

Research Article

How Do Own and Siblings' Genders Shape Caregivers' Risk of Perceiving Care-Related Criticism From Siblings?

Marissa M. Rurka, PhD,¹ J. Jill Suito, PhD,² Megan Gilligan, PhD,^{3,*} and Robert T. Frase, MS²

¹Center for Health and Research Transformation, University of Michigan, Ann Arbor, MI, USA. ²Department of Sociology, Purdue University, West Lafayette, IN, USA. ³Department of Human Development and Family Studies, Iowa State University, 2222 Osborn Dr., Ames, IA, 50011, USA.

*Address correspondence to: Megan Gilligan, PhD, Iowa State University, USA. E-mail: mgilliga@iastate.edu

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Abstract

Objectives: Caring for a parent takes a greater psychological toll on daughters than sons. To minimize the psychological burden of parent care, it is important to understand what contributes to this gender disparity. Inspired by the caregiver stress process model and gender-as-relational perspective, we investigate how caregivers' gender, and the genders of their siblings, shape their risk of perceiving care-related criticism from siblings, a secondary stressor of caregiving with negative implications for psychological well-being.

Methods: Using data from 408 adult child caregivers nested within 231 families collected as part of the Within-Family Differences Study, we employ multilevel modeling to examine how caregivers' gender, as well as the gender composition of their sibship, interact to shape caregivers' probability of perceiving criticism from siblings regarding the care that they provide their mother. Qualitative data from the same caregivers are then analyzed to illuminate processes underlying these statistical associations.

Results: Quantitative analyses reveal that daughters in predominantly-son sibships have a lower risk of perceiving care-related criticism than daughters in sibships with higher proportions of daughters. Qualitative analyses elucidate these findings. Daughters in predominantly-son sibships report that their siblings defer to them regarding their mother's care. Conversely, daughters in higher proportion-daughter sibships perceive care-related criticism because they and their sibling(s) hold conflicting views regarding care, and there is less consensus regarding who best understands their mother's care needs and preferences.

Discussion: Findings demonstrate how characteristics of caregivers and their sibships interact to affect caregivers' risk of perceiving criticism regarding their care to their mothers.

Keywords: Caregiving, Family sociology, Mixed methods, Social networks, Social psychology

Adult children play a vital role in the care of older adults (Reinhard et al., 2019). Caring for one's parents, however, can take a toll on adult children's psychological health (National Academies of Sciences, Engineering, and Medicine, 2016; Pinquart & Sörensen, 2003). The consequences of caregiving are even more pronounced among

women. Women caregivers experience greater caregiver burden and psychological distress than men caregivers (Garlo et al., 2010; Kim et al., 2012; National Alliance for Caregiving & AARP [NAC & AARP], 2020; Pillemer et al., 2018; Pinquart & Sörensen, 2006; Reynolds & James, 2021; Riffin et al., 2019). Within the context of parent care, this

same pattern emerges with daughters experiencing greater caregiver stress and burden than sons (Chappell et al., 2015; Kim et al., 2007; Raschick & Ingersoll-Dayton, 2004). In order to minimize the psychological toll of caregiving, it is important to understand what contributes to increased psychological distress among daughters providing parent care.

