Published in final edited form as:

Demography. 2016 June ; 53(3): 649–674. doi:10.1007/s13524-016-0474-x.

Mothering Experiences: How Single-Parenthood and Employment Shift the Valence

Ann Meier,

Department of Sociology & Minnesota Population Center, University of Minnesota Minneapolis, MN

Kelly Musick,

Policy Analysis and Management & Cornell Population Center, Cornell University, Ithaca, NY

Sarah Flood, and

Minnesota Population Center, University of Minnesota, Minneapolis, MN

Rachel Dunifon

Policy Analysis and Management & Cornell Population Center, Cornell University, Ithaca, NY

Ann Meier: meierann@umn.edu; Kelly Musick: musick@cornell.edu; Sarah Flood: floo0017@umn.edu; Rachel Dunifon: red26@cornell.edu

Abstract

Research studies and popular accounts of parenting document the joys and strains of raising children. Much of the literature comparing parents to those who do not have children indicates a happiness advantage for those without children, though recent studies unpack this general advantage to reveal differences by the dimension of well-being considered and important features in parents' lives and parenting experiences. We use unique data from the 2010, 2012, and 2013 American Time Use Survey to understand emotions in mothering experiences and how these vary by key demographic factors: employment and partnership status. Assessing mothers' emotions in a broad set of parenting activities while controlling for a rich set of person- and activity-level factors, we find that mothering experiences are generally associated with high levels of emotional well-being, though single parenthood is associated with shifts in the emotional valence. Single mothers report less happiness and more sadness, stress and fatigue in parenting than partnered mothers. This is concentrated among those single mothers who are not employed. Employed single mothers are happier and less sad and stressed when parenting than single mothers who are not employed. Contrary to common assumptions about maternal employment, we find overall few negative associations between employment and mothers' feelings in time with children, with the exception that employed mothers report more fatigue in parenting than those who are not employed.

*Direct correspondence to: Ann Meier, 267 19th Ave S., University of Minnesota, Minneapolis, MN 55455; meierann@umn.edu, phone 612-626-7230; fax 612-624-7020.

Earlier versions of this paper were presented at the 2014 Annual Meeting of the Population Association of America and the 2014 Work & Family Researchers Network and the Work, Family & Time (WFT) Workshop at the Minnesota Population Center. We thank WFT workshop participants for useful comments and suggestions, as well as Liana Sayer and Julie Brines for feedback on earlier drafts.

Keywords

parenting; emotional well-being; maternal employment; single mothers; time use

Studies have shown that men and women with children in the home report lower psychological well-being than those without children (Evenson and Simon 2005; Hansen 2012; McLanahan and Adams 1987; Stanca 2012). This is perhaps not surprising, as raising children can be financially and emotionally draining, particularly in the U.S. where there is relatively little public support for childrearing (Glass, Simon, and Andersson 2013). Yet parenthood also comes with great joy (e.g., Senior 2014), and a newer crop of research has drawn attention to both potential costs and rewards of parenthood and how they vary by parents' characteristics (Aassve et al. 2012; Margolis and Myrskylä 2011; Nomaguchi and Milkie 2003; Woo and Raley 2005).

A rich set of qualitative studies describes the process of and challenges in parenting under particular conditions (Edin and Kefalas 2005; Garey 1999; Nelson 2010; Villalobos 2014) or at specific stages (Fox 2009; Nelson 2010). Less research has looked at the joys and strains of parents' daily experiences with children (Authors 2014; Connelly and Kimmel 2015), particularly among broad samples of the population (Kahneman et al. 2004; Nelson et al. 2013; Offer 2014). We know little about how feelings in time with children are shaped by the context in which parenting takes place. This paper addresses gaps in the literature on parenting experiences, focusing specifically on the factors associated with mothers' feelings in everyday parenting experiences.

We conceptualize parenting broadly to include any activity mothers report doing with their children. Studies examining parental time with children often focus solely on time in which parents directly engage in childcare activities with their children, capturing things such as play, teaching, and management (e.g. Kalil et al. 2012; Raley et al. 2012). However, these activities capture only a fraction of parenting time; Offer (2014) estimates only about one-quarter of all time with children is spent in direct interaction. We argue that parenting occurs in many forms and varied contexts including seemingly mundane tasks such as cleaning and shopping (Folbre et al. 2005).

We focus on mothers' feelings in parenting for several reasons. Mothers are much more often single parents than fathers, and there is greater variation in their employment hours, each of which is associated with greater demands at home (Bianchi 2000). Mothers spend more time on childcare and housework than do fathers, even in dual-career households (Bianchi et al. 2000; Raley et al. 2012). Whereas employed mothers perform fewer household and child-related tasks than do those who stay at home, this is not offset by increased time contributions at home from husbands (Cawley and Liu 2012). Thus, there is evidence that mothers continue to perform the majority of household tasks related to children and family functioning, suggesting that it is their feelings in time with children that not only may matter most for child well-being, but also may be more sensitive to their employment or partnership status. Indeed, research shows that although parenting is generally associated with positive feelings, mothers report less happiness, more stress, and especially greater fatigue in time with children than fathers (Authors 2014).

A key aim of this study is to examine how employment and partnership status are associated with mothers' feelings while spending time with their children. Variation along these critical dimensions may structure the valence of mothering in ways that are difficult to predict. The demands of single parenting may result in less joy and greater strain in time with children; on the other hand, single mothers' time with children may also provide an unmatched source of intimacy, fulfillment, and security (Edin and Kefalas 2005; Villalobos 2014). Maternal employment, which has never fit as easily with the parenting role as paternal employment, can generate tension, time strain, and feelings of inadequacy that may spill into interactions with children (Blair-Loy 2003; Nomaguchi et al. 2005; Garey 1999). Alternatively, it may provide a source of identity, self-worth, and welcome relief from daily care, potentially generating greater appreciation and enjoyment in time with children (Garey 1999; Parcel and Menaghan 1994; Yetis-Bayraktar et al. 2012; Latshaw and Hale forthcoming).

In this paper, we draw on a new module in the American Time Use Survey that links time diaries to feelings in specific activities, allowing us to substantially contribute to understanding of everyday parenting experiences and how they vary by key demographic characteristics, namely partnership status and employment. We conceptualize mothering broadly as time in activities with children, and we rely on multidimensional indicators to tap the potential joys and strains of raising children.

Assessing mothers' emotions in parenting

Much of what we know about mothers' emotions in parenting is based on global assessments of well-being, such as: "All things considered, how satisfied are you with your life as a whole these days?" (Stanca 2012). Divorced from time use, such assessments are more sensitive to long-term aspirations, relative position, and notions of what is socially desirable (Kahneman and Krueger 2006; National Research Council 2012). They reflect different aspects of well-being than measures more closely tied to experiences and can have different correlates (e.g., Deaton 2012; Kahneman and Deaton 2010). Momentary well-being measures tied to activities tend to be more reliable than global assessments (Kahneman and Krueger 2006; National Research Council 2012); they further mitigate threats to validity due to adaptation, or the tendency for people to eventually adjust their subjective well-being to changes in life circumstances (e.g., Lucas et al. 2003). Finally, when asked across activities, momentary assessments provide leverage in teasing out stable, individual characteristics (e.g., a generally positive disposition) from the contexts in which activities take place.

Studies have begun to use momentary assessments of emotions tied to specific activities, leveraging two common methods to measure emotions in activities. Kahneman and colleagues' 2004 study pioneered the day reconstruction method (DRM), which combines a time diary with questions about feelings in specific activities throughout the day in a 24-hour recall survey. Others, like Offer (2014) in the 500 Family Study and Brown and colleagues (2008) in the Work-Life Tensions Study in Australia, use a beeper or personal data assistant (PDA) methodology through which respondents are randomly cued multiple times per day over the course of several days to report on what they are doing, with whom, and how they are feeling. The latter strategy has the advantage of "real time" assessments of momentary well-being, although it is burdensome for respondents; it results in relatively low response

and retention rates and is subject to technical glitches or failure (Soupourmas et al. 2005). Moreover, Kahneman and colleagues (2004) have shown that momentary assessments garnered through DRM are reliable when compared to those gathered by beeper or PDA methodology. To our knowledge, the beeper or PDA methodology has only been used to assess parenting on select samples of advantaged, dual-earner couples in the U.S. and Australia (e.g. Brown et al. 2008; Offer 2014).

