily diaries to garner insights into the daily experience of custodial grandfamilies. Manns et al. (2017) conducted an exploratory study (n = 5) to uncover the daily activities and experiences of custodial grandparents during a 24-hr period. Findings revealed that CGMs engaged in a number of daily activities that included self-care practice and engagement in care-related tasks associated with their grandchildren. Important insights included how activities that were most common included taking care of the home (i.e., cleaning, fixing meals, and laundry) and activities centered around caregiving, which left CGMs with less time for their own activities. Musil and Standing (2005) used month long diaries to examine the daily stresses identified by grandmothers who had varying degrees of caregiving responsibility. Although these studies provided insights into daily life of CGMs, none incorporated quantitative measures, they contained small samples, and the reported daily activities were not directly linked to any daily well-being outcomes.

Factors/Resources That Affect Daily Dynamics in Custodial Grandmothers

Age

The timing of custodial grandparenting in either early or late midlife (e.g., 40s and 50s vs. 60s and 70s) in the life course can have a differential impact for daily outcomes. Custodial grandparenting has been called an "off time" role, and the role strain, conflict, and overload associated with this nonnormative life event are thought to contribute to grandparents' stress, possibly via greater life disruptions in one's career and having accumulated fewer financial resources to offset taking on full custody of grandchildren (Landry-Meyer & Newman, 2004; Musil et al., 2010). Empirical evidence suggests that older adults are more adept at coping with negative events and better at regulation of stressors/emotions, which could lead to preserved well-being (Carstensen et al., 2011; Charles, 2010); it is an open question as to whether this is also the case with older CGMs.

Adverse Childhood Experiences

In accordance with the life-course perspective, development can be conceptualized as a cumulative, lifelong process in that early-life adversities continue to affect daily life in midlife and into old age. We focus our attention on ACEs, which refer to emotional, physical, or sexual abuse and family conflict before age 18 and are shown to have detrimental effects on well-being, emotional support, and physical health across the life span and well into midlife and old age (Felitti, 1998; Ferraro & Shippee, 2009; Hostinar & Gunnar, 2013). In the context of CGM, recent research has shown that CGM are more likely to report elevated numbers of ACEs, compared to the general population (Smith et al., 2022). Reporting more ACEs, in addition to reporting exposure to a greater variety of ACEs, is associated with poorer CGM mental and physical health (Smith et al., 2022). For CGMs, reporting more ACEs could further exacerbate the negative impact of daily negative events because they report a greater diversity of stressors, such as financial hardships and having to take on the parenting role again (Hayslip et al., 2017). As a result, this could prime individuals to be hypersensitive to daily context and affecting their ability to regulate their desires and emotions that are essential for interpreting and experiencing their daily lives in context (Infurna et al., 2015; Luecken & Lemery, 2004). Multiple studies have found that adults who report more early-life adversity, on average, show overall lower levels of and greater variability in daily well-being and stronger emotional reactivity to daily negative events (Infurna et al., 2015; Rauschenberg et al., 2017). Furthermore, higher levels of early-life adversity are shown to be associated with stronger increases in daily well-being on days when a positive event was reported (Infurna et al., 2015).

Grandchild Social Relationship Quality

As suggested by the notion of linked lives, social support and social engagement comprised different functions and sources, with empirical evidence long establishing the protective role of social support for a wide range of adversities and negative outcomes (Antonucci, 2001). Generally speaking, stronger emotional support is associated with more positive outcomes in the context of adversity (ranging from major life events to daily negative events; see Cohen et al., 2019). In our study, we focus on relationship quality and strain between CGM and a target adolescent grandchild because of research showing its importance within this dyad (or level of analysis) and because relationship quality has been shown to be malleable to intervention (Infurna & Luthar, 2018). If relationship quality with grandchildren can be shown to be associated with pertinent CGM outcomes, such as daily well-being and positive and negative events, then it could be a focus of intervention for improving its quality. Additionally, development of relationship closeness is important during school years for evaluating one another's life and for fostering mental health and well-being over the life course (Dolbin-MacNab & Keiley, 2006; Goodman, 2012). Relationship strain between CGM and adolescent grandchildren is associated with one another's well-being (Denby et al., 2015; Sprang et al., 2014). Among CGMs, Musil et al. (2009) found that

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more strain and less subjective support was associated with higher depressive symptoms and such support moderated the effects of family life stresses on depressive symptoms. From a daily survey perspective, grandchildren are likely a common source of positive and negative events (due to their behavior problems and the general demands of parenting; Hayslip et al., 2017).

Covariates

We include covariates in our models that are pertinent for CGMs. Racial and ethnic minorities groups are overrepresented among custodial grandparents; preexisting racial disparities and systemic marginalization may contribute to negative outcomes amongst CGMs (Dolbin-MacNab & Few-Demo, 2018). Regarding income, approximately 20% of custodial grandfamilies are living in poverty (U.S. Census, 2020), which can be a significant source of stress in terms of meeting the family's basic needs as well as additional costs associated with caring for a child. Length of caregiving and number of grandchildren being cared for by the CGM may also play an important role when considering outcomes of custodial grandparenting. Balancing the demands of caring for more than one grandchild can exert a larger burden on CGM, whereas over time the family settles into a new routine and reaches a new equilibrium.

The Present Study

Guided by the life-course perspective, the overarching objective of the present study is to examine the nature and predictors of daily well-being, exposure to negative and positive daily events, and how daily well-being changes in response to negative and positive events in CGMs. To do so, we use data from a 14-day daily survey of CGMs that permits the opportunity to examine within-person change in daily well-being and how daily well-being changes as a function of daily negative and positive events. Our predictors/resources of interest are age, ACEs, and social relationship quality with a target adolescent grandchild. We hypothesize that reporting more ACEs and poorer social relationship quality will be associated with lower levels of and greater variability in daily well-being. Younger age, reporting more ACE and reporting poorer social relationship quality will be linked to stronger emotional reactivity/responsiveness to both daily negative and positive events.

Method

Participants and Procedure

Our data are drawn from pretest data from an RCT that focuses on examining the efficacy of an online social intelligence training program delivered to CGM and a target custodial adolescent grandchild (age 12–18). The overall RCT included 349 CGMs who were recruited across 44 states (see Smith et al., 2022). Inclusion criteria were that CGMs provided care to the target custodial grandchild for at least 6 months in her home (in the absence of the custodial grandchild's birth parents), were without cognitive impairments, and fluent in English. Recruitment occurred nationwide with a multipronged approach (e.g., e-mails to high school counselors and principals, social service and health providers, advocacy and support groups, written announcements and brochures, and using targeted mailing lists).

