

Article

JSPR

How gender, age, and socioeconomic status predict parenting goal pursuit

Journal of Social and Personal Relationships 2019, Vol. 36(10) 3313-3338 © The Author(s) 2018 Article reuse guidelines: sagepub.com/journals-permissions DOI: 10.1177/0265407518818375 journals.sagepub.com/home/spr

(\$)SAGE

Bonnie M. Leo^{1,*}, John K. Sakaluk², Lisa C. Day³, and Emily A. Impett[®]

Abstract

There are many factors that may influence parenting, from societal norms and expectations, dispositional differences, experience and maturity, and availability of resources. In the current research, we examined how stable demographic characteristics associated with these different factors predict the goals parents pursue with their children. We examined whether the pursuit of four parenting goals-child love and security, child development, parent image, and child acceptance—varies based on the characteristics of parents (i.e., gender, age, and socioeconomic status) and their children (i.e., gender and age). First, we provided evidence for the measurement invariance of the Parenting Goals Scale. The results suggested that across key characteristics, parents largely pursue the same four parenting goals on which they could be meaningfully compared. Second, metaanalytic results (k = 5; $N_{\text{total}} = 2,240$) indicated that parents were largely similar in the goals they pursued with their children across their own and their child's characteristics. We identified only a few exceptions, with these differences being small in magnitude: mothers and noncollege-educated parents pursued child love and security goals more than fathers and college-educated parents, older parents pursued child development goals less than younger parents, parents of older children pursued image goals more than parents of younger children, and lower income parents pursued child acceptance goals

Corresponding author:

Bonnie M. Le, Department of Clinical and Social Sciences in Psychology, University of Rochester, Rochester, NY 14627, USA.

Email: bonniemle@gmail.com

¹ University of Toronto, Canada

² University of Victoria, Canada

³ University of Toronto Mississauga, Canada

^{*}Bonnie M. Le is currently affiliated to University of Rochester, USA.

more than higher income parents. These results suggest that while there may be some small differences in parenting goal pursuit based on demographic characteristics, parents are largely motivated by similar goals when caring for their children.

Keywords

Age, gender, goals, parenting, socioeconomic status

Approaches to parenting are influenced by numerous factors, including societal norms and expectations, dispositional differences, experience and maturity, availability of resources, and characteristics of a child. That is, parenting is multiply determined (Abidin, 1992; Belsky, 1984, 2007; Grusec, Goodnow, & Kuczynski, 2000; Rolland & Walsh, 2009), and many factors may shape actual or perceived differences in how parents engage in childrearing. For instance, mothers have long held the role of primary caretakers relative to fathers, a norm that is reinforced by gender-based divisions of labor (Deutsch, 2001). Child gender, too, may evoke differences in parenting, such as in the extracurricular activities parents encourage their children to pursue (Lytton & Romney, 1991). Parent gender and child gender are but a few stable characteristics that may influence parenting. In the current work, we sought to examine how the demographic characteristics of *parent gender*, *age*, and *socioeconomic status* (SES) as well as *child gender* and *age* predict the different goals parents pursue with their children.

Developmental scholars and practitioners have noted the importance of understanding characteristics of both parents and children, in addition to different situational contexts, in shaping parenting and associated developmental outcomes in children (Abidin, 1992; Belsky, 1984, 2007; Grusec et al., 2000; Rolland & Walsh, 2009). Indeed, from a family systems perspective, family members mutually influence one another (Rolland & Walsh, 2009). In the current work, we focused on how the goals parents hope to achieve with their children vary based on their own and their child's demographic characteristics. We examined four goals: *child love and security goals* aimed at promoting a child's well-being and being a reliable caregiver, *child development goals* centered on providing a child with meaningful life experiences and growth, *parent image goals* focused on projecting and maintaining a positive parental image to others, and *child acceptance* goals aimed at gaining a child's positive regard (Le & Impett, 2017).

It is important to understand how goal pursuit may differ between parents given that these differences may impact both parent and child outcomes. The goals parents pursue can influence the development of a child's self-regulation, support or undermine responsive parenting behaviors, influence the trajectory of disagreements, and impact the well-being of both parents and their children (Conti, 2015; Dix, 1992; Dix & Branca, 2003; Dix, Gershoff, Meunier, & Miller, 2004; Hastings & Grusec, 1998; Le & Impett, 2017). More specifically, when pursuing goals focused on showing their child love, empathy, and compassion, parents are more likely to experience greater well-being, minimize parent—child conflict, and feel that they responsively and effectively meet their child's needs (Conti, 2015; Dix, 1992; Hastings & Grusec, 1998; Le & Impett, 2017). In contrast, when parents pursue goals focused on their own concerns and

interests, they experience compromised well-being and engage in less responsive parenting, including using more control and power assertion as well as having less sympathy for their children (Hastings & Grusec, 1998; Le & Impett, 2017). When parents pursue goals focused on child socialization and development, they reason more with their children in disagreements, but also experience more personal challenges including conflict and negative emotions (Hastings & Grusec, 1998; Le & Impett, 2017). Finally, when parents pursue relational goals focused on achieving harmony and acceptance with their children, they report daily boosts in positive emotions and are more warm and cooperative during parent–child disagreements (Hastings & Grusec, 1998; Le & Impett, 2017).

Given the importance of parenting goals in shaping outcomes for both parents and children, it is crucial to understand how parent and child characteristics may impact the types of goals parents pursue. Understanding how demographic characteristics predict parenting goals may elucidate ways in which parents can augment their goals to promote parent and child well-being and positive child socialization. Thus, the primary aim of the current work was to understand how characteristics of parents and their children shape parenting goal pursuit. Given that parenting goals have been relatively understudied (Dix & Branca, 2003; Smetana, 2015), we draw on research on parenting motivations and behavioral practices to inform our predictions.

How parent characteristics shape parenting

There are many parent demographic characteristics that may shape the goals that parents pursue with their children. Perhaps no other demographic factor has been examined more than parent gender, given its historically important role in shaping parental roles within families. Although many parents eschew gender-based divisions in managing work and family, it is more often the case that mothers fill the role of primary caregivers, even when they are employed (Deutsch, 2001). Further, mothers on average hold more empathic and nurturant attitudes toward children relative to fathers. For instance, mothers are more motivated to incur costs to care for their children (Le & Impett, 2015) and tend to be more child-centered and empathic during parent-child disagreements (Hastings & Grusec, 1998). Mothers also report engaging in more nurturing behaviors (Bentley & Fox, 1991) and providing more physical and emotional support to their children relative to fathers (Moon & Hoffman, 2008). Children also tend to see their mothers as more nurturant than their fathers, with adolescent children rating their mothers as more affectionate, loving, interested, appreciative, trusting, and encouraging (Starrels, 1994). Thus, research has consistently found mothers to be more nurturant, empathic, and caring relative to fathers, as reported by both parents and children.

Parent age may also influence differences in parenting goals. Younger parents may benefit from higher levels of energy; however, they may struggle with instability relative to older parents who have settled into their careers or relationships. The role of parent age in influencing parenting has not been widely studied, and the few studies that exist on this topic have yielded mixed findings. Some research has indicated that older, relative to younger, mothers at the age of their first birth are more positive (i.e., give more frequent hugs, kisses, praise, and supportive statements) and less negative (i.e., use derogatory statements, threats, slapping, pushing, and grabbing; Conger, McCarty,

Yang, Lahey, & Kropp, 1984) in their behaviors. However, other research has indicated that older mothers are less nurturant (Arnott & Brown, 2013) and older fathers are less sensitive with infants (Early and Care, 2000; NICHD Early Child Care Research Network). Overall, research examining how age shapes parenting has revealed mixed findings.