To explain why daughters experience greater care-related burdens and distress than sons, scholars most often refer to gender disparities in the nature and magnitude of the care provided (National Academies of Sciences, Engineering, and Medicine, 2016). Daughters tend to provide more hours of care (Grigoryeva, 2017; Lin & Wolf, 2020; Pinguart & Sørensen, 2006), more routine care (Matthews, 2002), and assist with more care tasks (Pinguart & Sørensen, 2006), all factors that are associated with increased caregiver burden and distress (National Academies of Sciences, Engineering, and Medicine, 2016; Pinguart & Sørensen, 2003). However, the caregiver stress process model (Aneshensel et al., 1995; Pearlin et al., 1990) emphasizes that these primary stressors are just the tip of the iceberg. Primary stressors of caregiving give rise to secondary stressors of caregiving, including family conflict, guilt, and threats to one's self-concept, which can be just as damaging to caregivers' psychological health (Aneshensel et al., 1995; Pearlin et al., 1990). In this article, we explore whether there are gender differences in one such secondary stressor: care-related criticism from siblings. This stressor has been linked with both increased family conflict and increased psychological distress (Brody et al., 1989; Matthews, 2002; Rurka et al., 2021) among adult children providing parent care. In fact, daughters may be particularly vulnerable to the negative psychological ramifications of this stressor; according to one study, daughters were more likely than sons to experience psychological strain when they perceived that their sibling was critical of them for not providing enough care to their mother (Brody et al., 1989). By examining how gender shapes caregivers' probability of perceiving care-related criticism from siblings, this article aims to contribute to a more complete understanding of factors that fuel gender disparities in caregiver burden and distress.

According to the gender-as-relational perspective (Connell, 2005; Springer et al., 2012), the implications of gender are inherently situational. As a result, in order to fully understand how gender shapes caregivers' risk of perceiving care-related criticism from siblings, one must consider the family structure in which that care takes place. Consequently, in this article we examine how caregivers' risk of perceiving care-related criticism from siblings is shaped not only by their own gender, but also by the genders of their siblings. To do so, we use a mixed-methods approach, analyzing both quantitative and qualitative data from 408 adult children providing care to their mother.

Caregiver Gender and Threat of Perceived Sibling Criticism

The preponderance of studies on gender and caregiving suggests that daughters and sons have different

caregiving expectations for themselves and are held to different standards as caregivers. These gendered patterns are often attributed to gender socialization. From childhood, daughters are often encouraged to cultivate and value interpersonal relationships, particularly family relationships, whereas sons are encouraged to pursue and value instrumental success beyond the family (Chodorow, 1978; Gilligan, 1982). Consequently, daughters are more likely than sons to perceive that they have a filial obligation to care for their parents, and sons are more likely to believe that they have "legitimate excuses" (e.g., career obligations) for limiting or avoiding parent care responsibilities (Brody et al., 1989; Finch & Mason, 1993; Folbre, 2012). These perceptions are often reinforced by others within the family and society, as individuals are likely to perceive sons' excuses for not participating in parent care to be more legitimate than daughters' excuses (Campbell & Martin-Matthews, 2003; Finch & Mason, 1993; Ingersoll-Dayton et al., 2003). Due to the higher expectations that are often placed on and internalized by daughters, it is possible that daughters are at greater risk of falling short of these expectations and, in turn, perceiving care-related criticism from siblings than sons.

On the other hand, women are often perceived to be more "naturally skilled at" and "suited for" care work (Cancian & Olicker, 2000; Hequembourg & Brallier, 2005; Ingersoll-Dayton et al., 2003; Kokorelias et al., 2022). Additionally, mothers tend to have closer relationships with and express preferences for daughters as caregivers (Suitor & Pillemer, 2006; Suitor et al., 2013). Given that daughters are often perceived to be more natural, experienced, qualified, and preferred caregivers, it is possible that they are perceived to better understand their mother's care needs and preferences. As a result, daughters may be at a reduced risk of perceiving care-related criticism from their siblings.

Taken together, this body of work highlights that daughters and sons are often subject to different expectations as caregivers. We anticipate that these gendered expectations will influence how siblings assess one another's caregiver performances. Consequently, we hypothesize that caregivers' gender will shape their probability of perceiving care-related criticism from siblings.

Gender Composition of the Sibship and Threat of Perceived Sibling Criticism

The gender-as-relational theoretical perspective (Connell, 2005; Springer et al., 2012) encourages scholars to consider the larger context in which care takes place. In particular, it posits that the implications of gender are situational and has been applied to demonstrate how one's care work is shaped, not only by one's own gender, but by the gender of others in the care network (Reczek & Umberson, 2016; Umberson et al., 2017).