We use data from the 200 CGMs who were randomized into participating in the 14-day daily survey prior to taking part in either the intervention or attentional control component of the RCT. Only this subsample of 200 CGMs enrolled in the RCT participated in the daily diary data collection, which was done under a planned missingness research design. Participants were sent an email with the link to the online survey and instructed to complete it approximately 30 min prior to going to sleep. The participants were, on average, 61 years of age (SD = 5.66, range 46 to80), 75% were White (21% Black, 2% American Indian, and 2% Other), caring for the target adolescent grandchild for 4.49 years (SD = 1.76, range 1–7), and caring for 1.97 grandchildren (SD = 1.04, range 1–7). Participants reported their total annual household income by responding to a categorical item (M = 2.94, SD = 1.32): 1 (\$15,999 or less), 2 (\$16,000-\$25,999), 3 (\$26,000-\$50,999), 4 (\$51,000-\$75,999), and 5 (\$76,000 or more).

Measures

Adverse childhood experiences

During the baseline portion of the RCT, participants completed an ACEs questionnaire. This consisted of 14 items: 11 items from the Behavioral Risk Factor Surveillance System Adverse Childhood Experiences Module (Centers for Disease Control and Prevention, 2009; Felitti et al., 1998), along with 3 items (from the ACE-IQ) measuring exposure to neighborhood violence, peer bullying, and parental death. Items were scored dichotomously (0 = no; 1 = yes). We created an overall total ACE score by summing all items. On average, participants reported 4.17 ACEs (SD = 3.21, range 0–14).

Grandchild social relationship quality

During the baseline portion of the RCT, participants completed items pertaining to social relationship quality with the target adolescent grandchild (Walen & Lachman, 2000). The target adolescent grandchild was selected based on their willingness to participate in the overarching study. Items pertaining to social support focused on the extent to which the adolescent grandchild "makes you feel loved and cared for," "understands you," and "listens when you talk about your worries and problems." Items pertaining to relationship strain focused on the extent to which the adolescent grandchild "criticizes you" and "makes demands of you." Items were answered on a 5-point Likert scale ranging from 1 (*not at all*) to 5 (*a great deal*) and summed, with higher scores indicating greater support (M = 7.04, SD = 1.95) or more strain (M = 4.58, SD = 2.12) with their adolescent grandchild.

Daily survey: negative and positive affect

Each day, for 14 consecutive days, participants completed the positive affect and negative affect scale, which totaled 17 items (Watson, 1988). The Negative Affect scale consisted of nine items that assessed a general dimension of aversive affective states: feeling anxious, lonely, irritable, sad, distressed, nervous, upset, withdrawn, and bored. The Positive Affect scale consisted of 8 items that assessed a general dimension of uplifting or positive affective states: feeling hopeful, happy, loved, interested, accomplished, content, comfortable, and excited. Respondents indicated how often they had felt this way during the past 24 hr on a 5-point scale ranging from 1 (very slightly/not at all) to 5 (very much). Consistent with the daily diary literature (Almeida, 2005; Zautra et al., 2005), well-being is defined as levels of negative or positive affect on days when no negative or positive event was reported and emotional reactivity/responsiveness is defined as changes in negative or positive affect on days when a negative or positive event was reported.

Daily survey: negative and positive daily events

During completion of the daily survey each night, participants answered questions pertaining to daily negative and positive events (see Infurna et al., 2015; Zautra et al., 2005). The specific wording for daily negative events was, "Think of the most stressful event that occurred today, even if it may not have been too stressful. Which category was this event in?" The categories were spouse/partner, family, friends/acquaintances, work, finances, school, health, other, and no stressful event. For daily positive events, the specific wording was, "Think of the most positive event that occurred today, even if it may not have been too positive. Which category was this event in?" The categories were spouse/partner, family, friends/acquaintances, work, finances, school, health, other, and no positive event. Following previous research that emphasizes the examination of whether or not the reporting of an event impacts daily well-being, not the domain per se (see Almeida, 2005; Infurna et al., 2015; Zautra et al., 2005), we created two dichotomous variables, one for negative events and one for positive events, to indicate whether or not participants reported a negative or positive event during the course of the given day. If participants reported a negative or positive event occurring, then the negative or positive dichotomous variable was coded as a 1, with a 0 for days indicative of no negative or positive event.

Statistical Analysis

Multilevel logistic regression model

The first set of analyses focused on the extent to which age, ACEs, and social relationship quality (and the covariates)

were each associated with differences in CGMs reporting a daily negative and positive event. Our interest was in determining which factors increased or decreased one's likelihood of reporting a negative or positive event over the course of the day. We used a multilevel logistic regression model; the log odds of the probability of reporting a negative or positive event was modeled as the outcome and age, ACEs, and social relationship quality included as personlevel predictors. Models were estimated using SAS (PROC GLIMMIX; see Littell et al., 2006).

Multilevel linear regression model

In a second set of analyses, we estimated a multilevel linear regression model (e.g., Grimm et al., 2017) to examine which factors moderated CGM emotional reactivity/responsiveness to daily negative and positive events. Models were specified as follows:

$$WB_{ti} = \beta_{0i} + \beta_{1i} (\text{negative event}_{ti}) + \beta_{2i} (\text{positive event}_{ti}) + e_{ti}$$
(1)

where person *i*'s level of well-being (either negative affect or positive affect) at day *t*, WB_{*ti*}, is a function of an individual-specific intercept parameter that represents levels of negative affect or positive affect on days when no negative or positive event was reported (11% of days), β_{0i} ; an individual-specific emotional reactivity slope parameter, β_{1i} , that captures rates of change in the outcome on days when a negative event was reported; an individual-specific emotional responsiveness slope parameter, β_{2i} , that captures rates of change in the outcome on gays when a positive event was reported and residual error, e_{ii} .