External factors and associated stress, such as the resources parents have, can impact parenting (Bornstein & Bornstein, 2007; Bronfenbrenner, 1986; Grusec et al., 2000). Indeed, these external factors often precede child birth and may causally shape how parents raise their children (Bronfenbrenner, 1986). Parental SES, including parent education and income, may influence the disposable resources parents have to spend, impacting the ultimate opportunities and well-being of children. For instances, parents of higher income enroll their children in more extracurricular activities (e.g., volunteering, sports, music, art, and dance lessons) than do parents of lower income (Pew Research Center, 2015). Further, higher, relative to lower, SES parents tend to assert less authority, are relatively less directive, teach their children more institutional knowledge, engage in activities that promote child achievement (i.e., reading books with their children frequently), and have higher expectations for their children to attain mastery in new skills (Davis-Kean, 2005; Hoff, Laursen, Tardif, & Bornstein, 2002; Lareau, 2015). While parents of high SES engage in behaviors that promote their child's ultimate success, their own experiences of parenting tend to be less enriched. Parents of higher SES find less meaning in parenting, which is theorized to stem from the conflict they experience between different life domains, such as between agentic (e.g., career) and communal (e.g., relational) domains (Kushley, Dunn, & Ashton-James, 2012). Consistent with this theory, mothers who contribute more financially to their household report engaging in less caregiving and socialization of their children (Schoppe-Sullivan et al., 2013). Further, highly educated mothers report lower levels of nurturance (Arnott & Brown, 2013), but more positive and less negative behaviors (Conger et al., 1984).

Parenting children of different genders and ages

Parenting goals may also be impacted by child demographic characteristics. It takes no more than a walk through a toy store or the child's clothing section of a department store to notice that many parents, and the broader culture at large, may seek to create different environments for children based on their *gender*. Despite popular notions of differences between boys and girls, research has indicated that parents largely do not socialize their sons and daughters differently (Endendijk, Groeneveld, Bakermans-Kranenburg, & Mesman, 2016; Lytton & Romney, 1991). In one meta-analytic review of 172 studies conducted in North America, results indicated that in all domains other than gender-specific activities (i.e., buying trucks for boys and dolls for girls), parents showed no differences in how they parented boys and girls (Lytton & Romney, 1991). Namely, parents treated boys and girls similarly across numerous domains, including amount of interaction; achievement and encouragement; warmth, nurturance, responsiveness, and praise; disciplinary strictness; and restrictiveness of independence. Similar results were found in a more recent meta-analysis of 126 studies in which minimal differences in parenting were found based on child gender (Endendijk et al., 2016). More specifically,

parents were found to provide the same amount of autonomy support to boys and girls. While parents tended to be more controlling with boys, the magnitude of this effect was negligible.

While research has indicated that child gender negligibly affects parenting, raising children over the developmental span can pose different challenges for parents. As children enter their teenage years, the parent-child relationship may become more distanced and fraught with tension, conflict, and less closeness as children shift from dependency to autonomy (Galambos, 1992; Smetana, 2015; Steinberg, 1988). Children's age has been found to differentially predict parental behaviors. For younger children, parents focus on bonding with their child and protecting them in order to promote attachment security; however, with adolescent children, parents tend to emphasize sensitivity and promote engagement in educational activities (Belsky, 2007; Mowder, Harvey, Moy, & Pedro, 1995). While some differences in parenting based on child age have been found, longitudinal research spanning an 8-year period has indicated that parents themselves (i.e., individually) tend to be stable over time in their own parenting practices, although on average (i.e., group trends) parents tend to become more controlling, less expressive, more achievement-focused, and use more punishment with children from late childhood to adolescence (McNally, Eisenberg, & Harris, 1991).

Current hypotheses and studies

Based on our review, we developed several hypotheses concerning how parent demographic characteristics predict parenting goal pursuit. Regarding parent gender, we hypothesized that mothers would be more likely to pursue child love and security goals relative to fathers given the abundant evidence that mothers tend to be more nurturant and empathic with children relative to fathers. Given the dearth of research and mixed findings on parent age, we tested in an exploratory fashion how parent age predicts parenting goal pursuit. Regarding parent SES, and drawing on research indicating that high SES parents tend to invest in their child's development in more instrumental rather than nurturant ways, we expected that parents high, relative to low, in SES would be more likely to pursue child development goals and less likely to pursue child love and security goals. Finally, given that parents of high SES tend to find less meaning in parenting relative to other life domains, we hypothesized that they would be less likely to pursue child acceptance goals relative to lower SES parents.

We also developed several hypotheses concerning how child demographic characteristics predict parenting goal pursuit. Regarding child gender, and given research showing negligible differences in how parents socialize boys and girls, we hypothesized that parents would pursue similar goals for boys and girls. Finally, given that parents shift their focus from prioritizing a child's basic needs in infancy to promoting their education and enrichment in adolescence, we hypothesized that parents would pursue more child love and security goals with younger children, but would pursue more child development goals with older children.

We tested these hypotheses in multiple samples and describe our investigation in two sections. In the first section, we sought to ensure we can appropriately compare parents

in their goal pursuit, and thus we sought to establish measurement invariance of the Parenting Goals Scale (PGS; Le & Impett, 2017). Doing so would ensure that parenting goals are assessed equivalently across the parent and child characteristics of interest, allowing us to more reliably assess group differences with the confidence that these differences are not due to aspects related to measurement of parenting goals. In the second section, and in order to test differences in parenting goal pursuit across parent and child demographics reliably, we meta-analyzed data from five samples ($N_{\rm total} = 2,240$). Our methods included survey data which assessed parents' goals as recalled in specific caregiving experiences (cross-sectionally and in daily life) as well as parents' chronic goal pursuit, or the goals they pursue with their children more generally.

Part I: Measurement invariance of the PGS

In order to ensure that we could appropriately compare parents in their goal pursuit based on their own and their child's demographics, we first tested whether the PGS displayed measurement invariance, or was measured equivalently, across the key parent and child characteristics of interest. We did so to ensure that our eventual tests of group differences in parenting goal pursuit were valid, rather than due to scale-related artifacts (Chen, 2007) or actual differences in parenting groups' representations of parenting goals. Thus, we tested whether parents pursue the same four parenting goals across the key parent and child characteristics by testing whether the overall four-factor model, as well as specific items, of the PGS held and performed consistently across each characteristic.

Method

We combined the three samples which were originally used to validate the PGS (Le & Impett, 2017; Studies 1 to 3). We combined these three samples in particular since they had similar sample characteristics (i.e., parents recruited from the U.S. using Mechanical Turk) as well as identical study procedures, design, and measures. This yielded a high-powered sample of 1,788 parents, providing adequate sample sizes for comparing parents across the groups of interest. Sample characteristics are shown in Table 1.

All measures and response options are shown in Table 2. Parents reported on a recent instance in which they provided care for their child in free response format:

People care for their children in both good and bad times. Sometimes this care is easy and enjoyable to give whereas other times it's difficult and frustrating. Please describe one of the most recent times you gave care to your child. Describe what your child was going through and what you did for your child.