The gender composition of the sibship in which caregivers are embedded plays an important role in shaping their exposure to primary stressors of parent care, such as the amount and types of care provided. One study found that, for both sons and daughters, the more sisters one had, the fewer hours of parent care one provided; however, the number of brothers that one had did not influence the hours of care that sons or daughters provided (Grigoryeva, 2017). Another study found that families with a higher proportion of daughters reported a more equal division of parent care hours (Lin & Wolf, 2020). In mixed-gender sibships, sisters are more likely to provide routine care to parents, whereas brothers' contributions are more sporadic (Matthews, 2002). Sisters often take the lead in organizing the provision of care to parents and express frustration toward brothers who fail to follow their instructions or contribute equally (Kokorelias et al., 2022; Matthews, 2002). Sister-only sibships tend to work in concert to provide care to parents (Matthews & Rosner, 1988), and brother-only dyads work independently to provide care (Matthews & Heidorn, 1989).

Empirical research on gender dynamics within the context of parent care offers insight into how the gender composition of the sibling networks in which caregivers are embedded might shape their likelihood of perceiving care-related criticism from siblings. According to this body of work, daughters and sons tend to have different standards for what it means to be a "good caregiver" (Hequembourg & Brallier, 2005; Matthews, 2002). For daughters, being a good caregiver often involves actively monitoring, anticipating, and providing for all of their parents' needs; for sons, being a good caregiver often means responding to parents' requests for assistance, as well as promoting their parents' autonomy and independence (Matthews, 2002). In a qualitative study of daughter and son caregivers to older parents, Matthews (2002) found that these discrepant standards regarding what it means to be a "good caregiver" lead to greater discord in mixed-gender families. Given that daughters and sons tend to have different ideas of what it means to be a good caregiver, it is possible that caregivers in mixed-gender sibships are at greater risk of perceiving criticism from a sibling who does not agree with their approach to care.

Alternatively, given that daughters tend to be perceived as more natural, qualified, and preferred caregivers compared to sons (Cancian & Oliker, 2000; Hequembourg & Brallier, 2005; Ingersoll-Dayton et al., 2003; Kokorelias et al., 2022; Matthews, 2002; Sutor et al., 2013), it is possible that sons feel less authority to criticize the care that their sisters provide. Consequently, daughters in sibships with a larger share of brothers may be less likely to perceive sibling criticism than daughters in sibships with a larger share of daughters.

The Current Study

Perceived care-related criticism from siblings is a secondary stressor of caregiving with implications for caregivers'

sibling relationships and psychological well-being (Brody et al., 1989; Matthews, 2002; Rurka et al., 2021). Based on the gender-as-relational perspective (Connell, 2005; Springer et al., 2012), as well as empirical work on gendered patterns and stressors of parent care (Brody et al., 1989; Ingersoll-Dayton et al., 2003; Kokorelias et al., 2022; Matthews, 2002), we hypothesize that caregivers' gender, as well as the genders of their siblings, will shape their risk of exposure to this stressor. Using data from 408 caregivers nested within 231 families collected as part of the Within-Family Differences Study (WFDS), quantitative analyses are conducted to examine how caregivers' gender, as well as the gender composition of the sibship in which they are embedded, interact to shape caregivers' probability of perceiving criticism from siblings regarding the care that they provide their mother. To shed light on the processes underlying statistical associations, qualitative data from the same sample of caregivers are then analyzed.

Method

Procedures

Quantitative and qualitative data for our analyses were collected as part of the WFDS. Massachusetts city and town lists were used as the source of the original study sample. With the assistance of the Center for Survey Research at the University of Massachusetts, Boston, the researchers drew a probability sample of women ages 65–75 with two or more children from the greater Boston area. The Time 1 sample consisted of 566 mothers, which represented 61% of those who were eligible for participation, a rate comparable to that of similar surveys in the 2000s (Wright & Marsden, 2010). Approximately 63% of the mothers agreed to provide contact information for their children; approximately 70% of those children agreed to participate, resulting in a sample of 774 children. Mothers and their adult children were interviewed between 2001 and 2003.