Following standard multilevel modeling procedures, individual-specific intercepts and slopes (β s from the Level 1 model given in Equation 1) were modeled as the Level 2 model where between-person differences were estimated (i.e., variance parameters) and are assume to be normally distributed, correlated with each other, and uncorrelated with the residual errors, e_{ii} . The model that included age, ACE, and social relationship quality and the covariates took the form

- $\begin{aligned} \beta_{0i} &= \gamma_{00} + \gamma_{01}(\text{age}_i) + \gamma_{02}(\text{race}_i) + \gamma_{03}(\text{length of care}_i) + \\ \gamma_{04}(\text{total grandchildren}_i) + \gamma_{05}(\text{income}_i) \\ + \gamma_{06}(\text{ACEs}_i) + \gamma_{07}(\text{social support}_i) + \\ \gamma_{08}(\text{relationship strain}_i) + u_{0i} \end{aligned}$
- $\begin{aligned} \beta_{1i} &= \gamma_{11}(\text{age}_i) + \gamma_{12}(\text{race}_i) + \gamma_{13}(\text{length of care}_i) + \\ \gamma_{14}(\text{total grandchildren}_i) + \gamma_{15}(\text{income}_i) + \\ \gamma_{16}(\text{ACEs}_i) + \gamma_{17}(\text{social support}_i) + \\ \gamma_{18}(\text{relationship strain}_i) + u_{1i} \end{aligned}$

$$\beta_{2i} = \gamma_{21}(age_i) + \gamma_{22}(race_i) + \gamma_{23}(length of care_i) + \gamma_{24}(total grandchildren_i) + \gamma_{25}(income_i) + \gamma_{26}(ACEs_i) + \gamma_{27}(social support_i) + \gamma_{28}(relationship strain_i) + u_{2i}$$
(2)

All models were estimated using SAS (PROC MIXED; see Littell et al., 2006). Approximately 70% of our sample

provided all 14 of the daily survey observations. The number of observations provided was correlated with older age (r = .15, p < .05), fewer ACEs (r = -.14, p < .05), and lower mean negative affect (r = -.22, p < .05), but not with any of the other variables included in Table 1 (p's > .05). This suggests that participants who were older, reported fewer ACEs, and had lower mean negative affect were more likely to provide more observations.

Results

In a first step of the analysis, we used the data from the daily surveys to create two aggregate measures of positive and negative affect, namely a mean and *SD*. The mean score represents CGMs' overall levels of positive and negative affect and the standard deviation score represents one's fluctuations in positive and negative affect over the course of the 14 days. Table 1 shows the descriptive statistics for the variables included. The correlations from Table 1 suggest that older age was associated with reporting fewer ACEs and less variability in both positive and negative affect. Reporting more ACEs was associated with overall lower levels of positive affect and higher levels of negative affect, in addition to greater variability in both positive and negative affect.

Reporting Daily Negative and Positive Events

Table 2 shows the frequency that each of the categories for negative and positive events were reported during the course of the 14-day daily diary. On average, participants reported a negative event on 56% of days and a positive event on 83% of days. The most frequent negative events reported were in the family, other, and health domains. The most frequent positive events reported were in the family, friends/acquaintances, and spouse/partner domains.

Table 3 shows our results from our analyses examining predictors of the likelihood of reporting a negative or positive event. Reporting more ACEs were associated with an increased likelihood of reporting a negative daily event (OR = 1.17, 95% confidence interval: 1.11, 1.24). Each one unit increase in ACEs was associated with a 17% increased likelihood of reporting a daily negative event on a given day. Other predictors that were associated with an increased likelihood of reporting a negative daily event were being White, higher income, and greater relationship strain with the adolescent grandchild. Longer length of care to grandchild was associated with a decreased likelihood of reporting a positive daily event.

Emotional Reactivity and Responsiveness to Daily Negative and Positive Events

Table 4 shows results from our multilevel linear regression model that examined predictors of emotional reactivity/ responsiveness to daily negative and positive events. On average, within-person daily negative events resulted in increases in negative affect (estimate = 0.47, d = 1.27) and decreases in positive affect (estimate = -0.34, d = 0.53). Presence of a positive event, on average, was associated with decreases in negative affect (estimate = -0.20, d = 0.54) and increases in positive affect (estimate = 0.55, d = 0.86). The effect sizes were calculated by dividing the parameter estimate over the square root of the intercept variance (i.e., standard deviation); daily negative and positive events had a medium to large effect on each outcome (see Grimm et al., 2017). Reporting more ACEs was associated with reporting lower levels of positive affect (estimate = -0.06) and higher levels of negative affect (estimate = 0.06).

Age and ACEs were consistent predictors of emotional reactivity/responsiveness to daily negative and positive

 Table 1. Means, SD, and Intercorrelations Among the Variables in Study

Variables	M (SD)	1	2	3	4	5	6	7	8	9	10	11	12
1. Age	61.16 (5.66)	_											
2. Race (% White)	0.75 (0.43)	07	_										
3. Length of care	4.49 (1.76)	.09	.05	_									
4. Total grandchildren	1.97 (1.04)	09	05	10	_								
5. Income	2.94 (1.32)	.07	.28*	10	12	_							
6. Adverse childhood experiences	4.17 (3.21)	27*	06	11	.09	14	—						
7. Social support	7.04 (1.95)	02	.02	.17*	.04	11	10	_					
8. Relationship strain	4.58 (2.12)	.04	.08	14	06	.08	05	33*	_				
9. Mean positive affect	3.39 (0.76)	.14	20*	02	.01	02	20*	.36*	25*	_			
10. Mean negative affect	1.58 (0.46)	11	.09	02	.06	14*	.31*	11	.20*	49*	_		
11. SD positive affect	0.54 (0.25)	29*	01	.01	01	10	.27*	06	02	34*	.28*	_	
12. SD negative affect	0.43 (0.25)	21*	.05	08	.09	06	30*	18*	.13	47*	.65*	.61*	_

Notes: Length of care refers to length of time the adolescent grandchild has been with the custodial grandmother. Income was divided into five categories: 1 (\$15,999 or less), 2 (\$16,000-\$25,999), 3 (\$26,000-\$50,999), 4 (\$51,000-\$75,999), and 5 (\$76,000 or more). Social support and relationship strain refer to relationship quality with adolescent grandchild.

*p < .05.

 Table 2. Frequency of Negative and Positive Daily Events

	Negative events		Positive events		
Event domain	Observations	%	Observations	%	
None	1,312	44	509	17	
Spouse/partner	129	4	232	8	
Family	750	25	1,346	45	
Friend/	84	3	408	14	
acquaintance					
Work	145	5	143	5	
Finances	137	5	57	2	
School	70	2	32	1	
Health	156	5	85	3	
Other	223	7	193	6	

Note: The percentages may not add up to 100 because of rounding.

events. Figure 1A and B graphically illustrate how older age was associated with less steep declines in positive affect (estimate = -0.02) and less steep increases in negative affect (estimate = -0.02) on days when a negative event was reported. Figure 1C and D graphically illustrate how individuals who reported more ACEs were more likely to exhibit stronger increases in positive affect (estimate = -0.03) and stronger decreases in negative affect (estimate = -0.04) on days when a positive event was reported.