Parents then reported on four parenting goals that motivated their care in this experience using the 17-item PGS (descriptives in Table 3): *child love and security goals* (5-items; e.g., "So my child knew that (s)he is important in my life" and "To provide my child comfort when (s)he needed it"), *child development goals* (5-items; e.g., "To ensure my child develops into a good person" and "To allow my child to have meaningful life experiences"), *parent image goals* (3-items; e.g., "To prevent the possibility of my child

Table 1. Sample characteristics.

| | Sample I ($N=537$) | Sample 2 (N $=$ 693) | Sample I ($N = 537$) Sample 2 ($N = 693$) Sample 3 ($N = 558$) Sample 4 ($N = 117$) Sample 5 ($N = 356$) | Sample 4 ($N=117$) | Sample 5 ($N=356$) |
|-----------------------------|----------------------|----------------------|--|----------------------|----------------------|
| Parent gender Female (%) | 89 | 17 | 52 | 82 | 50 |
| Male (%) | 32 | 29 | 48 | 81 | 20 |
| Child gender Female (%) | 45 | 20 | 43 | 52 | 59 |
| Male (%) | 55 | 20 | 27 | 48 | 14 |
| Parent age | M=32 years | M = 33 years | M=35 years | M = 41 years | M=50 years |
| | SD = 9 | SD = 8 | SD = 8 | SD = 5 | SD = 5 |
| | Range: 18–60 | Range: 19–65 | Range: 19–65 | Range: 29–53 | Range: 35–77 |
| Child age | M = 6 years | M = 7 years | M = 7 years | M = 8 years | M = 19 years |
| | SD = 5 | SD = 5 | SD = 6 | SD = 3 | SD = I |
| | Range: newborn-18 | Range: newborn–18 | Range: newborn-18 | Range: 3–12 | Range: 17–25 |
| Parent education | | | | | |
| College degree (%) | 54 | 28 | 53 | 73 | 28 |
| No college degree (%) | 46 | 42 | 47 | 27 | 42 |
| Parent income | M = \$49,368 | M = \$50.280 | M = \$40,852 | M = \$89,010 | M = \$61,339 |
| | SD = \$27,074 | SD = \$60,445 | SD = \$45,000 | SD = \$19,622 | SD = \$48,054 |

Note. In Sample 5, we removed two adult children who were over the age of 25 (i.e., older than the typical university aged student).

 Table 2. Study measures and characteristics.

| | Sample I | Sample 2 | Sample 3 | Sample 4 | Sample 5 |
|-----------------------------|--|---|---|---|---|
| Parent gender | What is your gender? a) Male b) Female c) Transgender d) Prefer not to | What is your gender? a) Male b) Female c) Transgender d) Prefer not to say what is your gender? b) Female c) Transgender c) Transgender say say | What is your gender? a) Male b) Female c) Transgender d) Prefer not to say | Your sex a) Male b) Female c) Choose not to answer | What is your gender? a) Male b) Female c) Transgender d) Prefer not to say |
| Parent age Parent education | What is your age? What is your highest level of education? a) Less than high school degree, general education diploma or some college | What is your age? What is your highest level of education? a) Less than high school b) High school degree, general education diploma or some college | How old are you? What is the highest level of education you have completed? a) Less than high school b) High school degree general education diploma, or some college c) Associates degree d) University degree e) Graduate school degree | Your age What is the highest level of education you have completed? a) Elementary b) High school c) College d) University e) Grad school f) Other g) Choose not to answer | How old are you? What is the highest level of education you have completed? a) Less than high school b) High school degree, general education diploma or some college c) College diploma d) University degree e) Graduate school degree |
| | | Q | f) Prefer not to say | | f) Prefer not to say |

| Table 2. (continued) | (р | | | | |
|----------------------|---|--|---|--|--|
| | Sample I | Sample 2 | Sample 3 | Sample 4 | Sample 5 |
| Parent income | What is your approximate household income? a) Under \$15,000 \$15,001 \$25,000 \$25,000 \$35,000 \$35,000 \$35,000 \$35,000 \$55,000 \$55,000 \$55,000 \$100,0 | What is your approximate household income? a) Under \$15,000 b) \$15,001- \$25,000- (325,001- \$35,000- (4) \$35,001- \$50,000- (5) \$50,000- (7) \$75,001- \$100,000- (8) \$75,001- \$100,000- (9) \$75,001- (10 | What was your personal gross income for 2014? Consider income from all sources (e.g., salary, bonuses, etc.) before taxes. a) \$0—1 do not work outside the home b) \$1–\$10,000 c) \$10,000—\$14,999 d) \$15,000—\$14,999 e) \$15,000—\$24,999 f) \$25,000—\$29,999 f) \$25,000—\$29,999 f) \$50,000—\$29,999 f) \$50,000—\$29,999 f) \$50,000—\$29,999 f) \$50,000—\$29,999 f) \$50,000—\$19,999 f) \$50,000—\$74,999 f) \$50,000—\$19,999 f) \$150,000—\$19,999 | What is your household income? a) \$0-\$19,999 b) \$20,000- \$33,999 c) \$40,000- \$55,999 d) \$60,000- \$77,999 e) \$80,000- \$79,999 f) \$100,000 (+) g) Choose not to answer | What is your household What was your personal income? Sconsider income for 2014? Consider income from all sources (e.g., salary, bonuses, etc.) before taxes. a) \$0-\$19,999 a) \$0-1 do not work outside the home \$139,999 b) \$1-\$10,000 c) \$40,000-\$14,999 d) \$60,000-\$14,999 d) \$60,000-\$14,999 e) \$60,000-\$14,999 f) \$15,000-\$19,999 f) \$100,000 g) \$20,000-\$24,999 f) \$100,000-\$149,999 f) \$100,000-\$149,999 g) \$100,000-\$149,999 h) \$100,000-\$149,999 m) \$150,000-\$149,999 m) \$150,000-\$149,999 |
| | | | | | |

| continued) |
|------------|
| 2 |
| Table |
| _ |

| | Sample I | Sample 2 | Sample 3 | Sample 4 | Sample 5 |
|-----------------------|-----------------------------------|--|---|---|---|
| Child gender | Is your child a boy or a girl? | Is your child a boy or a girl? | a boy or a Is your child a boy or a What is your child's gender? Please indicate the sex What is your gender? girl? child | Please indicate the sex of your participating child | What is your gender? |
| | a) Boy b) Girl | a) Boy b) Girl | a) Boy b) Girl | a) Male b) Female | a) Male b) Female, |
| | | | c) Prefer not to say | c) Choose not to answer | c) Transgenderd) prefer not to say |
| Child age | How old is your child? | How old is your child? How old is your child? How old is your child? | How old is your child? | Please indicate the date How old are you? of birth of your participating child (converted to years) | How old are you? |
| Study characteristics | | | | | |
| Population Country | Mechanical Turk U.S. | Mechanical Turk U.S. | Mechanical Turk U.S. | Community Canada | Community Canada |
| Design Procedure | Cross-sectional Online | Cross-sectional Online | Cross-sectional Online | Daily experience Online | Cross-sectional Online |
| | | | | | |

Note. All measures of child's gender and age were answered by parents, except in the case of Study 4, where adult children answered questions themselves.

Table 3. Descriptives of parenting goals.

| | Sample | _ | Sample 2 | 2 | Sample 3 | 3 | Sample 4 | 4 | Sample 5 | 2 |
|-------------------------|-------------|------|-------------|------|-------------|------|-------------|------|-------------|------|
| | (QS) W | 8 | (GS) W | 8 | (QS) W | 8 | (GS) W | 8 | (QS) W | 8 |
| Child love and security | 4.43 (0.76) | 98.0 | 4.45 (0.76) | 98.0 | 4.42 (0.75) | 0.81 | 3.83 (0.86) | 0.87 | 4.64 (0.45) | 0.76 |
| Child development | 3.31 (1.16) | 98.0 | 3.31 (1.22) | 0.88 | 3.26 (1.13) | 0.83 | 2.84 (0.99) | 0.84 | 4.48 (0.51) | 0.71 |
| Parent image | 1.59 (0.93) | 98.0 | 1.51 (0.86) | 0.87 | 1.51 (0.83) | 0.83 | 1.59 (0.82) | 0.89 | 2.47 (1.20) | 0.87 |
| Child acceptance | 2.58 (1.14) | 0.83 | 2.54 (1.15) | 0.83 | 2.40 (1.00) | 0.77 | 2.31 (0.95) | 0.82 | 3.42 (1.06) | 0.85 |

Note. Samples 1 to 3 were combined for testing measurement invariance.

making me look bad" and "Because it helped me look like a good parent in front of other people"), and *child acceptance goals* (4-items; e.g., "So my child would think I'm a good parent" and "To gain my child's love"). In all studies, parenting goals were measured on a 5-point scale ($1 = not \ at \ all \ important$ to $5 = extremely \ important$). The full PGS can be found on the Open Science Framework (OSF) in the Online Appendix A at osf.io/trufs.