From 2008 to 2011, the original study was expanded to include a second wave of data collection. The survey team attempted to contact each mother who participated in the original study to schedule a 60–90 min in-person interview. At T2, 420 mothers were interviewed. Of the 146 mothers who participated at only T1, 78 had died between waves, 19 were too ill to be interviewed, 33 refused, and 16 could not be reached. Thus, the 420 represent 86% of mothers who were living at T2. Comparisons between the mothers alive at T2 who did and did not participate revealed that those who participated were better educated and in better health. Comparing the T1 and T2 samples revealed that mothers who were not interviewed at T2 were less healthy, less educated, less likely to have been married at T1, and more likely to be Black.

Following the interview, mothers were asked for their adult children's contact information; at T2, 81% of the mothers provided contact information—a rate higher

than typically found in studies of multiple generations (Kalmijn & Liefbroer, 2011). Seventy-five percent of the adult children for whom contact information was available agreed to participate, resulting in a final sample of 826 children nested within 360 families. Semistructured interviews with the adult children were conducted on the telephone and lasted approximately 45–60 min. Analyses comparing mothers with and without participating children revealed no differences between these two groups in terms of race, marital status, education, age, or number of children; daughters, married offspring, and those with higher education were slightly more likely to participate, consistent with other studies of multiple generations (Kalmijn & Liefbroer, 2011). (For a detailed description of the study design, see Rurka et al., 2021 or Suito et al., 2013, where portions of this section have been published previously.)

It is important to note that a comparison of the study sample with Census data on women in the same cohort living in the Boston metropolitan area revealed little differences in standard demographic characteristics (e.g., education and marital status), with the exception that the present study had a substantially higher proportion of Black women, due to a design decision to oversample by race. Furthermore, although adult children and older parents in the Northeast are more likely to live in close proximity to one another than are families in other regions of the country (Choi et al., 2020), an investigation using data from the National Survey of Families and Households found that the only regional differences in intergenerational contact and closeness were between Southern families and all other families (Sechrist et al., 2007).

Analytic Sample

The analytic sample was restricted to only adult children who reported at T2 that they had provided their mother assistance with at least one Instrumental Activity of Daily Living (IADL) or Activity of Daily Living (ADL; i.e., light housework, transportation, food shopping, dressing, eating, bathing, and toileting) or for a serious illness or injury in the past 5 years. In order to examine patterns of perceived sibling criticism regarding the care adult children provided their mother, caregivers had to have at least one living sibling at T2. Based on these criteria, 67 adult children were omitted from the analytic sample because their mothers had died between T1 and T2, nine were omitted because they had no living siblings at T2, 264 were omitted because their mothers required no care in the previous 5 years, and 78 were omitted because they did not provide any care to their mothers for ADL/IADL needs or recent illnesses or injuries. Thus, the analytic sample for quantitative and qualitative analyses is comprised of 408 caregivers nested within 231 families. Differences between adult children who did and did not provide care to

mothers who needed assistance were consistent with those found in other studies (Leopold et al., 2014; Pillemer & Suito, 2014); those who provided care were more likely to be daughters and live in closer proximity to mothers, and less likely to be middle-born (compared to eldest or youngest) and have completed college. Children in Black families were also more likely to provide care than were those in White families.

Table 1 displays descriptive statistics for the analytic sample.

Quantitative Measures

Dependent variable

The dependent variable for the quantitative analysis is *perceived sibling criticism* at T2. To measure perceived sibling criticism, caregivers were asked: “Has your sibling/ Have any of your siblings ever been critical of the ways in which you help your mother, including how you help or the amount of time you spend helping?” Caregivers were coded as 1 if they perceived that at least one sibling was critical and as 0 if they did not perceive that any siblings were critical.