Discussion

Guided by the life-course perspective, the overarching objective of this study was to examine the nature of daily well-being and negative and positive events in CGMs. The most frequently reported daily negative and positive events centered on family interactions and daily well-being was lower when a negative event was reported and higher when a positive event was reported. More ACEs was linked to an increased likelihood of reporting a daily negative event and stronger gains in daily well-being when a daily positive event was reported. Older age was associated with weaker declines in daily well-being on days when a negative event was reported. Our findings illustrate how the timing of lifecourse transitions (i.e., age) and accumulation of adversity over the life course (i.e., ACEs) affect the nature of daily well-being and negative and positive events for CGMs. Our discussion focuses on resources to consider when building resilience-promoting interventions for improving the mental and physical health of CGM.

Significance of Custodial Grandmothers

CGM play a vital role in society through raising their grandchildren and providing them opportunities for a better developmental trajectory (Smith & Dolbin-MacNab, 2013). Less is known regarding the dynamics of daily life within this population segment and how they compare to

Table 3. Examining Predictors of Reporting a Daily Negativeand Positive Event in Custodial Grandmothers

	Negative events	Positive events		
	OR [95% CI]	OR [95% CI]		
Age	1.01 [0.97, 1.05]	1.05 [0.99, 1.11]		
White	1.63* [1.02, 2.61]	1.32 [0.67, 2.63]		
Length of care	0.91 [0.81, 1.03]	0.79* [0.67, 0.95]		
Total grandchildren	1.14 [0.94, 1.39]	1.19 [0.90, 1.56]		
Income	1.27* [1.09, 1.49]	1.22 [0.97, 1.55]		
Adverse childhood experiences	1.17* [1.11, 1.24]	1.06 [0.96, 1.17]		
Social support	0.99 [0.88, 1.11]	1.14 [0.97, 1.33]		
Relationship strain	1.19* [1.07, 1.31]	1.03 [0.88, 1.21]		

Notes: CI = confidence interval; OR = odds ratio.

 $^{\ast}p<.05.$

previous studies focusing on middle-aged and older adults. Our study highlights the importance of taking into consideration the potential impact of non-normative life transitions, such as raising a grandchild, and linked lives for individuals in midlife and old age, where one of the central pillars is that of bridging younger and older generations (Infurna et al., 2020; Lachman, 2004). This is shown through family-oriented events being the most likely to be reported for both negative and positive events in our sample of CGMs, and the associations of relationship strain with the grandchild and length of care with the likelihood of reporting negative and positive events, respectively. Conversely, previous research in middle-aged adults found work to be the most common negative event and positive events to be more evenly distributed across one's social network (see Infurna et al., 2015). Family-oriented events are the centerpiece of daily living for CGMs due to having to navigate components of their adolescent grandchild's life, such as parenting, school, and extracurricular activities. Navigating these responsibilities may become more challenging when grandchildren display significant emotional, physical, or behavioral difficulties.

Analogous to previous research involving individuals from across the adult lifespan (Almeida et al., 2011), daily negative events for CGMs were associated with poorer daily well-being and daily positive events were associated with higher daily well-being. Our measures of events and well-being were similar to that of Infurna et al. (2015), who studied a community-based sample of middle-aged adults; interestingly, the effect sizes found here for changes in CGM daily well-being on negative and positive event days were larger than what they observed. Changes in daily well-being on negative and positive event days ranged from d = 0.53 to 1.27, whereas Infurna et al. (2015) observed changes that ranged from d = 0.20 to 0.52. Thus, compared with a community-based midlife sample, CGMs exhibited stronger changes in daily well-being in the context of negative and positive events, which could lead to more

	Negative affect	Positive affect Estimate (SE)	
	Estimate (SE)		
Fixed effects			
Intercept (no negative or positive event), γ_{00}	1.45* (0.04)	3.13* (0.06)	
Age, γ_{01}	0.01 (0.01)	0.01 (0.01)	
White, γ_{02}	0.11 (0.09)	-0.47* (0.14)	
Length of care, γ_{03}	-0.03 (0.03)	-0.01 (0.04)	
Total grandchildren, γ_{04}	-0.001 (0.04)	-0.01 (0.04)	
Income, γ_{05}	-0.08* (0.03)	0.04 (0.06)	
Adverse childhood experiences, γ_{06}	0.06* (0.01)	0.04 (0.05)	
Social support, γ_{07}	0.02 (0.02)	0.08* (0.03)	
Relationship strain, γ_{08}	0.03 (0.02)	-0.03 (0.03)	
Negative event, γ_{10}	0.47* (0.02)	-0.34* (0.03)	
Negative event × age, γ_{11}	-0.02* (0.004)	0.01* (0.005)	
Negative event × White, γ_{12}	0.16* (0.05)	-0.04 (0.06)	
Negative event × length of care, γ_{13}	-0.01 (0.01)	0.004 (0.02)	
Negative event × total grandchildren, γ_{14}	-0.001 (0.02)	0.01 (0.03)	
Negative event × income, γ_{15}	-0.04* (0.02)	0.02 (0.02)	
Negative event × adverse childhood experiences, γ_{16}	0.001 (0.01)	0.01 (0.01)	
Negative event × social support, γ_{17}	-0.02 (0.01)	0.03 (0.02)	
Negative event × relationship strain, γ_{18}	0.01 (0.01)	-0.02 (0.01)	
Positive event, γ_{20}	-0.20* (0.04)	0.55* (0.05)	
Positive event × age, γ_{21}	-0.01 (0.01)	-0.003 (0.01)	
Positive event × White, γ_{22}	-0.13 (0.08)	0.15 (0.10)	
Positive event × length of care, γ_{23}	0.03 (0.02)	-0.02 (0.03)	
Positive event × total grandchildren, γ_{24}	0.002 (0.03)	-0.05 (0.04)	
Positive event × income, γ_{25}	0.04 (0.03)	-0.01 (0.04)	
Positive event × adverse childhood experiences, γ_{26}	-0.04* (0.01)	0.03* (0.01)	
Positive event × social support, γ_{27}	-0.01 (0.02)	0.04 (0.03)	
Positive event × relationship strain, γ_{28}	-0.01 (0.02)	0.01 (0.02)	
Random effects		. ,	
Intercept	0.14* (0.03)	0.41* (0.06)	
Negative event	0.03* (0.01)	0.02 (0.01)	
Positive event	0.05* (0.02)	0.09* (0.03)	
Residual	0.19* (0.01)	0.30* (0.01)	

 Table 4. Examining Emotional Reactivity and Responsiveness in Negative Affect and Positive Affect as a Function of Daily

 Negative and Positive Events in Custodial Grandmothers

Notes: Intraclass correlation: Positive affect = 0.604; negative affect = 0.434. *p < .05.

detrimental effects of daily stress processes for long-term mental and physical health. How daily well-being is affected from day-to-day in the lives of CGMs is relevant in the context of linked lives; the quality of parenting behavior has been found to be driven by CGMs' affective states (Smith et al., 2018) and on days in which daily well-being is higher, parenting behavior may be better and vice versa (Smith & Lee, 2021).