Data analyses

All data, R analysis scripts, and appendices can be found on OSF at osf.io/trufs. For the characteristics of parent gender, child gender, and parent education, we tested configural, factor loading (weak), and intercept (strong) invariance in R v. 3.5.0 (R Core Team, 2018) using the lavaan (Rosseel, 2012) and semTools packages (semTools Contributors, 2015). For parent gender, models compared mothers (N = 1,801) to fathers (N = 609). For parent education, models compared parents who held college degrees (N = 944) to those who did not (N = 755). For child gender, models compared parents of boys (N = 963) to parents of girls (N = 834). We compared a series of increasingly constrained models, first by loading the same items onto the same factors, then by constraining factor loadings and intercepts to be equal across groups. We sought to establish configural and weak invariance at minimum (Meredith, 1993). Configural invariance was concluded when models had acceptable fit (CFI \geq .90 and RMSEA<.08; Kline, 2005); weak and strong invariance were concluded when increasingly constrained models had CFI decreases less than .010 and RMSEA increases of no more than .015 (Chen, 2007; Chen & West, 2008). We report χ^2 statistics but deemphasize them in our model evaluations given their sensitivity to sample size variation (Kline, 2005).

We conducted analyses of differential item functioning (DIF) via multiple-indictor multiple-cause models (MIMIC; Woods & Grimm, 2011) to conserve the continuous nature of the parent age, child age, and parent income variables. Within MIMIC models, DIF is expressed in one of two ways; either as a residual association between a covariate (e.g., age) and any indicator(s) of a latent variable (e.g., item 1 of the PGS) after controlling for any true association between the covariate and the latent variable (e.g., the child love and security factor) or a residual interaction between a covariate and a latent variable after controlling for any true association between the covariate and the latent variable. Significant pathways of the first description are comparable to evidence of a lack of invariance for item intercepts (i.e., uniform DIF), whereas significant pathways of the second description are comparable to evidence of a lack of invariance for item factor loadings (i.e., nonuniform DIF). We tested the significance of uniform and nonuniform DIF using the permutation randomization method (Jorgensen, Kite, Chen, & Short, 2017).

Results

As given in Table 4, the PGS achieved configural, weak, and strong invariance across parent gender, child gender, and parent education. Turning to Table 5, the PGS was largely invariant across child age, parent age, and parent income with a few exceptions.

 Table 4. Measurement invariance of the Parenting Goals Scale.

| Model | Invariance strength | χ^{2} | ₽ | E | RMSEA | d f CFI RMSEA Model comparison $\Delta\chi^2$ | $\Delta\chi^2$ | JÞ∇ | ΔCFI | Adf ACFI ARMSEA |
|-------------------------------|---------------------|------------|-----|------|-------|---|----------------|----------|------------|------------------|
| Parent gender | | | | | | | | | | |
| Configural invariance (A) | | 1,173.0*** | 226 | .922 | .073 | | | | | |
| Factor loading invariance (B) | Weak | 1,186.4*** | 239 | .922 | .07 | B versus A | 13.33 | <u>~</u> | 13 .000 | .002 |
| Intercept invariance (C) | Strong | 1,237.9*** | 252 | 616: | .07 | C versus B | | <u>~</u> | .003 | 000 |
| Parent education | | | | | | | | | | |
| Configural invariance (A) | | 1,194.1*** | 226 | .922 | .074 | | | | | |
| Factor loading invariance (B) | Weak | 1,208.2*** | 239 | .922 | .072 | B versus A | 14.12 | <u>~</u> | 00. 00. | .002 |
| Intercept invariance (C) | Strong | 1,236.2*** | 252 | .920 | .071 | C versus B | 27.94** | <u>~</u> | .002 | - - - - |
| Child gender | | | | | | | | | | |
| Configural invariance (A) | | 1,265.4*** | 226 | .921 | .074 | | | | | |
| Factor loading invariance (B) | Weak | 1,277.2*** | 239 | .921 | .072 | B versus A | 11.85 | <u>~</u> | 000. | .002 |
| Intercept invariance (C) | Strong | 1,299.8*** | 252 | .920 | .071 | C versus B | 22.55* | <u>~</u> | <u>0</u> . | .002 |
| - |) | | | | | | | | | |

*p < .05; **p < .01; ***p < .001.

 Table 5. Differential item functioning tests for the Parenting Goals Scale.

| | | Child age | | <u>. </u> | arent age | | Pa | arent income | |
|-------------------------|----------|-----------|-------|--|-----------|-------|-----------|--------------|---------|
| Factor | χ^2 | | RMSEA | χ^2 | | RMSEA | χ^2 | P | RMSEA |
| Child love and security | 183.61 | 0.98 | 0.05 | 165.99 | 0.98 | 0.04 | 214.03 | 0.98 | 0.05 |
| PGSI | 19.97* | | | 14.57 | I | | 0.41 | 1 | |
| PGS2 | 0.27 | | 1 | 0.52 | | | 0.27 | 1 | I |
| PGS3 | 20.80** | | 1 | 7.83 | | | 0.63 | 1 | I |
| PGS4 | 91.9 | | 1 | 4.44 | | | 90.0 | 1 | I |
| PGS5 | 3.19 | | 1 | 15.97* | | | 0.47 | 1 | I |
| Child development | 675.53 | 0.92 | 0.10 | 633.08 | 0.92 | 0.09 | 823.93 | 0.90 | 0.1 |
| PGS6 | 25.80*** | | 1 | 3.13 | I | | 2.63 | | I |
| PGS7 | I0:I | | 1 | 10.20* | I | | 0.30 | | I |
| PGS8 | 21.01*** | | 1 | 3.19 | | | 2.86 | 1 | I |
| PGS9 | 4.97 | | 1 | 5.88 | 1 | | 12.06* | | I |
| PGS10 | 3.16 | | | 0.62 | I | | 5.45 | 1 | |
| Parent image | 21.14 | 0°. | 0.03 | 38.16 | 0.99 | 0.04 | 57.23* | *66.0 | 0.05* |
| | 0.78 | | | 5.21 | I | | 5.44 | 1 | |
| PGS12 | 9.34 | | 1 | 1.70 | I | | 3.02 | 1 | I |
| PGS13 | 6.58 | | 1 | 18.03* | | | 23.24** | 1 | |
| Child acceptance | 168.65* | | *90.0 | 144.34 | 0.97 | | 549.64*** | 0.88*** | 0.12*** |
| PGS14 | 3.99 | | 1 | ¥29.01 | I | | 117.85*** | | I |
| PGS15 | 0.90 | | 1 | 1.68 | I | | 3.93 | | I |
| PGS16 | 20.88*** | | | 7.32 | | | 2.03 | l | |
| PGS17 | 23.68*** | I | I | 23.05 | 1 | I | 27.86*** | I | |

Note. Results reflect omnibus and item-level tests of differential item functioning from randomized permutation tests in multiple-indicator multiple cause models. All χ^2 tests for individual items have df = 2. Parenting Goals Scale item numbers correspond to those which appear in the Online Appendix A. $*_p < .05; **_p < .01; ***_p < .001.$

Specifically, there was evidence that both parent image and child acceptance goals are measured differently for parents of different incomes. There was also evidence that child acceptance goals are measured differently across child age. Besides these three exceptions, results indicate that the PGS is largely measured similarly across parent and child characteristics. The few exceptions we found will be important to consider in tests of group differences in the current examination and future research, with the important caveat that differences may emerge not because of changes in parenting goals across these covariates, but rather because of differences in measurement. In the current work, only two of our hypotheses should be viewed with this caveat: tests of null differences in child acceptance goal pursuit based on child age and lower pursuit of child acceptance goals by higher income parents.