An impressive set of qualitative studies has shed further light on mothering experiences over the past two decades. Such studies provide thick accounts of the lives of mothers and, to varying degrees, help us understand what parents worry about (Garey 1999; Nelson 2010; Villalobos 2014), how they manage multiple roles (Garey 1999; Fox 2009), and what parenting means to them (Edin and Kefalas 2005; Nelson 2010; Villalobos 2014). However, in these interview-based studies parents are reflecting back on their parenting experiences, oftentimes without reference to a specific interaction or activity, and potentially considering their status as a parent via a global assessment rather than the “doing of parenting.” Certainly, there is much to be gained from in-depth qualitative studies in understanding how parenting is woven into the lives of women, but momentary assessments offer a unique opportunity to focus in on how parenting activities among a nationally representative sample are experienced differently across key dimensions that potentially shape mothers’ lives: partnership and employment status.

Single parenting

The prevalence of single-parent families rose substantially through the 1970s, 80s, and 90s, and remains high today—about 30 percent of children today live with just one parent (Child Trends 2015). Numerous studies describe the detriments to children associated with living with one versus two parents (e.g., McLanahan et al. 2013; Waldfogel et al. 2010). While we know less about the causal processes involved, many studies also show that single parents are less well-off emotionally than married parents; for example, single parents have higher levels of depression (Evenson and Simon 2005; Nomaguchi and Milkie 2003), less satisfaction in parenting (Rogers and White 1998), and lower levels of happiness (Margolis and Myrskylä 2011). Further, some evidence suggests parenting behaviors of single mothers differ from those of married mothers: single parents report less parental engagement compared to married parents (e.g. Carlson and Berger 2013). Looking across all of the time investments made by caregiving adults, children in single-mother families experience fewer total hours directly engaged with adult caregivers; however, this is due to the fact that nonresident fathers spend very little time with their children. Single mothers actually spend *more* solo time with their children than do married or partnered mothers (Kalil, Ryan and Chor 2014a).

Linkages between single parenthood, parenting behaviors, and parents’ emotional well-being may be attributable to several factors. Research shows that transitions into and out of relationships are associated with increased parenting stress and changes in parenting behaviors (Cooper et al. 2009; Beck et al. 2010), and single mothers experience more relationship instability than partnered mothers (McLanahan and Beck 2010). In addition, single mothers receive less social support and experience greater strain than married mothers

(Edin and Kefalas 2005; Amato 1993). The greater care burden among single mothers may also leave less room for the more enjoyable and rewarding aspects of parenting. Finally, it is possible that selection factors are at play in many of these associations; the same factors associated with selection into single parenthood may also be linked to increased stress, lower satisfaction, and reduced well-being in time with children (Amato 2000).

As a counterpoint to the potential strains of single motherhood, rich ethnographic accounts of the economically disadvantaged describe the central role of children in providing single parents with a sense of purpose, meaning, and satisfaction (Edin and Kefalas 2005; Edin and Nelson 2013, Villalobos 2014). By these accounts, motherhood offers an unmatched source of love, intimacy, and emotional security as well as a key domain of competence. “Meaning making” around childrearing may be particularly salient among women with strong childbearing desires who select into parenthood but not marriage, or among those for whom alternative sources of purpose and meaning are limited. Although some evidence suggests that single mothers may experience reduced emotional well-being while parenting compared to their partnered counterparts, meaning may be one dimension on which single parents fare at least as well in their time with children. To our knowledge no work has compared the emotional experiences of single and partnered mothers in time with children; our focus on well-being across multiple dimensions offers the opportunity to assess the varied ways in which partnership status may be associated with feelings in time with children.

Employment Status

Rising educational attainment for women, changing gender role attitudes, the rise of single-parenthood, and contemporary economic uncertainty have together given rise to high rates of maternal employment. Labor force participation rates for mothers with children under age 18 increased nearly 60% from 1965 to 2000 (from 45 to 78%), with average hours of market work more than tripling in this same period (Bianchi 2011). Recent maternal labor force participation rates remain above 70% despite a sluggish economy (Department of Labor, 2013). Indeed, 40% of all households with children include mothers who are either the only or primary breadwinners (Pew Research Center 2013a). It is in this context that a wide range of studies has sought to examine the implications of maternal employment for child well-being. Bianchi (2000) sums up this vast literature thusly, “...given the effort that has been devoted to searching for negative effects of maternal employment on children’s academic achievement and emotional adjustment, coupled with the scarcity of findings (either positive or negative), it would appear that the dramatic movement into the labor force by women of childbearing age in the United States has been accomplished with relatively little consequence for children” (p. 401).

Compared to a number of studies examining links between maternal work and child well-being, few studies have taken mothers’ own emotional well-being as the object of study. Those that do focus on global or overall affect, not affect in parenting. Aassve and colleagues (2012) find reduced happiness among employed mothers across Europe, and Bertrand (2013) reports lower mean affect among employed college-educated mothers relative to their non-employed counterparts. A few studies provide insights into parents’ feelings about balancing work and parenting, pointing to a “never enough” feeling and guilt

for not spending enough time with children (Daly 2001), even controlling for how much time they actually spend with them (Milkie et al. 2004). Looking at descriptive evidence, results from recent Pew Research Center surveys indicate that 56% of employed mothers report that it is “very” or “somewhat” difficult to balance work and family. Additionally, 37% of mothers report “always” feeling rushed; this was more common among employed mothers than those who did not work outside the home. Employed mothers were more likely than the non-employed to say that they are doing an “excellent” or “very good” job at parenting (78% vs. 66%), but were less likely to say they are “very happy” (31% vs. 45%; Pew Research Center 2013b).

Although attention typically focuses on the potential challenges associated with maternal employment, we also know that work can be satisfying and rewarding and can provide financial and emotional security in uncertain economic times (Cooper 2014, Villalobos 2014). Indeed, with nearly 70% of mothers in the labor force and 40% of mothers serving as the primary or only family earner, mothers’ employment is critical to family well-being (Bianchi 2011). Garey’s qualitative study (1999) of how women weave work and motherhood finds many mothers report positive experiences—work provides fulfillment, an escape, connections outside of the family, and a chance to be a role model to children. The positive emotional benefits of the work itself and the family security it affords may spillover into parenting, making for more positive parenting experiences as well. We know very little about how employed and non-employed mothers differ in their everyday experiences with children: does pressure from work detract from time with children, or do activities outside the home make time with children more valuable? Intersections: Single Mothering by Employment Status

In addition to the main effects of both partnership status and employment noted above, these key demographic factors may interact when predicting mothers’ feelings while parenting. The potential conflicts between work and care may be more pronounced among single mothers, suggesting lower affect in time with children. Contrary to this notion, however, a set of recent studies documents *positive* associations between employment and well-being among disadvantaged mothers and their children. For example, Augustine (2014) finds that part-time and high status work is associated with better quality parenting for mothers with low levels of education, including (disproportionately) single mothers. Similarly, a series of studies examining the transition from welfare to work in the 1990s suggest neutral or slightly positive effects of single mothers’ employment on children (Chase-Lansdale et al. 2003; Gennetian and Miller 2002; Huston et al. 2001; Duncan et al. 2007; Johnson et al. 2012). Likewise, Harkness (2014) shows how single mothers’ mental health improved significantly more than that of partnered mothers when they entered paid work after the 1990s welfare reforms in the United Kingdom.

While employment is associated with positive outcomes for single-mother families, the corollary is also true: non-employment in single mother families is associated with particularly negative outcomes. Blank (2007) describes the plight of “hard to employ” single mothers and their children. Such mothers suffer from multiple disadvantages that make it difficult for them to find work and simultaneously negatively impact the financial and emotional well-being of them and their children. These disadvantages include low education,

learning disabilities, health problems, and a history of domestic violence or substance use. Augustine (2014) finds that non-employed mothers with low levels of education reported the lowest levels of parenting quality, highlighting how lack of access to work may compound their disadvantage. Together, these streams of research suggest that the advantages of maternal work among single mothers should be associated with better affective experiences in time with children.