Independent variable

Caregiver’s gender is the central independent variable; 1 = daughter; 0 = son.

Table 1. Descriptive Statistics (*N* = 408 Caregivers Nested Within 231 Families)

Caregiver-level	(<i>N</i> = 408)
Perceived sibling critical (%)	14.71
Daughter (%)	62.25
Primary caregiver (%)	46.57
Married (%)	73.04
Number of children (<i>M, SD</i>)	1.92 (1.45)
Employed (%)	80.15
College graduate (%)	56.86
Coreside (%)	11.27
Birth order	
Youngest (%)	25.25
Middle (%)	44.85
Eldest (%)	29.90
Family characteristics	(<i>N</i> = 231)
Sibship size (<i>M, SD</i>)	3.86 (1.68)
Gender composition of the sibship	
All sons (%)	9.96
Predominantly sons (%)	22.51
Balanced gender (%)	33.77
Predominantly daughters (%)	21.65
All daughters (%)	12.12
White (%)	75.32

Note: *SD* = standard deviation.

Moderating variable

Gender composition of the sibship was measured as the proportion of living adult daughters in the sibship at T2. Sibships were then categorized into the following groups: 1 = all sons; 2 = predominantly sons (proportion daughters less than 0.33, but greater than 0); 3 = balanced gender (proportion daughters was greater than 0.33, but less than 0.66); 4 = predominantly daughters (proportion daughters was greater than 0.66, but less than 1); and 5 = all daughters. Gender composition of the sibship was categorized in this way to allow for nonlinear patterns to unfold.

There are some limitations to operationalizing the gender composition of the sibship in this way. The proportion of daughters in a sibship is influenced by sibship size; notably, caregivers in all-daughter and all-son sibships tend to have fewer siblings on average (2.7 and 3.2, respectively), compared to other sibship types (4.1 in predominantly-son families, 4.2 in balanced families, and 4.1 in predominantly-daughter families). To account for this, we included sibship size as a covariate in the analyses.

Covariates

Our analyses control for several factors which previous empirical and theoretical research suggests may also influence caregivers' risk of perceiving care-related criticism from their siblings.

Caregiver-level covariates.— For *caregiver status*, respondents were coded as primary caregivers (1) if they reported that they helped their mother the most or were tied with one or more of their siblings for providing their mother with the most assistance for an illness or injury or for the most ADL/IADL tasks; respondents were coded as secondary caregivers (0) if they reported they provided their mother assistance for an illness or injury or with ADLs/IADLs, but they did not provide as much assistance as one or more of their siblings. *Birth order* was coded as 0 = youngest child, 1 = middle child, and 2 = eldest child. *Marital status* was coded as 1 = married; 0 = not married. The *number of children* that a caregiver had was included in the model as a continuous variable. *Employment status* was measured using respondents' reports of whether they were currently working at a job for pay; 1 = employed, 0 = unemployed. *Educational status* was coded as 1 = college degree, and 0 = no college degree. *Coresidential status* was coded as 1 = coresided with mother, and 0 = did not coreside with mother.

Family-level covariate.— *Sibship size* was measured as the number of living adult children in the family at T2. *Race* was measured by asking mothers a series of questions regarding their race and ethnicity (e.g., White, Black/African American, Hispanic/Latina, Native American, and Asian). They were instructed that they could choose more than

one race or ethnicity. For these analyses, race was coded as 1 = White only; 0 = Black, Indigenous, and People of Color (BIPOC).

Qualitative Measures

The full transcripts from the interviews of each caregiver were examined, taking into consideration their responses to open-ended questions and any relevant comments made throughout the interviews. Some open-ended questions that proved to be particularly useful include caregivers' explanations of why they or a sibling provided "the most help to your mother" or was the one their mother would "prefer to help her." In addition, important insights were often derived from caregivers' responses to what their sibling(s) "has/have said or done" to make them perceive that they were supportive or critical of "how you help or the amount of time you spend helping," as well as why the caregiver was critical of the "ways in which your sibling/siblings helped your mother, including how they/he/she helped or the amount of time spent helping."