Part II: Testing parenting goal differences across gender, age, and SES

Having established that the PGS is largely invariant across the key parent and child characteristics of interest, we next sought to examine differences in parenting goal pursuit based on these characteristics. To do so, we conducted meta-analyses across five samples.

Method

In all five samples, parents completed an online survey in which they answered questions about their parenting goals using the 17-item PGS described in Part I as well as their own and their child's demographic characteristics. Sample, demographic measure, and parenting goal measure descriptives are shown in Tables 1, 2, and 3, respectively.

Data analyses

To test our hypothesis that parents would not differ in parenting goal pursuit based on child gender, we conducted two different types of equivalence tests (Lakens, McLatchie, Isager, Scheel, & Dienes, 2018; Wagenmakers, 2007). Using R, we conducted two one-sided tests (TOSTs; Lakens, 2017) using the TOSTER package (Lakens, 2017) and Bayes factors (BFs; Rouder, Haaf, & Vandekerckhove, 2018) using the BayesFactor package (Morey, Rouder, & Jamil, 2014). TOSTs adapt the traditional null-hypothesis significance testing logic to examine whether one can reject the possibility of effects exceeding an interval for a small difference that is deemed trivial (e.g., $-.10 \le d \le .10$); if both one-sided tests are significant, there is evidence of equivalence. BFs (Rouder et al., 2018), meanwhile, provide an intuitive continuous metric of evidence that indicates whether observed data are more likely under an alternative hypothesis of a group difference versus a null hypothesis of equivalence; generally, BFs greater than three are taken as evidence in favor of the alternative over the null hypothesis (BF₁₀) or in favor of the null over the alternative hypothesis (BF₀₁).

For all other tests of hypotheses, we conducted meta-analyses using the metafor package (Viechtbauer, 2010). To estimate effects from each of the five samples for

| | | 1 | 2 | 3 | 4 |
|----|-------------------------|--------|--------|--------|---|
| 1. | Child love and security | _ | | | |
| 2. | Child development | .39*** | _ | | |
| 3. | Parent image | 06 | .32*** | _ | |
| 4. | Child acceptance | .30*** | .45*** | .6I*** | _ |

Table 6. Meta-analytic bivariate correlations among parenting goals.

Note. Effects are meta-analytic bivariate Pearson's r correlations (k = 5, $N_{total} = 2,240$). >>> < .001.

inclusion in the meta-analyses, our analyses proceeded in several steps. We first contrastcoded parent gender and (the covariate of) child gender (1 = female, -1 = male) as well as parent education (1 = has college degree, -1 = no college degree). Measures of parent age, child age, and parent income were standardized. Using the contrast-coded and standardized demographic measures, we derived estimates from each of the five samples using multivariate regression analyses using the car package (Fox & Weisberg, 2011). In these analyses, all six demographic factors were simultaneous predictors of all four parenting goals. Since we aimed to understand the unique effects of each demographic characteristic in predicting parenting goals, we estimated partial effects since demographics tend to be correlated (i.e., older parents tend to have older children, highly educated parents tend to have higher incomes). We also accounted for the covariances among the four parenting goals given they are correlated. The partial effects were then meta-analyzed in separate models, one for each demographic characteristic and each goal. The meta-analyzed bivariate correlations among the four parenting goals across all five samples are presented in Table 6. Results of key hypothesis tests are reported in Table 7 (equivalent bivariate associations are reported in the Online Appendix B).

Results

Goal pursuit across parent characteristics

Results regarding parent characteristics are shown in Table 7. Consistent with hypotheses, mothers pursued child love and security goals more than fathers; further, mothers and fathers did not differ in pursuit of any of the other three parenting goals.² Regarding exploratory tests of parent age, results indicated that older parents pursued child development goals less than younger parents. Parents did not differ in pursuit of the other three goals based on their age. Finally, regarding SES, we hypothesized that parents of higher SES would be more likely to purse child development goals and less likely to pursue child love and security and acceptance goals relative to lower SES parents. Results indicated that parent SES largely did not predict parenting goal pursuit, with two exceptions: in line with predictions, college-educated parents were less likely to pursue child love and security goals relative to noncollege-educated parents, and higher income parents were less likely to pursue child acceptance goals relative to lower income

Table 7. Partial effects of demographic group characteristics predicting parenting goal pursuit.

| | Child | love a | Child love and security | Ŋ | ild dev | Child development | ď | ırent i | Parent image | ŋ | ild ac | Child acceptance |
|---------------------|------------|--------|-------------------------|------------|------------|------------------------------|------------|---------|-------------------|------------|----------|-------------------|
| | β SE | SE | Cl _{95%} | β | SE | β SE Cl _{95%} | β SE | SE | Cl _{95%} | β SE | SE | Cl _{95%} |
| Parent demographics | | | | | | | | | | | | |
| Gender | .12*** | .02 | [98, 16] | 02 | 9. | [11, .06] | 08 | 90: | | <u>04</u> | 90: | |
| Age | .02 | .02 | [02, .06] | 05* | .02 | [10,01] | = | .07 | | <u>10</u> | <u>e</u> | |
| Education | 04* | .02 | [09, -002] | <u> </u> | .02 | [05, .03] | 03 | .07 | | 03 | .03 | |
| Income | 00 | .02 | [05, .04] | <u> </u> | .02 | [06, .03] | 02 | .02 | [07, .03] | **90 | .02 | [10,02] |
| Child demographics | | | | | | | | | | | | |
| Gender | 6 . | .03 | [02, .10] | <u>o</u> . | .02 | [03, .05] | 90. | 9 | [07, .08] | <u> </u> | .02 | [05, .04] |
| Age | <u></u> | 12 | [36, .09] | .07 | <u>o</u> . | [12, .26] | *20. | .03 | [.02, .13] | 9 | .05 | [07, .14] |
| | | | | | | | | | | | | |

Note. CI = confidence interval. Values reflect meta-analytic estimates derived from five samples. Each estimate was derived from partial effects of each parent (or child) demographic characteristic, controlling for all other parent and child demographics, in simultaneously predicting all four parenting goals, accounting for the covariances among the four goals. The following contrast codes were used: parent and child gender (1 = female, -1 = male) and parent education (1 = college degree, -1 = no collegedegree).

| | E | stimate | | |
|-------------------------|-----|-------------------|--------|-------|
| | g | CI _{90%} | TOST Z | BFoi |
| Child love and security | 08 | [19, .04] | 0.34 | 4.77 |
| Child development | .01 | [10, .11] | -1.48 | 27.24 |
| Parent image | .03 | [05, .11] | -1.39 | 20.01 |
| Child acceptance | .02 | [05, .09] | −1.93* | 23.48 |

Table 8. Meta-analytic estimates and equivalence tests assessing parenting goal differences based on child gender.

Note. Meta-analytic effect estimates were derived from random-effects models. CI = confidence interval; TOST = two one-sided tests; BF = Bayes factor. TOSTs evaluate equivalence within g of |.10|. BFs were calculated using JZS priors of r = 1.0. |.10| = 1.0. |.10| = 1.0. |.10| = 1.0.

parents. However, education and income did not predict any other differences in parenting goal pursuit.