Our results pertaining to the daily dynamics involving negative and positive events provides valuable information about why CGM consistently display poorer mental and physical health outcomes than similarly aged peers. CGMs have a hyper-sensitivity to daily negative and positive events that could be the result of cumulative disadvantages associated with earlier life adversity as well as challenges associated with being a CGM. As such, daily negative events could signify greater life disruptions surrounding parenting grandchildren and the accumulation of other financial, social, and other stressors unique to grandfamilies (Meyer & Kandic, 2017). Large changes in daily well-being in the context of daily positive events could imply that CGM rely more on uplifts to maintain higher levels of daily well-being.

Factors/Resources That Affect Daily Dynamics in Custodial Grandmothers

As suggested by the life-course perspective, our findings showcase how the timing and sequencing of being a CGM throughout the life course differentially affects

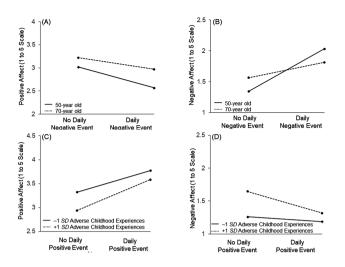


Figure 1. Illustrating the moderating effect of age on within-person daily negative events on positive affect (A) and negative affect (B). On days when a negative event was reported, participants who were older were more likely to show less of a decrease in positive affect and less of an increase in negative affect. Illustrating the moderating effect of adverse childhood experiences on within-person daily positive events on positive affect (C) and negative affect (D). On days when a positive event was reported, participants who reported more adverse childhood experiences were more likely to show a stronger increase in positive affect and stronger decrease in negative affect.

daily well-being. Older CGMs, on average, reported better overall and less variability in daily well-being and experienced lesser declines in daily well-being when they reported a negative event. These findings pertaining to age are consistent with previous research showing that emotional stability and well-being and how individuals react to daily negative events improves with age (Carstensen et al., 2011; Neupert et al., 2007). Older adults have built up effective coping resources during their life course and for older CGMs, they have been in the caregiver role longer and adjusted to the daily demands, enabling for better abilities in handling daily negative events (Carstensen et al., 1999), as well as being more proactive and have better experience with handling daily negative events (Charles, 2010). Furthermore, becoming a CGM could be more disruptive or considered more of an "off-time" event for those people in earlier, versus later in midlife (Landry-Meyer & Newman, 2004). It is likely that younger CGM are still working, raising multiple grandchildren and caring for their aging parents (Meyer & Kandic, 2017). In sum, our findings suggest that the aforementioned age benefits that pertain to well-being and reactivity to daily negative events in more general populations are similarly observed in CGMs.

The cumulative disadvantage of early-life adversity, in the form of reporting more ACEs, was associated with various outcomes examined. Similar to previous research, ACEs was associated with poorer overall levels and variability in well-being and an increased likelihood of reporting a daily negative event (Infurna et al., 2015; Schafer & Ferraro, 2012). Circumstances surrounding being a CGM could further increase the likelihood of negative events arising, such as dealing with grandchildren who are defiant or oppositional and facing conflictual encounters with birth parents. The accumulation of these increased exposures to daily negative events can have cumulative effects on health and mental health in midlife and beyond (Almeida et al., 2011; Zautra et al., 2005).

CGMs reporting more ACEs were more likely to show stronger improvements in daily well-being when they reported a daily positive event. It is important to acknowledge that greater responsivity to positive events does not mean that those CGMs with more ACEs had occasions when they were happier than those with lower reports of ACEs. In fact, Figure 1 shows that CGMs approach but do not surpass levels of well-being for those CGMs with lower ACEs, suggesting a heightened sensitivity to positive events (Pluess & Belsky, 2013). This is consistent with previous research in a community-sample of middle-aged adults for positive affect (Infurna et al., 2015) and with research studies focusing on social-emotional regulation in the form of social connectedness, emotional awareness, and perspective-taking (Castro et al, 2019). Positive events could be a form of regulation for deriving greater joy in life (Castro et al., 2019; Grosse Rueschkamp et al., 2020), which is suggestive that CGM, especially those reporting a higher number of ACEs, rely more on uplifts to maintain higher levels of daily well-being. Typically, in the daily events literature, positive events are seen as something individuals seek out due to desirability and attentiveness as opposed to negative events, which are undesirable (Zautra et al., 2005). Daily positive events are typically sought after, such as meaningful interaction with family or friends, work accomplishments, or goal attainment with spouse/partner or other family member and they promote positive emotions and lessen negative emotions (Zautra et al., 2005).

Practice Implications

The literature on family caregiving interventions, including interventions pertaining to custodial grandparents, has primarily focused on problem-reduction and far less on strategies to enhance the positive aspects of caregiving (see Schulz, 2019). Yet, over 20 years ago, Giarusso et al. (1999) observed that 54% of 162 caregiving grandparents from the larger Study of Intergenerational Linkages found raising grandchildren to be both stressful and rewarding. Our findings showing that CGMs display high reactivity/ responsivity to both daily negative and positive events provides evidence that CGMs would respond to interventions designed to help them stabilize emotional experiences from day-to-day (Bylsma et al., 2011; Castro et al., 2019). Focusing on the plasticity of social relationships and social-emotional regulation could be a beneficial intervention strategy through extension beyond cognitive models and behavioral principles to include attention to evidence of barriers to social-emotional development from early-life experiences (Zautra et al., 2016).

We note that it is important for professionals to validate both the positive and negative emotions experienced by CGMs, explore the sources of these emotions, and educate CGMs on strategies for sustaining positive emotions. It would also be useful to encourage CGMs to share positive events with family members, to increase memory for positive events, and to promote attributing importance to these events, which may lead to an upward spiral of positive emotions (Gable & Reiss, 2010). Such an emphasis on positive emotions is critical in view of Folkman's (2008) assertion that positive emotions are a normative aspect of the stress process which facilitate coping. Fostering daily positive emotions among CGMs is especially important in light of findings that (a) the frequency of positive events typically outweighs that of negative events; (b) positive events are linked to positive emotions; (c) positive emotions must outnumber negative emotions for optimal well-being to occur; and (d) one important way that people react to positive events is to share them with close others, which enhances their overall impact on well-being (Gable & Reiss, 2010).