Potential Confounders

A number of person-level and activity-specific features may confound associations between mothers' partnership and employment status and their feelings in time with children. At the person level, sleep and leisure are restorative (Smith-Coggins et al. 1994; Munakata et al. 2000) and may benefit mothers' experiences in parenting. Access to sleep and leisure vary by mothers' partnership and employment status. Single mothers get more minutes of sleep than partnered mothers on average, though they are more likely to go to bed after midnight and to experience sleep interruptions for caregiving (Burgard and Ailshire 2013). A robust literature links maternal employment to mothers' reduced sleep (Bianchi 2000; Kalil et al. 2014b). Both single and employed mothers face leisure constraints (Bianchi 2000; Jackson and Henderson 1995); compared to those who were not employed, employed women also experience more fragmented free time and less "pure" leisure with no children present (Mattingly and Bianchi 2003).

At the activity level, solo care or parenting alone may be a key consideration. Such parenting can be more stressful and difficult than parenting with another adult (Folbre et al. 2005; Blair-Loy 2003). Kalil and colleagues (2014a) show that single mothers engage in a substantially higher proportion of solo care than partnered mothers. Non-employed mothers spend more time with their children overall relative to employed mothers, and they likely engage in more solo parenting as well.

Employed and partnered mothers differ on many other dimensions from those who are not in the labor force and those who are single. Non-employed and single mothers are less educated and have lower household income, and are more likely to be non-white, than employed and married mothers (U.S. Census Bureau, 2013). Our analyses account for these and other person-level characteristics that are associated with well-being, including mothers' education, age, race and ethnicity, family income, whether there is another earner in the household, the number of household children, and the age of youngest child. Activity-level controls include the type of activity reported, and its location, duration, and time of day, as well as the total time spent with children in the diary day prior to the indexed activity.

Summary

Prior literature suggests that parenting may be a mixed bag of joys and strains, yet we know little about how parents feel in their everyday experiences with children. Contemporary trends have resulted in substantial increases in single parenthood and employment for women – two demographic dimensions that hold potential importance for shaping the context and experience of parenting. Our study examines how both partnership and

employment status (independently and interactively) are associated with shifts in the valence of mothers' experiences with children in a broad range of everyday parenting activities.

Data, Measures, and Methods

We pool data from the 2010, 2012, and 2013 American Time Use Surveys (Hofferth et al. 2013). ATUS sample members are drawn from Current Population Survey (CPS) respondents. One individual aged 15 or older per former CPS participating household is invited to participate in the ATUS during the two to five months following their exit from the CPS.¹ The ATUS is a time diary study of a nationally representative sample of Americans. ATUS respondents report on their activities over a 24-hour period from 4:00 a.m. of a specified day until 4:00 a.m. of the following day, indicating the type of activity, as well as where, when, and with whom it occurred.² Responses are recorded using Computer Assisted Telephone Interview procedures. Activities are coded using a six-digit, three-tier coding system, and over 400 activity categories are represented by the classification. Data are collected every day of the week, including holidays, with weekends oversampled. 50% of diaries are about weekend days (25% each), and 50% are about weekdays (10% each day).

Critical to our analysis, the 2010, 2012 and 2013 rounds of the ATUS included a Subjective Well-Being Module of questions tapping respondents' emotions in activities. All ATUS respondents were eligible for participation in the module, and there was minimal nonresponse (ATUS 2014). Participants reported how they felt in three randomly selected activities of at least five minutes in duration. 34,565 men and women ages 15 and older completed the module over the three ATUS cycles, for a total of 102,633 activities. Sleeping, grooming, and personal activities as well as activities where the respondent didn't know or refused to report what they were doing were not eligible for selection.

All descriptive statistics are weighted to account for the oversample of weekends and other aspects of the ATUS sample design. Activity weights for the well-being module further account for differences in the fraction of time in eligible activities and the probability of having an eligible activity selected (ATUS 2014, pp. 5–6).

Modeling Approach

We limit our sample to the parenting activities of mothers ages 21–55 with children under 18 in the household. As noted at the outset, our treatment of parenting is inclusive of any activity mothers report doing with children, as indicated by their response to the “who with” question that follows each diary entry. In all, the subjective well-being sample of the ATUS includes 19,264 women; 7,074 are ages 21–55 and have a child under 18 in the household. We excluded 1,371 cases (19% overall; or 13% among non-employed and 22% among employed mothers; 25% among single and 17% among partnered mothers) for whom there

¹Some studies have shown that respondents in the ATUS differ from non-respondents on reports of pro-social behaviors (e.g. Abraham et al. 2009). Those who volunteer, for example, are also more likely to respond to surveys like the ATUS leading to inflated national estimates of volunteering. Abraham et al. (2009) found that while non-response can have a significant effect on the univariate distribution of pro-social activities, it does not appear to affect inferences about the respondent characteristics that are associated with those activities.

²Information on where and with whom the activities occurred is available for all activities except for personal care and sleeping.

were no activities with children among the three randomly selected for inclusion in the well-being module. Note that although a fifth of mothers had no activity with children in the well-being module, less than 4% overall (2% among non-employed and 5% among employed mothers; 7.5% among single and 2.5% among partnered mothers) reported no activities with children throughout the diary day. Finally, we drop cases that are missing one or more well-being reports. This leaves us with 5,683 women reporting 11,512 activities with children. Thirty-one percent of our sample is with children during one of the well-being module activities, 36% is with children during two activities, and 33% is with children during all three selected activities.

We use methods that account for the multilevel nature of our data, in which activities at level one are nested within individuals at level two (Allison 2009). Our outcomes—multiple dimensions of affect—are scored 0–6 and treated as quantitative variables. We rely on random effect models (also called multilevel or mixed models in the literature, estimated using *xtreg*, *robust re* in Stata for quantitative response variables). The basic model can be written:

$$y_{ij} = \gamma_{00} + \gamma_1 X_{ij} + \gamma_2 Z_j + v_{0j} + \varepsilon_{ij}$$

for activity i and individual j where v_{0j} is a person-specific random error term representing unobserved characteristics of individual j and assumed independent of X 's (activity-level covariates) and Z 's (person-level covariates).

Random effect models yield a weighted average of within- and between-level estimates, with the advantage of providing estimates for characteristics that are invariant across activities. Thus, we can assess the association between emotions in various activities with children, accounting for characteristics of *individuals* that structure the day to day like employment and partnership status as well as the micro-level context of parenting *activities* like whether they were parenting solo or with another adult.

For each of our five outcomes, we estimate three models: first we include only the indicators for partnership status, employment, and the interaction between the two to get baseline estimates of the linkages between these characteristics and feelings while parenting. Next, we add a series of exogenous controls. Finally, we add a set of endogenous measures that may themselves be influenced by partnership status or employment and therefore may mediate linkages between these characteristics and feelings while parenting.

Feelings in Parenting

For any activity in which a mother reports being with children, we assess feelings in parenting on the basis of five questions, asked for each of up to three sampled activities with children: 1) How *happy* did you feel during this time? 2) How *meaningful* did you consider what you were doing? 3) How *sad* did you feel during this time? 4) How *stressed* did you feel during this time? 5) How *tired* did you feel during this time? For each of these questions, response options ranged from 0 (e.g., not at all happy, not at all meaningful) to 6 (e.g., very happy, very meaningful). Given the skew in some feelings in parenting, we also

tested a dichotomous treatment using *xtlogit* where each emotion (happiness, meaning, sadness, stress and fatigue) was coded as present (=1) at the point where 60% or greater of respondents reported it for a sampled activity. All of our main findings were robust to this alternate approach (results available upon request).

This set of questions captures critical dimensions of affect. Russell's (1980) model of core affect suggests four types of core emotions: positive low arousal (e.g. contentment), positive high arousal (e.g. happiness), negative low arousal (e.g. sadness), and negative high arousal (e.g. stress). Three of these types are captured by happiness, sadness and stress. Although the ATUS does not include an indicator for positive, low arousal emotions, psychometric research indicates that positive emotions highly correlate with each other, minimizing the need for multiple indicators (Kapteyn et al. 2013). Negative emotions are often not highly correlated, and thus an additional indicator is included for fatigue (negative, low arousal). Finally, meaning taps a purpose-related dimension, which Stone and Mackie (2013) argue is important because it often crosses the positive-negative dimension. For example, one can find pleasure but little meaning in watching TV or meaning but little pleasure in reading the same book repeatedly to a child. Compared to single-item assessments that characterize much of the existing literature on parenting and emotional well-being, happiness, meaning, sadness, stress, and fatigue offer a broad and multi-dimensional view of emotions in parenting.