Parenting goal pursuit across child characteristics

Turning to child characteristics, we hypothesized that parents would be similar in their goal pursuit across child gender. Consistent with this hypothesis, and as shown in Table 8, parents did not purse different goals based on whether they were raising boys versus girls. More specifically, of the TOSTs, one significance test supported equivalence for child acceptance goals, while three nonsignificant tests did not support equivalence for child love and security, child development, and parent image goals. BF estimates indicated moderate to very strong evidence in favor of the null relative to alternative possibilities for all four parenting goals. Thus, whereas the TOSTs indicate that more data are needed to inform claims of equivalence, BFs consistently suggest that our observed data are more likely under the null hypothesis of no effect. Finally, regarding child age, we hypothesized that parents would be likelier to pursue love and security goals with younger children and child development goals with older children. Contrary to hypotheses, and as shown in Table 7, we found that parents pursued more image goals with older, relative to younger, children; they did not, however, differ in pursuit of any of the other three goals based on child age.

Discussion

Demographic characteristics of parents and children may influence the outcomes parents strive to achieve with their children. In the current research, we found that parents can be meaningfully compared in their pursuit of four parenting goals, including child love and security, child development, parent image, and child acceptance. Additionally, while there were some small differences in the goals parents pursued based on their own (i.e., gender, age, and SES) and their child's (i.e., gender and age) demographic characteristics, parents were largely more similar than different in the goals they pursued with their children.

How parent demographic characteristics predict goal pursuit

Across five samples, we found meta-analytic support for our prediction that mothers, relative to fathers, were more likely to pursue child love and security goals. This finding supports the large body of work which has documented that mothers tend to be more nurturant, child-oriented, emotionally supportive, and warm than fathers (Bentley & Fox 1991; Hastings & Grusec, 1998; Le & Impett, 2015; Starrels, 1994; Moon & Hoffman, 2008). The current results also shed light on important similarities between mothers and fathers, who did not differ in their pursuit of the other three parenting goals assessed. Despite mothers' prototypical role as primary caregivers, the current results highlight that fathers care just as much as mothers do about providing their children with meaningful life experiences and helping them develop into well-adjusted adults. Furthermore, fathers feel similarly self-conscious about how others perceive them as parents and desire acceptance from their children to a similar degree as mothers. These findings highlight similarities between mothers and fathers, who are no different in their focus on their children's development as well as their desire for approval as parents. Given the similarities between mothers and fathers, these results point to the importance of supporting fathers in their roles as parents to the same degree as mothers. As mothers increasingly enter the workforce, many fathers have taken on more childcare, yet have fewer resources relative to mothers and often feel isolated (Bennett, 2014; Croft, Schmader, & Block, 2015). The current findings suggest that fathers are similarly invested in their children and their image as parents, and hence, more resources to support fathers in these roles could be beneficial.

Regarding parent age, we found meta-analytic evidence that older parents were less likely to pursue child development goals than younger parents. These findings are consistent with research indicating that younger, relative to older, parents engage in more positive behaviors (Arnott & Brown, 2013; NICHD Early Child Care Research Network, 2000). These findings also help clarify mixed findings regarding the role of parent age in shaping parenting practices, in addition to isolating its unique role, in relation to other demographic characteristics, in shaping parenting goals. Younger parents were more focused on their child's growth and development relative to older parents independent of their child's age. Furthermore, their relatively higher focus on their child's development is independent of the education and resources they have attained. These findings suggest that regardless of the fact that they may have fewer resources, younger parents are even more likely to foster their child's growth and development, perhaps through interpersonal or experiential means. While older parents focused less on their child's development than younger parents, they sought to provide love and security and desired acceptance from their children to a similar degree regardless of their age.

Regarding parent's SES, we found meta-analytic evidence that parents' levels of education and income had negligible associations with parenting goal pursuit. The only two differences we identified were that college-educated parents were less likely to pursue child love and security goals and parents with higher incomes were less likely to pursue child acceptance goals relative to parents with no college education and lower incomes, respectively. It is important to interpret these findings with caution because they are small in magnitude and the latter finding, as our invariance analyses suggest,

may be driven by differences in measurement. With these caveats in mind, these findings are consistent with theoretical arguments that higher SES parents may derive less meaning from parenting given that providing communal care may conflict with their pursuit of agentic goals (Kushlev et al., 2012). These findings also align with work indicating that mothers who contribute more financially to their household income provide less caregiving for their children (Schoppe-Sullivan et al., 2013). While we expected that SES would be linked with lower pursuit of child development goals, parents of all education levels and incomes pursued these goals to a similar degree. Thus, the current findings shed light on the unique role of parent SES after accounting for other parent and child characteristics. Perhaps upon accounting for these characteristics, parents across income and education levels aim to provide their children with opportunities for growth and meaningful life experiences, suggesting that resources may not be the factor limiting parents' goals to promote child development. In other words, parents may seek to promote their child's development in a myriad of ways that do not require resources, such as through shaping their moral and social development.

How child demographic characteristics predict parenting goal pursuit

Turning to child demographic characteristics, equivalence tests indicated that parents did not differ in their pursuit of any of the four parenting goals based on their child's gender. These results reinforce other meta-analytic findings showing that parents largely do not differ in how they socialize their sons versus their daughters (Endendijk et al., 2016; Lytton & Romney, 1991). Thus, contrary to broader cultural representations of child gender differences—for example, differentiating boys and girls based on clothes, toys, and activities—we found that parents seek to provide love and security and invest in their child's development regardless of their child's gender. Furthermore, parents desire acceptance and feel image concerns to the same degree with boys and girls.

Turning to child age, we found the unexpected result that parents are more likely to pursue image goals with older relative to younger children. While we did not predict this difference, there are a number of reasons why parents may become more sensitive about their image as their children get older. Research has shown that there is greater tension in the parent-child relationship as children move from relative dependency in childhood to greater autonomy in adolescence (Galambos, 1992; Smetana, 2015; Steinberg, 1988). As parents become less controlling of their children as they age (McNally et al., 1991), they may become more self-conscious if they disapprove of or are disappointed in their child's decisions and outcomes (i.e., their academic performance, manners, or choice of a romantic partner). Further, parents may project their own desires and wishes onto a child or see their children as a reflection of themselves. The extent to which parents perceive their children to meet or disappoint these hopes and desires may also impact how much parents strive to avoid embarrassment from their children. Turning to the other parenting goals, and contrary to expectations, we did not find that parents pursue child love and security goals more with younger children nor did they pursue child development goals more with older children. These results indicate that parents seek to promote their children's well-being across the developmental span and may adjust the ways in which they promote their children's well-being based on their child's age.

Limitations and future directions

A strength of the current research is that the use of high-powered studies allowed us to comprehensively and reliably assess the unique role of gender, age, and SES in predicting differences in parenting goals. However, we were limited in the geographical breadth of our samples. Specifically, our samples were entirely North American (e.g., American and Canadian) and largely Caucasian, limiting our ability to assess cultural differences in parenting goal pursuit across parent and child demographic characteristics. Developmental scholars have noted the importance of examining culture in the study of parenting given that parental practices may not have the same effects across cultures (Bornstein & Bornstein, 2007; Grusec et al., 2000). Therefore, it will be important in future research to examine whether parents of different cultures differ in their pursuit of parenting goals.