Analytic Strategy

Mixed-methods approaches provide richer and more holistic understandings of social processes (Creswell & Plano Clark, 2017). Leveraging both quantitative and qualitative data from the WFDS allows us to investigate (a) the effect of gender and sibship gender composition on perceived care-related criticism from siblings and (b) the processes underlying these patterns.

Plan of quantitative analysis

The aim of the quantitative analysis was to explore how caregivers' gender and the gender composition of the sibship in which they are embedded interact to shape caregivers' probability of perceiving sibling criticism regarding their caregiver performance. To achieve this aim, we fit a multilevel logistic regression model predicting perceived sibling criticism. Multilevel modeling is used because caregivers are nested within families, and thus observations are not independent. To assess how caregivers' gender and the gender composition of their sibship interact to shape caregivers' probability of perceiving sibling criticism, an interaction term for the two variables is included in the model. Given the dependent variable in this analysis is categorical, predicted probabilities and average marginal effects (AMEs) are calculated to test the interaction (Mize, 2019; Mustillo et al., 2018). First, we fit the multilevel logistic regression model predicting perceived sibling criticism; then, we run postestimation analyses to calculate the predicted probabilities of perceiving sibling criticism for daughters and sons in each sibship type. AMEs are then calculated to summarize the effect of the caregiver's gender and gender composition of the sibship in terms of differences in the predicted

probabilities among all of the gender and sibship type combinations. When calculating average marginal effects, random effects were integrated out to address the random intercept in the model, as recommended by Bland and Cook (2019). Once the sample was restricted to adult children with at least one living sibling, whose mother was alive, and who reported that they had provided care to their mother in the previous 5 years, there was no missing data on any of the variables included in the analysis. Analyses were conducted using Stata 17 (StataCorp, College Station, TX).

Plan of qualitative analysis

The aim of the qualitative analysis was to gain insight into social norms and processes underlying the patterns identified in the quantitative analyses. The qualitative data were analyzed according to the “immersion/crystallization” method for coding and analyzing data (Borkan, 2022), which involves an iterative process of immersion, crystallization, creative synthesis, and corroboration and searching for alternative explanations until one arrives at final interpretations. During the immersion phase, the first author reviewed the full transcripts for all 408 caregivers in the sample grouped by sibship type (all-son, predominantly-son, balanced, predominantly-daughter, and all-daughter sibships). The experiences and perspectives of sons and daughters were compared both across sibship categories, but also within the same sibship category. During the crystallization phase, the first author developed codes based on themes that emerged in caregivers’ descriptions of caregiving expectations, the division of care, and care-related criticism and tension. During the creative synthesis phase, emergent themes were discussed among all authors. These themes were considered in light of the quantitative findings and existing literature on gender dynamics within the context of parent care. Based on this reflection, a more focused

set of codes was developed that was informed by existing literature and useful for explaining the quantitative findings. During the corroboration/searching for alternative interpretations phase, we reimmersed ourselves in the data to identify cases that confirmed the patterns we had identified, as well as cases that were exceptions to the pattern. We then added codes or revised existing codes to account for potential alternative explanations. We continued to refine the codes through this iterative process of immersion, crystallization, creative synthesis, and corroboration/searching for alternative explanations until no new themes emerged and the set of codes provided a cohesive and compelling interpretation for the quantitative findings.

The main themes that emerged from this process included: (a) reliance on gender and gendered factors to shape caregiving expectations and authority; (b) concentration versus diffusion of caregiving expectations and authority; and (c) support for versus challenges to one’s approach to care.

All adult children included in the qualitative analysis were caregivers, and all names presented in the results are pseudonyms.

Results

Quantitative Findings

Table 2 presents caregivers’ predicted probabilities of perceiving care-related criticism from siblings by gender and gender composition of the sibship, controlling for covariates.