Mothers' Employment and Partnership Status

To assess *mothers' employment status* we include an indicator for whether the respondent is employed. Before arriving at this simple indicator, we tested a finer-grained employment measure differentiating no market work, part-time work (<35 weekly hours), full-time work (35–49 weekly hours), and more than full-time work or long work hours (50+ weekly hours). These tests indicated differences in mothers' emotions in parenting between those who are employed and those who are not, but no statistically significant differences among categories of employment intensity. Therefore, we proceed with the simple indicator for employed.

To assess *mothers' partnership status* we include an indicator for whether the respondent is single (not married or cohabiting). Like our initial treatment of employment status, we started with a more complex measure differentiating families with: two parents with only joint children, two parents in complex families, a single mother as the only adult, a single mother and a grandparent, and a single mother with another non-partner adult. These initial analyses indicated differences in mothers' emotions in parenting between those in two parent and single mother families, but no statistically significant differences among the single-mother family types. Therefore, we retain the simple indicator for single-versus partnered mothers. To assess variation in the valence of single mothers' emotions in parenting by their employment status, we interact "single parent" with "employed."

Controls

We control for a rich set of person- and activity-level variables in our models; descriptive statistics for these measures are shown in Appendix Table 1. We add controls in two steps,

starting with basic socio-demographic characteristics of mothers and features of their diary days and activities. At the person level, these include age in years, race/ethnicity (non-Hispanic White, non-Hispanic Black, Hispanic, other), whether the respondent has a college degree, whether she is currently enrolled in school, number of children (one, two, three or more), age of youngest child (under six, 6–12, and 13–18), season of the diary report (winter, spring, summer, fall), and whether the diary was reported on a weekend day. At the activity-level, these include whether the activity took place at home or elsewhere, activity duration in minutes, and the time of day (4 to 9am, 9am to 2pm, 2 to 5pm, 5 to 9pm, and 9pm to 4am).

Our second set of controls is potentially more endogenous to the processes linking employment and partnership status to feelings in mothering. At the person level, this set includes family income (<\$25,000, \$25,000–74,999, > = \$75,000, missing) and whether there is another earner in the household. It also includes two indicators of sleep and three indicators of leisure: *Total hours of sleep* is a continuous variable that registers the number of hours mothers report sleeping on the diary day. *Disrupted sleep* is a dichotomous indicator for three or more sleep episodes. *Total hours of leisure* is measured analogous to total hours of sleep, above. *Episodes of leisure* is a count variable indicating how many distinct leisure activities are reported on the diary day. Finally, *total hours of leisure with children only* indicates how many hours of a mother's leisure is potentially “contaminated” by child-related responsibilities with no other adult present (e.g., Mattingly and Bianchi 2003). At the activity-level, we control for solo parenting (using the “who with” questions to assess whether the respondent engaged in the parenting activity without another adult present) and the hours mothers reported with children (in any activity) prior to the indexed activity. We also control for a total of 14 activity types (following activity coding in Aguiar and Hurst 2007; Kahneman et al. 2004; Kalil et al. 2012): *market-work*, *carework* (exclusive of childcare), *cooking*, *cleaning*, *shopping*, *other non-market work*, *television watching*, *socializing*, *education/religious events*, *eating*, *basic childcare*, *playing with children*, *teaching children*, and *managing children's activities and schedules*.

Results

In what follows, we describe results in Tables 1 and 2 and Figure 1. These results highlight patterns of mothers' activities with children, their feelings in these activities, and how patterns in mothering experiences vary by partnership status, employment, and the intersection between these two key demographic features of mothers' lives.

Table 1 shows significant bivariate differences in feelings in mothering by employment and partnership status. Employed mothers are less sad but more fatigued in time with children than non-employed mothers. Single mothers are less happy and more sad, stressed and fatigued than partnered mothers. In our sample of mothers in activities with children, 63% of mothers are employed and 77% are partnered.

Table 2 shows Generalized Linear Models (GLM) with random effects predicting each of the five emotions in activities with children. We present coefficients on our key measures of interest—employed, single parent, and single parent by employed—across three models.

Model 1 includes mother's employment status, partnership status, and the interaction between employed and single parent status. The omitted category in this and all models is non-working partnered mothers. Model 2 adds controls for basic socio-demographic characteristics of mothers and features of their diary days and activities. Model 3 augments Model 2 to include controls for factors that are potentially endogenous to employment, partnership status, and feelings in parenting activities. Appendix Table 2 shows full results for our final model.

Across the three models for each of the five emotions in parenting, coefficients on our key measures of interest change very little. This suggests our basic findings are robust to a rich set of socio-demographic controls and factors we hypothesized would account for associations between employment, single motherhood, and feelings in activities with children. We observe small changes in coefficient magnitude in a few cases, but in only one case do we see that significant associations in Model 1 are no longer statistically significant with the inclusion of controls: the relatively small, negative association between being employed (which represents employed, partnered mothers in the model) and lowered happiness in activities with children is reduced and no longer significant with the inclusion of socio-demographic controls in Model 2. In models of fatigue, the coefficient for employed (again representing employed, partnered mothers in the model) is reduced nearly 40% between Models 1 and 3 with the inclusion of endogenous controls like sleep and leisure, but remains significant. In a few other cases, significant patterns emerge after the inclusion of controls; the relatively large coefficients for non-employed (representing non-employed, single mothers) predicting happiness (negative) and stress (positive) increase about 20% each between Models 1 and 2, when we include socio-demographic measures. Despite these few subtle changes in coefficient magnitude across models, the larger story is the overall robustness of initial associations to this rich and varied set of person- and activity-level controls. Of nine initially significant associations between our key measures of interest and emotions in activities with children, only one is fully mediated by any of our control measures, and in that case, the association was relatively small to begin with.

In our full model (Model 3), the estimated main effect of employment is statistically significant only for fatigue, whereas the estimated main effect of single parenthood is statistically significant for all outcomes but meaning. The interaction between these two dimensions indicates important variation; it is statistically significant for all outcomes but meaning and fatigue. We show predicted values to facilitate comparisons across employment-partnership combinations. Figure 1 plots predicted levels of each emotion in time with children, setting all categorical controls to their modal categories and holding all continuous variables at their weighted mean values.

Panel A shows that while all groups report high levels of happiness in time with children (unadjusted mean=4.77, SD=1.43, from Appendix Table 1), non-employed single mothers report the lowest levels of happiness in parenting, significantly lower than employed single mothers and partnered mothers regardless of employment status. The happiness disadvantage for non-employed, single mothers is approximately one-quarter of a standard deviation compared to partnered mothers of either employment status (e.g., $[4.587 - 4.242]/1.43 = 0.241$) and 13 percent of a standard deviation compared to employed, single mothers

($[4.425 - 4.242]/1.43 = 0.128$). While employed single mothers are better off than non-employed single mothers in terms of happiness in parenting, they register a significant happiness disadvantage equivalent to about 10 percent of a standard deviation in parenting activities relative to partnered mothers of either employment status (e.g., $[4.587 - 4.425]/1.43 = 0.113$). Interestingly, partnered mothers' happiness in activities with children does not differ based on employment status.

Panel B reveals high levels of meaning in time with children and no significant differences by employment or partnership status. Panel C shows that overall, mothers report low levels of sadness in time with children (unadjusted mean=0.45, SD=1.19). However, non-employed single mothers report significantly higher levels of sadness in activities with children – about one-third of a standard deviation higher – compared to mothers in the other three groups (e.g., $[0.738 - 0.370]/1.19 = 0.309$). Employed single mothers and partnered mothers (employed or not employed) do not differ significantly from each other in their reports of sadness in activities with children.

Panel D shows predicted levels of stress in time with children. Again, across the four groups, levels of stress in time with children are relatively low (unadjusted mean=1.35, SD=1.74). Much like the findings for happiness, non-employed single mothers experience significantly higher levels of stress with children than any of the other mothers, from one-third of a standard deviation compared to employed partnered mothers ($[1.637 - 1.085]/1.74 = 0.317$) to one-fifth of a standard deviation compared to employed single mothers ($[1.637 - 1.267]/1.74 = 0.213$). Employed single mothers also register significantly more stress, about 10 percent of a standard deviation, than partnered mothers of either employment status (e.g., $[1.267 - 1.085]/1.74 = 0.105$). Partnered mothers who are employed do not differ from those who are not employed in their levels of stress when parenting.