Further, it will be important to build on the current findings to examine how parent and child characteristics interact to predict parenting goals dynamically, including in specific situations, globally, and over time. One limitation of the current research is that we examined how demographic characteristics predict parenting goal pursuit cross-sectionally rather than longitudinally. Moreover, our analyses focused on potentially lower order parenting goal factors. It remains to be seen to what extent these factors cluster together in constellations of parenting approaches or higher order dimensions of parenting strategies that may be predictive and/or predicted by other important factors (Galovan & Schramm, 2017; Kopystynska, Paschall, Barnett, & Curran, 2017; Masyn, Henderson, & Greenbaum, 2010). Future researchers should therefore consider examining how parenting goals manifest multidimensionally in natural groupings as well as how they shift longitudinally in response to changes in the parenting context. Doing so will allow for a more focused examination of how parenting goals are expressed in everyday life.

Finally, it will also be important to determine if any of the demographic differences in parenting goal pursuit identified have downstream implications for parent and child outcomes. We know from the existing empirical and theoretical work that parenting goals may influence parent behaviors during conflict with their children (Hastings & Grusec, 1998), the styles and behaviors parents use (Darling & Steinberg, 1993), and predict parental well-being and relationship quality with children (Le & Impett, 2017). To the extent that some parents pursue particular goals more than others, this may lead to consequential differences in both parent and child outcomes and behaviors.

Conclusion

The current research provides insight into how demographic characteristics of parents and children predict the outcomes parents hope to achieve or avoid with their children. We found that mothers and noncollege-educated parents seek to provide their children with love and security more than fathers and college-educated parents; older parents focus on their children's development less than younger parents; and higher income parents desire less acceptance from their children relative to lower income parents.

Further, parents of older children seek to maintain their positive images as parents to a higher degree than younger parents. The current findings contribute to our understanding of how multiple factors—including those external and internal to the family—may shape parenting goal pursuit. While we find some differences among parents in their goal pursuit, these effects were small in magnitude and the results overall point to parents being more similar than different in their motivation to provide their children with love and security, to desire invest in their child's development, concern over how they are perceived as parents, and desire for love and acceptance from their children.

Authors' note

Some data in the current article appear in Le and Impett (2015, 2016, 2017); however, besides descriptive statistics, all results are distinct.

Funding

The author(s) disclosed receipt of the following financial support for the research, authorship, and/ or publication of this article: This work was supported by the Social Science and Humanities Research Council which awarded a Banting Postdoctoral Fellowship to B. M. Le, a Postdoctoral Fellowship to J. K. Sakaluk, a Doctoral Fellowship to L. C. Day, and an Insight Grant to E. A. Impett.

ORCID iD

Open research statement

As part of IARR's encouragement of open research practices, the author(s) have provided the following information: This research was not pre-registered. The data and materials used in the research can be obtained at https://osf.io/trufs/ or are available upon request by emailing Bonnie Le at bonnie.le@rotman.utoronto.ca.

Supplemental material

Supplemental material for this article is available online at https://osf.io/trufs/.

Notes

- 1. Key hypothesis tests for child gender predicting parenting goal pursuit were reported in tests of equivalence as shown in Table 8. However, we include child gender in our meta-analytic results for partial effect (Table 7) and full model results (see the Online Appendix B). We note that the meta-analytic results are consistent with tests of equivalence suggesting that parents do not vary in their goal pursuit based on child gender.
- Exploratory tests indicated that parent gender did not consistently interact with the other
 parent (i.e., age, income, and education) and child (i.e., age and gender) characteristics in
 predicting goal pursuit, with only one of 20 meta-analyzed interactions reaching statistical
 significance.

References

Abidin, R. R. (1992). The determinants of parenting behavior. *Journal of Clinical Child Psychology*, 21, 407–412. doi:10.1207/s15374424jccp2104_12

- Arnott, B., & Brown, A. (2013). An exploration of parenting behaviours and attitudes during early infancy: Association with maternal and infant characteristics. *Infant and Child Development*, 22, 349–361. doi:10.1002/icd.1794
- Belsky, J. (1984). The determinants of parenting: A process model. *Child Development*, 55, 83–96. doi:10.1111/j.1467-8624.1984.tb00275.x
- Belsky, J. (2007). Social-contextual determinants of parenting. In: R. E. Tremblay, M. Boivin, & RDeV Peters. (Eds). *Encyclopedia on early childhood development*.
- Bentley, K. S., & Fox, R. A. (1991). Mothers and fathers of young children: Comparison of parenting styles. *Psychological Reports*, 69, 320–322. doi:10.2466/pr0.1991.69.1.320
- Bornstein, L., & Bornstein, M. H. (2007). Parenting styles and child social development. *Encyclopedia on Early Childhood Development*, 9–20. doi:10.1007/978-90-481-9063-8 86
- Bronfenbrenner, U. (1986). Ecology of the family as a context for human development: Research perspectives. *Developmental Psychology*, 22, 723–742.
- Chen, F. F. (2007). Sensitivity of goodness of fit indexes to lack of measurement invariance. Structural Equation Modeling: A Multidisciplinary Journal, 14, 464–504. doi:10.1080/10705510701301834
- Chen, F. F., & West, S. G. (2008). Measuring individualism and collectivism: The importance of considering differential components, reference groups, and measurement invariance. *Journal* of Research in Personality, 42, 259–294. doi:10.1016/j.jrp.2007.05.006
- Conger, R. D., McCarty, J. A., Yang, R. K., Lahey, B. B., & Kropp, J. P. (1984). Perception of child, child-rearing values, and emotional distress as mediating links between environmental stressors and observed maternal behavior. *Child Development*, 55, 2234–2247. doi:10.2307/ 1129795
- Conti, R. (2015). Compassionate parenting as a key to satisfaction, efficacy and meaning among mothers of children with autism. *Journal of Autism and Developmental Disorders*, 45, 2008–2018. doi:10.1007/s10803-015-2360-6
- Croft, A., Schmader, T., & Block, K. (2015). An underexamined inequality: Cultural and psychological barriers to men's engagement with communal roles. *Personality and Social Psychology Review*, 19, 343–370. doi:10.1177/1088868314564789
- Darling, N., & Steinberg, L. (1993). Parenting style as context: An integrative model. *Psychological Bulletin*, 113, doi:10.1037/0033-2909.113.3.487
- Davis-Kean, P. E. (2005). The influence of parent education and family income on child achievement: The indirect role of parental expectations and the home environment. *Journal of Family Psychology*, 19, 294–304. doi:10.1037/0893-3200.19.2.294
- Deutsch, F. M. (2001). Equally shared parenting. *Current Directions in Psychological Science*, *10*, 25–28. doi:10.1111/1467-8721.00107
- Dix, T. (1992). Parenting on behalf of the child: Empathic goals in the regulation of responsive parenting. In I. E. Sigel, A. V. McGillicuddy-DeLisi, & J. J. Goodnow (Eds.), *Parental belief systems: The psychological consequences for children* (2nd ed., pp. 319–346). Hillsdale, NJ: Lawrence Erlbaum Associates.