Finally, our findings further suggest that CGM who have experienced multiple ACEs, and who are of younger ages, may benefit the most from interventions. CGMs who are in earlier stages of adulthood seem to be in a more precarious situation when it comes to daily well-being and responsivity/reactivity to daily negative and positive events. Similarly, CGMs with more ACEs could benefit most from intervention since this exacerbates their already poorer mental and physical health, compared to similarly aged peers. The findings that ACEs increase sensitivity or responsiveness to daily positive events provides further motivation for interventions that focus on prosocial intentions or socioemotional regulation strategies (Castro et al., 2019). Recent work proposes that social-emotional skills can be modified through training programs that encourage active self-reflection and intentional activities, especially for those who experienced early-life adversity (Davidson & McEwen, 2012).

Limitations and Conclusion

Our study is not without limitation. First, although our sample consists of CGMs from across the contiguous United States, it is largely White and does not include grandfathers. Although the sample demographics compare favorably to U.S. Census data (Generations United, 2022), it is still possible that our findings could be mitigated or exacerbated in underrepresented groups or among CGMs raising younger grandchildren. Second, our study solely included CGMs and did not include other members of the family. Dyadic or family-level analyses could better isolate how daily positive and negative events from one family member could affect other members. Third, other factors/resources could affect the nature of daily dynamics for CGMs, such as personality factors and the strains or conflicts that CGMs likely confront and are challenged with regularly. Lastly, all of the

data were self-report and future research is warranted to examine whether and how daily well-being and emotional reactivity/responsiveness to daily events is associated with objective indicators of well-being (e.g., sleep) and longterm mental and physical health outcomes.

Our findings provide a glimpse into the dynamics of daily life for CGMs through demonstrating that CGMs exhibit strong changes in their daily well-being in response to daily negative and positive events and that age and ACEs are implicated as key predictors of this relationship. Although research has shown that custodial grandparents, on average, are at increased risk for compromised mental and physical health, less is known regarding potential mechanisms underlying this relationship. Exhibiting emotional reactivity/responsiveness to daily negative and positive events could be one reason given the accumulated nature that daily negative events can have for long-term mental and physical health outcomes. Given the sheer number and increasing numbers of CGMs and their contributions to society, our findings and approach should inform and provide impetus for future interventions aimed at improving the ways CGMs respond to daily life events, with an emphasis on socioemotional regulation skills and social support.

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Conflict of Interest

None declared.

References

- Almeida, D. M. (2005). Resilience and vulnerability to daily stressors assessed via diary methods. Current Directions in Psychological Science, 14(2), 64–68. doi:10.1111/j.0963-7214.2005.00336.x
- Almeida, D. M., Piazza, J. R., Stawski, R. S., & Klein, L. C. (2011). The Speedometer of Life. *Handbook of the Psychology of Aging*, 191–206. doi:10.1016/b978-0-12-380882-0.00012-7
- Antonucci, T. C. (2001). Social relations: An examination of social networks, social support, and sense of control. In J. E. Birren & K. W. Schaie (Eds.), *Handbook of the psychology of aging* (pp. 427–453). Academic Press.

- Bowers, B. F., & Myers, B. J. (1999). Grandmothers providing care for grandchildren: Consequences of various levels of caregiving. *Family Relations*, 48(3), 303–311. doi:10.2307/585641
- Bylsma, L. M., Taylor-Clift, A., & Rottenberg, J. (2011). Emotional reactivity to daily events in major and minor depression. *Journal* of Abnormal Psychology, 120(1), 155–167. doi:10.1037/ a0021662
- Carstensen, L. L., Isaacowitz, D. M., Charles, S. T., Prakash, R. S., de Leon, A. A., Patterson, B., Schirda, B. L., & Janssen, A. L. (1999). Taking time seriously. *The American Psychologist*, 54(3), 165–181. doi:10.1037/0003-066X.54.3.165
- Carstensen, L. L., Turan, B., Scheibe, S., Ram, N., Ersner-Hershfield, H., Samanez-Larkin, G. R., Brooks, K. P., & Nesselroade, J. R. (2011). Emotional experience improves with age: evidence based on over 10 years of experience sampling. *Psychology and Aging*, 26(1), 21–33. doi:10.1037/a0021285
- Castro, S. A., Infurna, F. J., Lemery-Chalfant, K., Waldron, V., & Zautra, E. (2019). Can an online curriculum improve the daily socio-emotional lives of middle-aged adults exposed to childhood Trauma? *Behaviour Research and Therapy*, **118**, 65–76. doi:10.1016/j.brat.2019.03.012
- Centers for Disease Control and Prevention (CDC). (2009). Behavioral Risk Factor Surveillance System Survey Data, Atlanta, GA: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention. https://www.cdc. gov/brfss/questionnaires/index.htm
- Charles, S. T. (2010). Strength and Vulnerability Integration: A Model of Emotional Well-Being Across Adulthood. *Psychological Bulletin*, 136(6), 1068–1091. doi:10.1037/a0021232
- Charles, S. T., Piazza, J. R., Mogle, J., Sliwinski, M. J., & Almeida, D. M. (2013). The wear and tear of daily stressors on mental health. *Psychological Science*, 24(5), 733–741. doi:10.1177/0956797612462222
- Cohen, S., Murphy, M. L. M., & Prather, A. A. (2019). Ten surprising facts about stressful life events and disease risk. *Annual Review of Psychology*, 70, 577–597. doi:10.1146/ annurev-psych-010418-102857
- Dannefer, D. (2003). Cumulative advantage/disadvantage and the life course: Cross-fertilizing age and social science theory. The Journals of Gerontology, Series B: Psychological Sciences and Social Sciences, 58, S327–S337. doi:10.1093/geronb/58.6.s327
- Davidson, R. J., & McEwen, B. S. (2012). Social influences on neuroplasticity: stress and interventions to promote well-being. *Nature Neuroscience*, 15(5), 689–695. doi:10.1038/nn.3093
- Denby, R. W., Brinson, J. A., Cross, C. L., & Bowmer, A. (2015). Culture and Coping: Kinship Caregivers' Experiences with Stress and Strain and the Relationship to Child Well-Being. *Child and Adolescent Social Work Journal*, 32(5), 465–479. doi:10.1007/ s10560-015-0387-3
- Dolbin-MacNab, M. L., & Few-Demo, A. L. (2018). Grandfamilies in the United States: An intersectional analysis. In V. Timonen (Ed.), *Grandparenting practices around the world* (pp. 189–208). Policy Press.
- Dolbin-MacNab, M. L., & Keiley, M. K. (2009). Navigating interdependence: How adolescents raised solely by grandparents experience their family relationships. *Family Relations*, 58, 162–175. doi:10.1111/j.1741-3729.2008.00544.x
- Dolbin-MacNab, M. L., & Keiley, M. K. (2006). A systemic examination of grandparents' emotional closeness with their custodial

grandchildren. Research in Human Development, 3(1), 59–71. doi:10.1207/s15427617rhd0301_6