Panel E shows predicted levels of fatigue in mothers' time with children (unadjusted mean=2.59; SD=1.96). All groups report higher levels of fatigue in parenting than do non-employed partnered mothers, up to 14 percent of a standard deviation in fatigue (e.g., $[3.377 - 3.104]/1.96 = 0.139$). There are no other employment or partnership differences in fatigue, indicating that, while employment and single parenting are both associated with higher levels of fatigue in time with children, there is not an additional detriment for mothers who are both single and employed.

Supplemental Analysis and Findings

The relative disadvantage of non-employed single mothers across many emotions motivated supplemental analysis to examine the *overall* well-being of non-employed single mothers. We compared their emotions to those of other mothers in activities other than parenting. We found that non-employed single mothers are emotionally worse off than other mothers across most activities. We also compared non-employed single mothers' emotions in parenting to their emotions in other activities. Results indicate that, while non-employed single mothers are particularly disadvantaged emotionally, they are better off in parenting than in other activities (results available upon request). These findings suggest that non-employed single mothers fare poorly overall in well-being, and that their lower assessments are not specific to time with children.

Conclusion and Discussion

In this study we examined mothers' feelings while parenting and tested if and how the experiences of single motherhood and maternal employment shift the valence of these feelings. We found that employed mothers are more fatigued than non-employed mothers. Further, single mothers are less happy and more sad, stressed, and fatigued in parenting than partnered mothers, although these detriments are larger and more consistent among non-employed single mothers. In particular, non-employed single mothers fare significantly worse than employed single mothers and partnered mothers in happiness, sadness and stress in time with children, and experience feelings of fatigue on par with employed mothers. They do not differ, however, in feelings of meaning in time with children—the one emotional indicator that did not vary across sub-groups.

Surprisingly, our large, rich set of control measures did little to account for the initial associations between employment, partnership status, and emotions in mothering. Thus, single mothers, especially non-employed single mothers, experience significant emotional detriments in parenting compared to other mothers even after accounting for key socio-demographic differences and factors that we posited would be endogenous, such as sleep and leisure, solo parenting, and family income. Our supplemental analysis found that non-employed single mothers are generally worse off emotionally than other mothers; nonetheless, they fare better emotionally in parenting than in other activities. Thus, the well-being disadvantages observed by non-employed single mothers in our sample are not specific to their parenting role but rather likely reflect larger challenges faced by this sub-population (Blank 2007). The economic and social disadvantages faced by this group combined with our new insights on their emotional detriments in parenting highlight the need to better understand this group of mothers.

Our generally positive findings with regard to employment and emotional well-being in time with children are inconsistent with familiar accounts of maternal work creating a time bind that results in a “never enough” feeling (Daly 2001). Of the emotions we examined, prior literature suggested that stress in parenting could be particularly affected by combining the mother and worker roles (Milkie et al. 2004; Garey 1999). However, we did not find higher levels of stress among employed mothers; in fact, we found low levels of stress in parenting overall across all mothers in our sample. Only in fatigue do we see a detriment to employed mothers compared to those who are not employed. When viewed from the perspective of what employment brings to mothers and mothering instead of what it takes, the relatively positive findings with regard to employed mothers' feelings in parenting are not surprising. Maternal employment provides financial security, particularly crucial in single-mother families. The insecure economic context that characterizes our study period, 2010 to 2013, likely further heightens the salience of employment for emotional well-being. Maternal employment may also bring fulfillment and exposure to a social network outside of the family (Garey 1999; Blair-Loy 2003), and these networks may serve as a source of ideas about parenting and social support (Augustine, 2014), an advantage that could be especially important for single mothers who do not benefit from the support of a residential co-parent.

Our study considered multiple dimensions of emotions in parenting, extending past work that focused on one or a few indicators like happiness or satisfaction. In doing so we

revealed variation in emotions as they relate to employment and partnership status. For example, we learn that employment shifts the valence of fatigue in parenting, whereas single parenthood shifts the valence of happiness and, to a lesser degree, stress. Interestingly, we find no significant variation in meaning in time with children across mothers' employment and partnership status; all mothers reported high levels of meaning regardless of these factors. Given the measurement literature on affect (Stone and Mackie 2013) and the substantive literature on parenting as a source of purpose (Edin and Kefalas 2005), our finding that parenting is a meaningful activity overall, regardless of employment and partnership status, is a key contribution to the literature on parenting and emotional well-being.

Overall, then, this study advances the literature on single-parenthood, employment and parenting in several ways. Utilizing multiple dimensions of feelings in everyday parenting, measured in a way that captures a wide range of parenting activities, we find overall high levels of positive emotion and low levels of negative emotion in parenting. We identify unique emotional disadvantages in parenting for non-employed single mothers compared to other mothers, but also that non-employed single mothers are emotionally disadvantaged in activities beyond parenting, too. Further, we find very few negative associations between employment and mothers' feeling in time with children. These findings add emotional well-being in parenting to the growing list of potential benefits of maternal employment to children, parents, and families. These positive associations are especially important to recognize and document in the context of increasing rates of female breadwinner families and persistently high levels of single-mother households.

Acknowledgments

We gratefully acknowledge support from the Minnesota Population Center (R24HD041023) the Data Extract Builder of the American Time Use Survey (University of Maryland, R01HD053654; University of Minnesota, Z195701), both funded through grants from the Eunice Kennedy Shriver National Institute for Child Health and Human Development (NICHD); the Cornell Population Center, and Cornell's Institute for Social Sciences.

Appendix

Appendix Table 1

Means (SDs) and Percentages of Activity- and Person-Level Characteristics of Mothers Participating in Activities with Children

Activity-level	
Subjective Well-Being (mean)	
Happiness	4.77
SD	(1.43)
Meaningfulness	4.89
SD	(1.61)
Sadness	0.45
SD	(1.19)
Stress	1.35
SD	(1.74)

Fatigue	2.59
SD	(1.96)
Type (%)	
Market work	2.00
Carework (excluding childcare)	0.84
Cooking	6.65
Cleaning	6.03
Shopping	7.06
Other Non-Market Work	2.12
Television Watching	16.12
Socializing	14.54
Education/Religion	3.41
Eating (also self care and using services)	14.90
Basic Childcare	10.97
Play Childcare	5.83
Teaching Childcare	3.91
Management Childcare	5.63
Location (%)	
Public	33.92
Home	66.08
Minutes in Activity (mean)	102.26
SD	(106.32)
Hours with Child Prior to Activity (mean)	5.43
SD	(3.52)
Time of Day (%)	
4–9am	9.71
9am–2pm	27.21
2–5pm	20.95
5–9pm	33.39
9pm–4am	8.74
N (activities)	11512
Person-level	
Age (mean in Years)	36.18
SD	(7.8)
Race (%)	
Non-Hispanic White	61.04
Non-Hispanic Black	10.84
Hispanic	21.43
Other	6.69
College Graduate (%)	36.52
Enrolled in School ^I (%)	7.25
Employment Status (%)	
Not Employed	37.25

Employed	62.75
Family Structure (%)	
Partnered parent	76.86
Single parent	23.14
Number of children in the HH (%)	
1	36.84
2	41.07
3+	22.09
Age of Youngest Child (%)	
<6 years	52.54
6–12 years	32.98
13+ years	14.48
Weekend diary day (%)	29.47
Season of diary day (%)	
winter	24.40
spring	26.01
summer	23.43
fall	26.16
Sleep	
Hours (mean)	8.69
SD	(1.97)
3+ Episodes (%)	18.75
Leisure	
Total Hours (mean)	6.05
SD	(3.19)
Number of Episodes (mean)	7.24
SD	(3.64)
Total Hours with Children Only (mean)	1.67
SD	(2.12)
Family Income (%)	
<\$25,000	22.17
\$25,000–\$74,999	54.74
>\$75,000	22.09
Missing	1.00
Solo Parenting (%)	52.04
Other earner (incl partner) in HH (%)	65.20
N (persons)	5683

¹Percentage is only for women to age 49.