- Dix, T., & Branca, S. H. (2003). Parenting as a goal-regulation process. In L. Kuczynski (Ed.), *Handbook of dynamics in parent-child relations* (pp. 167–187). Newbury Park, CA: Sage Publications.
- Dix, T., Gershoff, E. T., Meunier, L. N., & Miller, P. C. (2004). The affective structure of supportive parenting: Depressive symptoms, immediate emotions, and child-oriented motivation. *Developmental Psychology*, 40, 1212–1227. doi:10.1037/0012-1649.40.6.1212
- NICHD Early Child Care Research Network (2000). Factors associated with fathers' caregiving activities and sensitivity with young children. *Journal of Family Psychology*, *14*, 200–219. doi: 10.1037/0893-3200.14.2.200
- Endendijk, J. J., Groeneveld, M. G., Bakermans-Kranenburg, M. J., & Mesman, J. (2016). Gender-differentiated parenting revisited: Meta-analysis reveals very few differences in parental control of boys and girls. *PLoS One*, 11, e0159193. doi:10.1371/journal.pone.0159193
- Fox, J., & Weisberg, S. (2011). *An [R] Companion to Applied Regression* (2 ed.). Thousand Oaks CA: Sage. Retrieved from http://socserv.socsci.mcmaster.ca/jfox/Books/Companion
- Galambos, N. L. (1992). Parent-adolescent relations. *Current Directions in Psychological Science*, *1*, 146–149. doi:10.1111/1467-8721.ep11510316
- Galovan, A. M., & Schramm, D. G. (2017). Initial coparenting patterns and postdivorce parent education programming: A latent class analysis. *Journal of Divorce and Remarriage*, 58, 212–226. doi:10.1080/10502556.2017.1303320
- Grusec, J. E., Goodnow, J. J., & Kuczynski, L. (2000). New directions in analyses of parenting contributions to children's acquisition of values. *Child Development*, 71, 205–211. doi:10. 1111/1467-8624.00135
- Hastings, P. D., & Grusec, J. E. (1998). Parenting goals as organizers of responses to parent-child disagreement. *Developmental Psychology*, 34, 465–479. doi:10.1037/0012-1649.34.3.465
- Hoff, E., Laursen, B., Tardif, T., & Bornstein, M. H. (2002). Socioeconomic status and parenting. Handbook of Parenting Volume 2: Biology and Ecology of Parenting, 8, 231–252. doi:10.2307/353999
- Jorgensen, T. D., Kite, B. A., Chen, P. Y., & Short, S. D. (2017). Permutation randomization methods for testing measurement equivalence and detecting differential item functioning in multiple-group confirmatory factor analysis. *Psychological Methods*. doi:10.1037/met0000152
- Kline, R. B. (2005). *Principles and practice of structural equation modeling* (2nd ed.). New York, NY: Guilford Press.
- Kopystynska, O., Paschall, K. W., Barnett, M. A., & Curran, M. A. (2017). Patterns of interparental conflict, parenting, and children's emotional insecurity: A person-centered approach. *Journal of Family Psychology*, 31, 922–932. doi:10.1037/fam0000343
- Kushlev, K., Dunn, E. W., & Ashton-James, C. E. (2012). Does affluence impoverish the experience of parenting? *Journal of Experimental Social Psychology*, 48, 1381–1384. doi:10.1016/j. jesp.2012.06.001
- Lakens, D. (2017). Equivalence tests: A practical primer for t tests, correlations, and meta-analyses. Social Psychological and Personality Science, 8, 355–362. doi:10.1177/1948550617697177
- Lakens, D., McLatchie, N., Isager, P. M., Scheel, A. M., & Dienes, Z. (2018). Improving inferences about null effects with Bayes factors and equivalence tests. *The Journals of Gerontology: Series B*.

Lareau, A. (2015). Cultural knowledge and social inequality. American Sociological Review, 80, 1–27. Retrieved from http://doi.org/10.1177/0003122414565814

- Le, B. M., & Impett, E. A. (2015). The rewards of caregiving for communally motivated parents. Social Psychological and Personality Science, 6, 758–765. doi:10.1177/ 1948550615581498
- Le, B. M., & Impett, E. A. (2017). Parenting goal pursuit is linked to emotional well-being, relationship quality, and responsiveness. *Journal of Social and Personal Relationships*. doi: 10.1177/0265407517747417
- Lytton, H., & Romney, D. M. (1991). Parents' differential socialization of boys and girls: A meta-analysis. Psychological Bulletin, 109, 267–296. doi:10.1037/0033-2909.109.2.267
- Masyn, K. E., Henderson, C. E., & Greenbaum, P. E. (2010). Exploring the latent structures of psychological constructs in social development using the dimensional-categorical spectrum. *Social Development*, 19, 470–493. doi:10.1111/j.1467-9507.2009.00573.x
- McNally, S., Eisenberg, N., & Harris, J. D. (1991). Consistency and change in maternal child-rearing practices and values: A longitudinal study. *Child Development*, 62, 190–198. doi:10.1111/j.1467-8624.1991.tb01524.x
- Meredith, W. (1993). Measurement invariance, factor analysis and factorial invariance. Psychometrika, 58, 525–543. doi:10.1007/BF02294825
- Moon, M., & Hoffman, C. (2008). Mothers' and fathers' differential expectancies and behaviors: Parent × child gender effects. *The Journal of Genetic Psychology: Research and Theory on Human Development*, 169, 261–279.
- Morey, R. D., Rouder, J. N., & Jamil, T. (2014). *BayesFactor: Computation of Bayes factors for common designs* (R Package Version 0.9, 8).
- Mowder, B. A., Harvey, V. S., Moy, L., & Pedro, M. (1995). Parent role characteristics: Parent views and their implications for school psychologists. *Psychology in the Schools*, *32*, 27–37.
- Pew Research Center (December 17, 2015). Parenting in America: Outlook, worries, aspirations are strongly linked to financial situation. Retrieved from http://www.pewsocialtrends.org/2015/12/17/parenting-in-america/
- R Core Team. (2018). R: A language and environment for statistical computing. Vienna, Austria: R Foundation for Statistical Computing. Retrieved from http://www.R-Project.org/
- Rolland, J. S., & Walsh, F. (2009). Family systems theory and practice. In *Textbook of psychother-apeutic treatments* (pp. 499–531).
- Rosseel, Y. (2012). lavaan: An R package for structural equation modeling. *Journal of Statistical Software*, 48, 1–36. doi:10.18637/jss.v048.i02
- Rouder, J. N., Haaf, J. M., & Vandekerckhove, J. (2018). Bayesian inference for psychology, part IV: Parameter estimation and Bayes factors. *Psychonomic Bulletin and Review*, 25, 102–113. doi:10.3758/s13423-017-1420-7
- Schoppe-Sullivan, S. J., Kotila, L. E., Jia, R., Lang, S. N., Bower, D. J., Kotila, L. E., . . . Lang, S. N. (2013). Comparisons of levels and predictors of mothers' and fathers' engagement with their preschool- aged children. *Early Child Development and Care*, 183, 498–514. doi:10.1080/03004430.2012.711596
- semTools Contributors. (2015). semTools: Useful tools for structural equation modeling. R package version 0.4-9. Retrieved from http://cran.r-project.org/package=semToo
- Smetana, J. G. (2015). Goals and goal pursuit in the context of adolescent-parent relationships. In G. Oettingen & P. M. Gollwitzer (Eds.), *Self-regulation in adolescence; self-regulation in*

- adolescence (pp. 243-265, Chapter xviii, 424 Pages). New York, NY: Cambridge University Press.
- Starrels, M. (1994). Gender differences in parent-child relations. *Journal of Family Issues*, 15, 148–165. doi:10.1177/019251394015001007
- Steinberg, L. (1988). Reciprocal relation between parent-child distance and pubertal maturation. Developmental Psychology, 24, 122–128. doi:10.1037/0012-1649.24.1.122
- Viechtbauer, W. (2010). Conducting meta-analyses in R with the metafor package. *Journal of Statistical Software*, *36*, 1–48. Retrieved from http://www.jstatsoft.org/v36/i03/
- Wagenmakers, E. J. (2007). A practical solution to the pervasive problems of p values. Psychonomic Bulletin and Review, 14, 779–804. doi:10.3758/BF03194105
- Woods, C. M., & Grimm, K. J. (2011). Testing for nonuniform differential item functioning with multiple indicator multiple cause models. *Applied Psychological Measurement*, 35, 339–361. doi:10.1177/0146621611405984