- Felitti, V. (1998). Relationship of childhood abuse and household dysfunction to many of the leading causes of death in adults: The adverse childhood experiences. *American Journal of Preventive Medicine*, 14(4), 245–258. doi:10.1016/s0749-3797(98)00017-8
- Ferraro, K. F., & Shippee, T. P. (2009). Aging and cumulative inequality: How does inequality get under the skin? *The Gerontologist*, 49(3), 333–343. doi:10.1093/geront/gnp034
- Ferraro, K. F. (2001). Aging and role transitions. *Handbook of Aging and the Social Sciences* (pp 313-330).
- Fingerman, K. L., & Suitor, J. J. (2017). Millennials and their parents: implications of the new young adulthood for midlife adults. *Innovation in Aging*, 1(3), 1–16. doi:10.1093/geroni/ igx026
- Folkman, S. (2008). The case for positive emotions in the stress process. Anxiety, Stress, and Coping, 21, 3–14. doi:10.1080/10615800701740457
- Gable, S. L., & Reis, H. T. (2010). Good news! Capitalizing on positive events in an interpersonal context. Advances in Experimental Social Psychology, 42, 195–257. doi:10.1016/ s0065-2601(10)42004-3
- Generations United: Generations United. (2022). Grandfamilies and kinship families: Strengths and challenges. https://www.gu.org/ app/uploads/2022/10/General-Grandfamilies-Fact-Sheet-2022-FINAL-UPDATE.pdf
- Giarrusso, R., Silverstein, M., & Feng, D. (1999). Psychological costs and benefits of raising grand-children: Evidence from a national survey of grandparents. In C. B. Cox (Ed.), To grandmother's house we go and stay: Perspectives on custodial grandparents (pp. 71–90). Springer.
- Goodman, C. C. (2012). Caregiving grandmothers and their grandchildren: Well-being nine years later. *Children and Youth Services Review*, 34(4), 648–654. doi:10.1016/j.childyouth.2011.12.009
- Grimm, K. J., Ram, N., & Estabrook, R. (2017). Growth modeling: Structural equation and multilevel modeling approaches. Guilford.
- Grosse Rueschkamp, J. M., Kuppens, P., Riediger, M., Blanke, E. S., & Brose, A. (2020). Higher well-being is related to reduced affective reactivity to positive events in daily life. *Emotion*, 20, 376. doi:10.1037/emo0000557
- Hardy, J., & Segerstrom, S. C. (2017). Intra-individual variability and psychological flexibility: Affect and health in a National US sample. *Journal of Research in Personality*, 69, 13–21.
- Hayslip, B., Fruhauf, C. A., & Dolbin-MacNab, M. L. (2017). Grandparents raising grandchildren: What have we learned over the past decade?. *The Gerontologist*, 59(3), e152–e163. doi:10.1093/geront/gnx106
- Hayslip, B., Jr, & Smith, G. (2013). *Resilient grandparent caregivers: A strengths-based perspective*. New York, NY: Routledge.
- Hayslip, B., & Kaminski, P. L. (2005). Grandparents raising their grandchildren. Marriage and Family Review, 37, 147–169.
- Hostinar, C. E., & Gunnar, M. R. (2013). The developmental effects of early life stress: An overview of current theoretical frameworks. *Current Directions in Psychological Science*, 22(5), 400–406. doi:10.1177/0963721413488889
- Hughes, M. E., Waite, L. J., LaPierre, T. A., Luo, Y., LaPierre, T. A., & Luo, Y. (2007). All in the family: the impact of caring for grandchildren on grandparents' health. *The Journals of Gerontology*,

Series B: Psychological Sciences & Social Sciences, **62**, S108–S109. doi:10.1093/geronb/62.2.s108

- Infurna, F. J., Gerstorf, D., & Lachman, M. E. (2020). Midlife in the 2020s: Opportunities and challenges. *American Psychologist*, 75(4), 470–485. doi:10.1037/amp0000591
- Infurna, F. J., & Luthar, S. S. (2018). Re-evaluating the notion that resilience is commonplace: A review and distillation of directions for future research, practice, and policy. *Clinical Psychology Review*, 65(July), 43–56. doi:10.1016/j.cpr.2018.07.003
- Infurna, F. J., Rivers, C. T., Reich, J., & Zautra, A. J. (2015). Childhood trauma and personal mastery: Their influence on emotional reactivity to everyday events in a community sample of middle-aged adults. *PLoS One*, 10(4), 1–21. doi:10.1371/ journal.pone.0121840
- Lachman, M. E. (2004). Development in midlife. Annual Review of Psychology, 55(1), 305–331. doi:10.1146/annurev. psych.55.090902.141521
- Landry-Meyer, L., & Newman, B. M. (2004). An exploration of the grandparent caregiver role. *Journal of Family Issues*, 25(8), 1005–1025. doi:10.1177/0192513X04265955
- Littell RC, Miliken GA, Steoup WW, Wolfinger RD, & Schabenberger O. (2006). SAS for mixed models (2nd ed.). SAS Institute.
- Livingston, G., & Parker, K. (2010). Since the start of the great recession, more children raised by grandparents. http://www. pewsocialtrends.org/2010/09/09/since-the-start-of-the-greatrecession-more-children-raised-by-grandparents/
- Luecken, L. J., & Lemery, K. S. (2004). Early caregiving and physiological stress responses. *Clinical Psychology Review*, 24, 171– 91. doi:10.1016/j.cpr.2004.01.003
- Manns, A., Atler, K. E., & Fruhauf, C. A. (2017). Daily activities and experiences of custodial grandparents: An exploratory study. *Physical & Occupational Therapy in Geriatrics*, 35, 34–48. doi: 10.1080/02703181.2017.1280112
- Meyer, M. H., & Kandic, A. (2017). Grandparenting in the United States. *Innovation in Aging*, 1(2), 1-10. doi:10.1093/geroni/ igx023
- Musil, C. M., & Ahmad, M. (2002). Health of grandmothers: A comparison by caregiver status. *Journal of Aging & Health*, 14, 96–121. doi:10.1177/089826430201400106
- Musil, C. M., Gordon, N. L., Warner, C. B., Zauszniewski, J. A., Standing, T., & Wykle, M. (2010). Grandmothers and caregiving to grandchildren: Continuity, change, and outcomes over 24 months. *The Gerontologist*, 51(1), 86–100. doi:10.1093/ geront/gnq061
- Musil, C. M., & Standing, T. (2005). Grandmothers' diaries: A glimpse at daily lives. The International Journal of Aging and Human Development, 60, 317-329. doi:10.2190/ lf1u-ja0x-w7f9-341k
- Musil, C. M., Warner, C., Zauszniewski, J., Wykle, M., & Standing, T. (2009). Grandmother caregiving, family stress and strain and depressive symptoms. Western Journal of Nursing Research, 31(3), 389–408. doi:10.1177/0193945908328262
- Mroczek, D. K., Stawski, R. S., Turiano, N. A., Chan, W., Almeida, D. M., Neupert, S. D., & Spiro, A. (2015). Emotional reactivity and mortality: Longitudinal findings from the VA Normative Aging Study. *The Journals of Gerontology, Series B: Psychological Sciences and Social Sciences*, 70(3), 398–406. doi:10.1093/geronb/gbt107