Note: 2010, 2012, 2013 ATUS Subjective Well-Being sample, mothers ages 21–55 with children under age 18 in the household. N's are unweighted; means/percentages are weighted

Appendix

Appendix Table 2

Full Generalized Linear Models with Random Effects of Mothers' Feelings in Activities with

	Happiness	Meaning	Sadness	Stress	Fatigue
Key Measures of Interest	M3	M3	M3	M3	M3
Employment Status					
Not Employed (omitted)	—	—	—	—	—
Employed	−0.035	0.012	−0.036	−0.008	0.145 [*]
Parentship Status					
Partnered (omitted)	—	—	—	—	—
Single	−0.345 ^{***}	−0.118	0.368 ^{***}	0.544 ^{***}	0.273 [*]
Interaction					
Employed × Single	0.218 [*]	0.075	−0.301 ^{***}	−0.362 ^{**}	−0.167
Controls (step one)					
Age	−0.006	0.002	0.011 ^{***}	0.008 [*]	−0.003
Race					
Non-Hispanic White (omitted)	—	—	—	—	—
Non-Hispanic White	0.000	0.000	0.000	(0.000)	(0.000)
Non-Hispanic Black	0.083	0.249 ^{***}	0.015	−0.287 ^{***}	−0.230 ^{**}
Hispanic	0.286 ^{***}	0.354 ^{***}	0.142 ^{**}	−0.044	−0.260 ^{***}
Other	0.168 ^{**}	0.243 ^{**}	0.101	−0.137	−0.336 ^{***}
Education					
Not a College Graduate (omitted)	—	—	—	—	—
College Graduate	−0.094 [*]	−0.193 ^{***}	−0.069 [*]	0.033	0.004
School Enrollment					
Not Enrolled (omitted)	—	—	—	—	—
Enrolled in School	−0.073	0.032	−0.028	0.191 [*]	0.301 ^{***}
Age of Youngest Child					
<6 (omitted)	—	—	—	—	—
6–12	−0.046	0.030	0.013	−0.057	−0.040
13+	0.049	0.054	−0.019	−0.116	−0.091
Number of Children in HH					
One (omitted)	—	—	—	—	—
Two	−0.112 ^{**}	0.019	0.011	0.143 ^{**}	0.030
Three or more	−0.184 ^{***}	0.060	−0.044	0.234 ^{***}	−0.033
Season					
Winter (omitted)	—	—	—	—	—
Spring	−0.051	−0.038	0.042	0.042	0.068
Summer	−0.057	−0.007	0.007	0.027	0.032
Fall	−0.019	0.003	0.038	0.081	0.048
Diary Day					

	Happiness	Meaning	Sadness	Stress	Fatigue
	M3	M3	M3	M3	M3
Key Measures of Interest					
Weekday (omitted)	—	—	—	—	—
Weekend	0.050	−0.090 *	0.010	−0.063	−0.134 **
Location					
Public (omitted)	—	—	—	—	—
Home	−0.070	0.024	0.044	0.111 *	0.210 ***
Minutes in Activity	0.000	0.002 ***	0.000	0.001 ***	−0.000
Time of Day					
4–9am (omitted)	—	—	—	—	—
9am–2pm	0.154 ***	−0.024	−0.076 *	−0.049	−0.194 ***
2–5pm	0.026	−0.079	0.002	0.117 *	0.093
5–9pm	0.076	0.012	−0.010	0.002	0.498 ***
9pm–4am	−0.030	0.045	0.006	0.132	1.205 ***
Controls (step two)	M3	M3	M3	M3	M3
Income					
<\$25,000 (omitted)	—	—	—	—	—
\$25,000–\$74,999	−0.141 **	−0.136 *	−0.092 *	−0.037	−0.037
>\$75,000	−0.215 ***	−0.246 ***	−0.060	−0.014	−0.149
Missing	−0.354 *	−0.122	0.116	0.213	0.288
Other Earner in HH					
No (omitted)	—	—	—	—	—
Other Earner in HH	0.001	−0.048	−0.048	−0.048	−0.063
Sleep					
Total Hours	−0.001	−0.011	0.003	−0.052 ***	−0.068 ***
3+ Episodes	−0.178 ***	−0.051	0.113 **	0.184 ***	0.345 ***
Leisure					
Total Hours	−0.003	−0.019 *	0.004	−0.033 ***	−0.035 ***
Number of Episodes	−0.010	−0.008	−0.007	0.013	−0.009
Total Hours with Children Only	−0.017 *	−0.002	0.006	0.009	−0.014
Solo Parenting					
No (omitted)	—	—	—	—	—
Yes	−0.099 **	−0.185 ***	0.018	0.125 ***	0.046
Hours with Child Prior to Activity	0.000	−0.014 *	−0.009 *	−0.021 **	0.020 *
Activity Type					
Market work	−0.264 *	0.454 **	0.081	0.884 ***	−0.244
Carework (excluding childcare)	0.019	0.366	0.317 *	0.305	−0.034
Cooking	−0.130	0.688 ***	0.038	0.387 ***	−0.107
Cleaning	−0.547 ***	−0.099	0.213 ***	0.488 ***	0.202 *
Shopping	−0.174 *	0.252 **	0.151 *	0.644 ***	−0.080
Other Non-Market Work	−0.141	0.347 **	0.179 *	0.677 ***	−0.051
Socializing	0.219 **	0.793 ***	0.027	0.167 *	−0.258 **
Education/Religion	0.160	1.103 ***	0.136	0.422 ***	−0.281 *

	Happiness	Meaning	Sadness	Stress	Fatigue
Key Measures of Interest	M3	M3	M3	M3	M3
Eating (also self care and using services)	0.204 ***	0.946 ***	-0.012	0.272 ***	-0.173 *
Basic Childcare	0.128 *	1.246 ***	-0.011	0.380 ***	0.071
Play Childcare	0.699 ***	1.582 ***	-0.142 *	-0.043	-0.300 **
Teaching Childcare	0.287 ***	1.533 ***	-0.049	0.279 **	-0.224 *
Management Childcare	-0.037	0.882 ***	0.155 *	0.541 ***	-0.225 *
Constant	5.277 ***	4.388 ***	0.020	1.064 ***	3.259 ***
sigma_u	0.948	1.048	0.916	1.260	1.391
sigma_e	1.038	1.216	0.759	1.166	1.261
rho	0.455	0.426	0.593	0.539	0.549

p<0.001,

**
p<0.01,

*
p<0.05

N Observations (activities) = 11,512; N Observations (women) = 5,683

References

- Aassve A, Goisis A, Sironi M. Happiness and childbearing across Europe. 2012; 108(1):65–86.
- Abraham KG, Helms S, Presser S. How social processes distort measurement: The impact of survey nonresponse on estimates of volunteer work in the United States. *American Journal of Sociology*. 2009; 114(4):1129–1164.
- Aguiar M, Hurst E. Measuring trends in leisure: The allocation of time over five decades. *The Quarterly Journal of Economics*. 2007; 122(3):969–1006. DOI: 10.1162/qjec.122.3.969
- Allison, PD. Fixed effects regression models. Newbury Park, CA: Sage; 2009.
- Amato P. Children's adjustment to divorce: Theories, hypotheses and empirical support. *Journal of Marriage and Family*. 1993; 55(1):23–38.
- Amato P. The consequences of divorce for adults and children. *Journal of Marriage and Family*. 2000; 62(4):1269–1287.
- Augustine JM. Mothers' employment, education and parenting. *Work and Occupations*. 2014; 41(2): 2237–270.
- ATUS. American Time Use Survey (ATUS) Data Dictionary: 2010, 2012, and 2013 Well-being Module Data Variables collected in the ATUS Well-being Module. 2014. https://www.atusdata.org/atus/linked_docs/WB_Module_Codebook.pdf. Accessed 27 April 2015.
- Beck AN, Cooper CE, McLanahan S, Brooks-Gunn J. Partnership Transitions and Maternal Parenting. *Journal of Marriage and Family*. 2010; 72(2):219–233. [PubMed: 21423848]
- Bertrand M. Work on women's work is never done: Career, family and the well-being of college educated women. *American Economic Review: Papers and Proceedings*. 2013; 103(3):244–250.
- Bianchi SM. Maternal employment and time with children: Dramatic change or surprising continuity? *Demography*. 2000; 37(4):401–414. [PubMed: 11086567]
- Bianchi, Suzanne. Change and time allocation in American Families. *ANNALS of the American Academy of Political and Social Science*. 2011; 638:21–44.
- Bianchi S, Milkie M, Sayer L, Robinson J. Is Anyone Doing the Housework? Trends in the Gendered Division of Labor. *Social Forces*. 2000; 79(1):191–229.
- Blair-Loy, M. *Competing devotions: Career and family among women executives*. Cambridge, MA: Harvard University Press; 2003.
- Blank R. Improving the Safety Net for Single Mothers Who Face Serious Barriers to Work. *The Future of Children*. 2007 Fall;17(2):183–197. 2007. [PubMed: 17902266]