Daughters in predominantly-son sibships are significantly less likely to perceive sibling criticism than daughters in families with a higher proportion of daughters. Daughters in predominantly-son families have a 3% predicted probability of perceiving sibling criticism,

Table 2. Predicted Probability of Perceiving Sibling Criticism by Caregiver Gender and Gender Composition of the Sibship

		Predicted probability of sibling criticism (95% CI)	
		Caregiver gender	
		Son	Daughter
Gender composition of the sibship	All sons	0.12 (0.01 to 0.23)	N/A
	Predominantly sons	0.15 (0.05 to 0.25)	0.03 (−0.03 to 0.09) ^{a,b,c}
	Balanced	0.19 (0.09 to 0.29)	0.13 (0.06 to 0.21) ^a
	Predominantly daughters	0.07 (−0.06 to 0.19)	0.15 (0.08 to 0.23) ^b
	All daughters	N/A	0.26 (0.13 to 0.40) ^c

Notes: Findings are presented as predicted probabilities of perceiving care-related sibling criticism, controlling for primary caregiver status, birth order, marital status, caregivers’ number of children, employment status, educational status, whether the caregiver coresided with their mother, race, and sibship size. CI = confidence interval.

Superscripts indicate instances in which the average marginal effect (the difference between two predicted probabilities), is significant (p < .05).

^aDaughters in predominantly-son families have a significantly lower predicted probability of perceiving care-related sibling criticism than daughters in balanced gender families.

^bDaughters in predominantly-son families have a significantly lower predicted probability of perceiving care-related sibling criticism than daughters in predominantly daughter families.

^cDaughters in predominantly-son families have a significantly lower predicted probability of perceiving care-related sibling criticism than daughters in all daughter families.

All sons refers to sibships with a proportion daughters of 0. Predominantly sons refers to sibships with a proportion daughters of 0.33 or less, but greater than 0. Balanced refers to sibships with a proportion daughters greater than 0.33 but less than 0.66. Predominantly daughters refers to sibships with a proportion daughters of 0.66 or greater, but less than 1. All daughters refers to sibships with a proportion daughters of 1.

compared to 13% for daughters in balanced-gender families ($AME = -0.10, p < .05$), 15% for daughters in predominantly-daughter families ($AME = -0.12, p < .05$), and 26% for daughters in all-daughter families ($AME = -0.23, p < .01$).

Sons' likelihood of perceiving care-related criticism from siblings is not significantly related to the gender composition of the sibships in which they are nested (see Table 2). However, caution should be observed when interpreting this finding. Due to the fact that these analyses are less powered to detect significant differences for sons than for daughters, we advise readers not to interpret these findings as definitive evidence that sons' probability of perceiving care-related criticism is unrelated to the gender composition of their sibships.

Figure 1 demonstrates how gender and gender composition of the sibship interact to shape caregivers' predicted probability of perceiving care-related criticism from siblings. For daughters, the predicted probability of perceiving sibling criticism increases as the proportion of daughters in the sibship increases. Among sons, predicted probabilities suggest that the relationship between the proportion of daughters in the family and the probability of perceiving sibling criticism does not follow as linear of a pattern.

Given that sibship size is an aspect of family context that we hypothesized might have implications for caregiver's likelihood of perceiving sibling criticism, we included sibship size as a family-level covariate in the analyses. It is worth noting, however, that sibship size did not have a significant direct effect on caregivers' probability of perceiving criticism from siblings.