- Neupert, S. D., Almeida, D. M., & Charles, S. T. (2007). Age differences in reactivity to daily stressors: the role of personal control. *The Journals of Gerontology, Series B: Psychological Sciences and Social Sciences*, 62B(4), P216–P225. doi:10.1093/ geronb/62.4.p216
- Ong, A. D., Exner-Cortens, D., Riffin, C., Steptoe, A., Zautra, A., & Almeida, D. M. (2013). Linking stable and dynamic features of positive affect to sleep. *Annals of Behavioral Medicine*, 46(1), 52–61. doi:10.1007/s12160-013-9484-8
- Pearlin, L. I. (2010). The life course and the stress process: Some conceptual compazrisons. *The Journals of Gerontology, Series B: Psychological Sciences and Social Sciences*, 65B, 207–215. doi:10.1093/geronb/gbp106
- Piazza, J. R., Charles, S. T., Sliwinski, M. J., Mogle, J., & Almeida, D. M. (2013). Affective reactivity to daily stressors and long-term risk of reporting a chronic physical health condition. *Annals of Behavioral Medicine*, 45(1), 110–120. doi:10.1007/ s12160-012-9423-0
- Pluess, M., & Belsky, J. (2013). Vantage sensitivity: Individual differences in response to positive experiences. *Psychological Bulletin*, 139(4), 901–16. doi:10.1037/a0030196
- Rauschenberg, C., Van Os, J., Cremers, D., Goedhart, M., Schieveld, J., & Reininghaus, U. (2017). Stress sensitivity as a putative mechanism linking childhood trauma and psychopathology in youth's daily life. *Acta Psychiatrica Scandinavica*, 136(4), 373–388.
- Schafer, M. H., & Ferraro, K. F. (2012). Childhood misfortune as a threat to successful aging: Avoiding disease. *The Gerontologist*, 52(1), 111–120. doi:10.1093/geront/gnr071
- Schulz, R. (2019). Commentary on "Influence of positive and negative dimensions of dementia caregiving on caregiver well-being and satisfaction with life: Findings from the IDEAL study." *The American Journal of Geriatric Psychiatry*, 27, 849–850. doi:10.1016/j.jagp.2019.02.009
- Smith, G. C., & Lee, J. (2021). Appraisals of self in the caregiver role as made by married custodial grandparents. *Family Relations*, 70, 179–194. doi:10.1111/fare.12451
- Smith, G. C., Hayslip, B., Hancock, G. R., Strieder, F. H., & Montoro-Rodriguez, J. (2018). A randomized clinical trial of interventions for improving well-being in custodial grandfamilies. *Journal of Family Psychology*, 32(6), 816–827. doi:10.1037/fam0000457
- Smith, G. C., & Dolbin-MacNab, M. L. (2013). The role of negative and positive caregiving a appraisals in key outcomes for custodial grandmothers and grandchildren. In B. Hayslip & G. C. Smith (Eds.), *Resilient grandparent caregivers: A strengthsbased perspective* (pp. 3–24). Routledge.
- Smith, G. C., Dolbin-MacNab, M. L., Infurna, F., Webster, B., Musil, C., Castro, S., & Crowley, D. M. (2022). Selfreported adverse childhood experiences among custodial grandmothers: Frequencies, patterns, and correlates. *The International Journal of Aging and Human Development*. doi:10.1177/00914150221106096
- Sprang, G., Choi, M., Eslinger, J. G., & Whitt-Woosley, A. L. (2014). The pathway to grandparenting stress: trauma, relational conflict, and emotional well-being. *Aging & Mental Health*, 19(4), 315–324. doi:10.1080/13607863.2014.938606
- Strawbridge, W., Wallhagen, M., Shema, S., & Kaplan, G. (1997). New burdens or more of the same? comparing adult grandparent,

spouse, and adult-child caregivers. *The Gerontologist*, **17**, 505–510. doi:10.1093/geront/37.4.505

- United States Census Bureau. (2020). *Grandparents*. https://data.census.gov/cedsci/table?q=\$1002&tid=AC\$\$T5Y2019.\$1002
- Walen, H. R., & Lachman, M. E. (2000). Social support and strain from partner, family, and friends: Costs and benefits for men and women in adulthood. *Journal of Social and Personal Relationships*, 17(1), 5–30. doi:10.1177/0265407500171001
- Watson, D., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: The

PANAS scales. Journal of Personality and Social Psychology, 54(6), 1063–1070. doi:10.1037/0022-3514.54.6.1063

- Zautra, A. J., Infurna, F. J., & Zautra, E. K. (2016). The humanization of social relations: Nourishment for resilience in mid-life. New developments in emotional aging. American Psychological Association.
- Zautra, A. J., Affleck, G. G., Tennen, H., Reich, J. W., & Davis, M. C. (2005). Dynamic approaches to emotions and stress in everyday life: Bolger and Zuckerman reloaded with positive as well as negative affects. *Journal of Personality*, 73(6), 1511–1538. doi:10.1111/j.0022-3506.2005.00357.x