- Brown, Peter, Cerin, Ester, Warner-Smith, Penny. The Work-Life Tensions Project. A perspective on how dual-earner parents experience time in Australia. In: Fontaine, Anne Marie, Matias, Marisa, editors. *Family, Work & Parenting: International Perspectives*. Legis Editora; Porto, Portugal: 2008. p. 47-64.
- Burgard S, Ailshire J. Gender and time for sleep among U.S. adults. *American Sociological Review*. 2013; 78(1):51–69. [PubMed: 25237206]
- Carlson M, Berger L. What Kids Get from Parents: Packages of Parental Involvement across Complex Family Forms. *Social Service Review*. 2013; 87(2):213–249. [PubMed: 24644373]
- Cawley J, Liu F. Maternal employment and childhood obesity: A search for mechanisms in time use data. *Economics and Human Biology*. 2012; 10:352–364. [PubMed: 22790446]
- Chase-Lansdale PL, Moffitt R, Lohman B, Cherlin A, Coley R, Pittman L, et al. Mothers' transitions from welfare to work and the well-being of preschoolers and adolescents. *Science*. 2003; 299:1548–1552. [PubMed: 12624259]
- Child Trends. Indicators on Children and Youth: Family Structure. Child Trends Databank Updated. 2015. Updated March 2015. Accessed April, 15 2015 from: http://www.childtrends.org/wp-content/uploads/2014/07/59_Family_Structure.pdf
- Connelly R, Kimmel J. If you're happy and you know it: How do mothers and fathers in the us really feel about caring for their children? *Feminist Economics*. 2015; 21(1):1–34.
- Cooper C, McLanahan S, Meadows S, Brooks-Gunn J. Family structure transitions and maternal parenting stress. *Journal of Marriage and Family*. 2009; 71(3):558–574. [PubMed: 20046951]
- Cooper, M. *Cut Adrift: Families in Insecure Times*. University of California Press; Berkeley, CA: 2014.
- Daly KJ. Deconstructing family time: From ideology to lived experience. *Journal of Marriage and Family*. 2001; 63:283–294.
- Deaton A. The Financial Crisis and the Well-being of Americans. *Oxford Economic Papers*. 2012; 64(1):1–26. [PubMed: 22389532]
- Deaton A, Stone A. Two Happiness Puzzles. *The American Economic Review*. 2013; 103(3):591–97. [PubMed: 25110356]
- Department of Labor. Labor Force Participation rates. 2013. accessed October 17, 2015 at: http://www.dol.gov/wb/stats/LForce_rate_mothers_child_76_12_txt.htm
- Duncan, GJ., Huston, A., Wisner, T. *Higher Ground: New Hope for the Working Poor and their Children*. New York: Russell Sage Foundation; 2007.
- Edin, K., Kefalas, M. *Promises I Can Keep: Why Poor Women put Motherhood before Marriage*. University of California Press; Berkeley, CA: 2005.
- Edin, K., Nelson, TJ. *Doing the Best I Can: Fatherhood in the Inner City*. University of California Press; Berkeley, CA: 2013.
- Evenson RJ, Simon R. Clarifying the Relationship between Parenthood and Depression. *Journal of Health and Social Behavior*. 2005; 46(4):341–58. [PubMed: 16433280]
- Folbre N, Yoon J, Finnoff K, Fuligni AS. By what measure? Family time devoted to children in the United States. *Demography*. 2005; 42(2):373–390. [PubMed: 15986991]
- Fox, B. *When Couples Become Parents: The Creation of Gender in the Transition to Parenthood*. University of Toronto Press; 2009.
- Garey, A. *Weaving Work and Motherhood*. Temple University Press; 1999.
- Gennetian LA, Miller C. Children and Welfare Reform: A View from an Experimental Welfare Program in Minnesota. *Child Development*. 2002; 73(2):601–620. [PubMed: 11949911]
- Glass J, Simon R, Andersson M. Parenthood and Happiness: Effects of Work-Family Reconciliation Policies in 22 OECD Countries. Under review. 2014
- Hansen T. Parenthood and Happiness: A Review of Folk Theories versus Empirical Evidence. *Social Indicators Research*. 2012; 108(1):29–64.
- Harkness S. The Effect of Employment on the Mental Health of Lone Mothers in the UK before and after New Labour's Welfare Reforms. Working paper. 2014
- Hofferth, S., Flood, SM., Sobek, M. American time use survey data extract system (Version 2.4) [Machine-readable database]. College Park, Maryland: Maryland Population Research Center,

- University of Maryland; Minneapolis, Minnesota: Minnesota Population Center, University of Minnesota; 2013.
- Huston AC, Duncan GJ, Granger R, Bos J, McLoyd VC, Mistry R, Crosby D, Gibson C, Magnuson K, Romich J, Ventura A. Work-based anti-poverty programs for parents can enhance the school performance and social behavior of children. *Child Development*. 2001; 72:318–336. [PubMed: 11280487]
- Jackson EL, Henderson KA. A Gender-Based Analysis of Leisure Constraints. *Leisure Sciences: An Interdisciplinary Journal*. 1995; 17(1):31–51.
- Johnson R, Kalil A, Dunifon R. Employment Patterns of Less-Skilled Workers: Links to Children's Behavior and Academic Progress. *Demography*. 2012; 49(2):747–772. [PubMed: 22246798]
- Kahneman D, Deaton A. High Income Improves Evaluation of Life but Not Emotional Well-being. *Proceedings of the National Academy of Sciences of the United States of America*. 2010; 107(38): 16489–93. [PubMed: 20823223]
- Kahneman D, Krueger AB. Developments in the measurement of subjective well-being. *The Journal of Economic Perspectives*. 2006; 20(1):3–24.
- Kahneman D, Krueger AB, Schkade DA, Schwarz N, Stone AA. A survey method for characterizing daily life experiences: The day reconstruction method. *Science*. 2004; 306(5702):1776–1780. DOI: 10.1126/science.1103572 [PubMed: 15576620]
- Kalil A, Dunifon R, Crosby D, Su J. Work hours, work schedules and sleep duration among mothers and their young children. *Journal of Marriage and Family*. 2014b; 76(5):891–904.
- Kalil A, Ryan R, Chor E. Time investments in children across family structures. *Annals of the American Academy of Political and Social Science*. 2014a; 654:150–16.
- Kalil A, Ryan R, Corey M. Diverging destinies: Maternal education and the developmental gradient in time with children. *Demography*. 2012; 49:1361–1383. [PubMed: 22886758]
- Kapteyn, A., Lee, J., Tassot, C., Vonkova, H., Zamorro, G. Dimensions of subjective well-being. Playa Vista, CA: Dornsife Center for Economic and Social Research; 2013. CESR working paper series, paper n. 2013–05
- Latshaw BA, Hale SI. The Domestic Hand-off: Stay-at-home Fathers' Time Use in Female Breadwinner Families. *Journal of Family Studies*. (forthcoming).
- Lucas RE, Clark AE, Georgellis Y, Diener E. Unemployment Alters the Set Point for Life Satisfaction. *Psychological Science*. 2004; 15(1):8–13. [PubMed: 14717825]
- Margolis R, Myrskylä M. A Global Perspective on Happiness and Fertility. *Population and Development Review*. 2011; 37(1):29–56. [PubMed: 21714198]
- Mattingly M, Bianchi S. Gender differences in the quantity and quality of free time: The U.S. experience. *Social Forces*. 2003; 81(3):999–1030.
- McLanahan S, Adams J. Parenthood and Psychological Well-Being. *Annual Review of Sociology*. 1987; 13:237–57.
- McLanahan S, Beck AN. Parental Relationships in Fragile Families. *Future of Children*. 2010; 20(2): 17–37. [PubMed: 20964130]
- McLanahan S, Tach L, Schneider D. The causal effects of father absence. *Annual Review of Sociology*. 2013; 39:399–427.
- Milkie MA, Mattingly MJ, Nomaguchi K, Bianchi SM, Robinson JP. The time squeeze: Parental statuses and feelings about time with children. *Journal of Marriage and Family*. 2004; 66:739–61.
- Munkata M, Ichii S, Nunokawa T, Saito Y, Ito N, Fukudo S, Yoshinaga K. Influence of night shift work on psychologic state and cardiovascular and neuroendocrine responses in healthy nurses. *Hypertension Research*. 2001; 24(1):25–31. [PubMed: 11213026]
- National Research Council. The subjective well-being module of the American time use survey: Assessment for its continuation. Washington, DC: The National Academies Press; 2012. Panel on Measuring Subjective Well-Being in a Policy-Relevant Framework. Committee on National Statistics, Division of Behavioral and Social Sciences and Education
- Nelson, M. Parenting Out of Control: Anxious Parents in Uncertain Times. New York University Press; 2010.

- Nelson SK, Kushlev K, Lyubomirsky S. The pains and pleasures of parenting: When, why and how is parenthood associated with more or less well-being? *Psychological Bulletin*. 2014; 140(3):846–895. [PubMed: 24491021]
- Nomaguchi KM, Milkie MA. Costs and Rewards of Children: The Effects of Becoming a Parent on Adults' Lives. *Journal of Marriage and Family*. 2003; 65(2):356–74.
- Nomaguchi KM, Milkie MA, Bianchi SM. Time strains and psychological well-being: Do dual-earner mothers and fathers differ? *Journal of Family Issues*. 2005; 26(6):756–792.
- Offer S. Time with children and employed parents' emotional well-being. *Social Science Research*. 2014; 47:192–203. [PubMed: 24913954]
- Parcel TL, Menaghan EG. Early parental work, family social capital, and early childhood outcomes. *American Journal of Sociology*. 1994; 99(4):972–1009.
- Pew Research Center. Breadwinner moms. 2013a. www.pewresearch.org
- Pew Research Center. Modern parenthood: Roles of moms and dads converge as they balance work and family. 2013b. www.pewresearch.org
- Raley S, Bianchi SM, Wang W. When do fathers care? Mothers' economic contribution and fathers' involvement in child care. *American Journal of Sociology*. 2012; 117(5):1422–59.
- Rogers S, White L. Satisfaction with parenting: The role of marital happiness, family structure and parents' gender. *Journal of Marriage and Family*. 1998; 60(2):293–308.
- Russell JA. A circumplex model of affect. *Journal of Personality and Social Psychology*. 1980; 39:1161–1178.
- Senior, J. All joy and no fun: The paradox of modern parenthood. New York: Harper Collins; 2014.
- Smith-Coggins, Rosekind R, Hurd S, Buccino K. Relationship of day vs. night sleep to physician performance and mood. *Annals of Emergency Medicine*. 1994; 24(5):928–934. [PubMed: 7978567]
- Soupourmas F, Ironmonger D, Brown P, Warner-Smith P. Testing the Practicality of a Persona Digital Assistant Questionnaire versus a Beeper and Booklet Questionnaire in a Random-Time Experience-Sample Method Context. *Annals of Leisure Research*. 2005; 8(2–3):1422–152.
- Stanca L. Suffer the little children: Measuring the effect of parenthood on well-being worldwide. *Journal of Economic Behavior and Organization*. 2012; 81:742–750.
- Stone, A., Mackie, C. Subjective well-being: Measuring happiness, suffering, and other dimensions of experience. Washington, DC: National Academies Press; 2013. National Research Council Report
- U.S. Census Bureau. America's Families and Living Arrangements: 2012. 2013. <http://www.census.gov/content/dam/Census/library/publications/2013/demo/p20-570.pdf>
- Villalobos, Ana. Motherload: Making it All Better in Insecure Times. University of California Press; 2014.
- Waldfogel J, Craigie T, Brooks-Gunn J. Fragile families and child well-being. *The Future of Children*. 2010; 20(2):87–112. [PubMed: 20964133]
- Woo H, Raley RK. A Small Extension to "Costs And Rewards of Children: The Effects of Becoming a Parent on Adults' Lives". *Journal of Marriage and Family*. 2005; 67:216–21.
- Yetis-Bayraktar A, Budig MJ, Tomaskovic-Devey D. From the shop floor to the kitchen floor: Maternal occupational complexity and children's reading and math skills. *Work and Occupations*. 2013; 40:37–64.

Figure 1. Mothers' Predicted Levels of Feelings in Time with Children by Employment and Partnership Status

Superscripts denote significant differences at $p < 0.05$ from:

A = Non-employed, single; B = Employed, single; C = Non-employed, partnered; D = Employed, partnered

Note: Predicted values generated from full models (M3, Table 2); categorical controls set to their model category and continuous variables to their weighted mean values

Table 1

Means and Standard Deviations of Mothers' Feelings in Activities with Children by Employment and Partnership Status

	Employment Status		Partnership Status	
	Not Employed	Employed	Single	Partnered
Happiness	4.79 (1.38)	4.76 (1.45)	4.58 (1.76)	4.83 * (1.33)
Meaning	4.89 (1.54)	4.89 (1.64)	4.86 (1.86)	4.90 (1.53)
Sadness	0.53 (1.21)	0.38 * (1.13)	0.69 (1.70)	0.37 * (1.01)
Stress	1.37 (1.65)	1.33 (1.78)	1.62 (2.13)	1.27 * (1.61)
Fatigue	2.49 (1.83)	2.67 * (2.05)	2.75 (2.23)	2.54 * (1.88)
Percentage of Mothers (%)	37.25	62.75	23.14	76.86
N Observations (activities)	4206	7306	3076	8436
N Observations (women)	1951	3732	1528	4155

* Different from contrast group at $p < 0.05$

Note: 2010, 2012, 2013 ATUS Subjective Well-Being sample, mothers ages 21–55 with children under age 18 in the household. N's are unweighted; means/percentages are weighted

Table 2

Generalized Linear Models with Random Effects of Mothers’ Feelings in Activities with Children^{a,b}

	Happiness			Meaning			Sadness			Stress			Fatigue		
	M1	M2	M3	M1	M2	M3	M1	M2	M3	M1	M2	M3	M1	M2	M3
Respondent’s Work															
Not Employed (omitted)	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–
Employed	–0.094 [*]	–0.040	–0.035	–0.063	0.032	0.012	–0.041	–0.036	–0.036	0.043	0.064	–0.008	0.240 ^{***}	0.202 ^{***}	0.145 [*]
Family Structure															
Two Parent (omitted)	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–
Single Parent	–0.266 ^{***}	–0.343 ^{***}	–0.345 ^{***}	0.037	–0.084	–0.118	0.473 ^{***}	0.459 ^{***}	0.368 ^{***}	0.478 ^{***}	0.616 ^{***}	0.544 ^{***}	0.329 ^{***}	0.316 ^{**}	0.273 [*]
Work - Family Structure Interaction															
Employed × Single Parent	0.205 [*]	0.197 [*]	0.218 [*]	0.034	0.055	0.075	–0.318 ^{***}	–0.325 ^{***}	–0.301 ^{***}	–0.307 ^{**}	–0.346 ^{**}	–0.362 ^{**}	–0.221 ^{**}	–0.162	–0.167
Constant	4.765 ^{***}	5.061 ^{***}	5.277 ^{***}	4.786 ^{***}	4.788 ^{***}	4.388 ^{***}	0.411 ^{***}	0.049	0.020	1.298 ^{***}	0.939 ^{***}	1.064 ^{***}	2.349 ^{***}	2.271 ^{***}	3.259 ^{***}
sigma_u	0.984	0.965	0.948	1.090	1.071	1.048	0.925	0.919	0.916	1.287	1.270	1.260	1.450	1.404	1.391
sigma_e	1.058	1.057	1.038	1.283	1.275	1.216	0.762	0.761	0.759	1.182	1.180	1.166	1.335	1.268	1.261
rho	0.463	0.455	0.455	0.419	0.414	0.426	0.596	0.593	0.593	0.542	0.537	0.539	0.541	0.551	0.549

p<0.001,

**
p<0.01,

*
p<0.05

N Observations (activities) = 11,512; N Observations (women) = 5,683

^aM2 controls included, not shown for: age, race/ethnicity, college degree, current college enrollment, number and ages of children, season of diary report, whether a weekend day, and time of day

^bM3 controls included, not shown for: age, race/ethnicity, college degree, current college enrollment, number and ages of children, season of diary report, whether a weekend day, time of day and family income, whether there is another earner in the household, sleep, leisure, solo parenting, prior time with children, and type of parenting activity