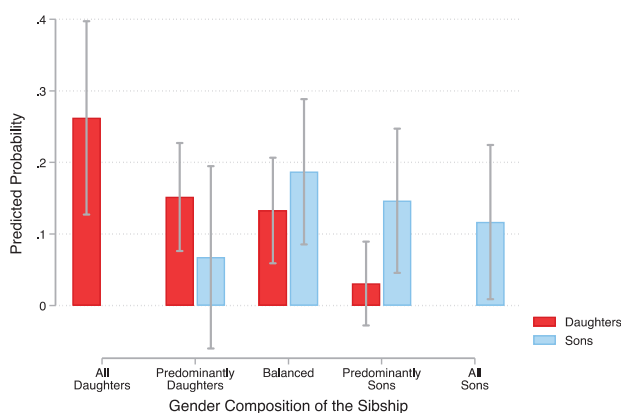


Figure 1. Predicted probability of perceiving sibling criticism by caregiver gender and gender composition of the sibship. *Notes:* All sons refers to sibships with a proportion daughters of 0. Predominantly sons refers to sibships with a proportion daughters of 0.33 or less, but greater than 0. Balanced refers to sibships with a proportion daughters greater than 0.33 but less than 0.66. Predominantly daughters refers to sibships with a proportion daughters of 0.66 or greater, but less than 1. All daughters refers to sibships with a proportion daughters of 1. Controlling for primary caregiver status, birth order, marital status, caregivers' number of children, employment status, educational status, whether the caregiver coresided with their mother, race, and sibship size.

Qualitative Findings

We now turn to the qualitative data to gain insight into why daughters in predominantly-son sibships have a notably lower probability of perceiving care-related criticism than daughters in sibships with a higher proportion of daughters.

Reliance on gender and gendered factors to shape caregiving expectations and authority

In all mixed-gender sibship types, daughters explicitly rely on gender to rationalize caregiving expectations and the division of parent care. What makes the dynamics in predominantly-son sibships unique is that gender expectations are more likely to be concentrated on a single daughter or pair of daughters. For example, one caregiver describes that, as the only daughter in the sibship, her mother would feel more comfortable with her as a caregiver because of her gender and because of the unique and special “mother-daughter” bond they share:

Just the whole mother-daughter connection, you know, just feeling comfortable with me, um, I just think her relationship with me given that we are mother and daughter and I am her only daughter, I just think that she would feel comfortable with me if there were certain things that I needed to do for her. (Daughter, predominantly son sibship with one daughter and two sons)

In sibships with a higher proportion of daughters, these gender expectations are often shared among a group of daughters. For example, when asked who she perceives her mother would prefer as a caregiver, one daughter in a balanced-gender sibship of three daughters and two sons says:

I think she would happily take any one of the girls. Any one of the girls would be fine; she would choose any one of them. (Daughter, balanced gender sibship of three daughters and two sons)

As a result, while gender is a factor that shapes caregiving expectations in sibships with a higher proportion of daughters, adult children in these sibships are less able to rely on gender alone to ascribe caregiving expectations.

In addition to explicit mentions of gender, daughters in all family types describe that they are held to a higher standard of care due to factors that have been identified as highly gendered. Caregivers often describe competing obligations, such as work and family obligations, as factors that shape the caregiving expectations and division of parent care in their sibship. For sons, these competing obligations are often seen as legitimate excuses for taking a secondary role in their mother's care; however, for many daughters, these experiences are seen as evidence that they are the best suited to the role of the caregiver because they have experience with care work (e.g., nurse and mother). Daughters are more likely to be described as having a “caring” and

“nurturing” personality that makes them a natural fit for the caregiving role. In addition, daughters are often held to a higher caregiving standard because they have a close relationship with their mother and, therefore, are the child who their mother is most comfortable with and who best understands their needs.

Concentration versus diffusion of caregiving expectations and authority

In predominantly-son sibships, gender and gendered factors often combine to set a daughter even further apart as the best-suited, and thus the natural choice for a primary caregiver. This is evidenced by the fact that daughters in these families often describe that there are multiple factors that make them the best-suited for the role of primary caregiver:

I guess I would have to say that they um they look to me to be that support role, because uh, I am the oldest girl, but uh I'm also a nurse, and uh I have that type of personality, I guess. (Daughter, predominantly son sibship of two daughters and four sons)

In contrast, in families with a higher proportion of daughters, adult children often rely on gendered factors to determine which of the daughters should be the authority and set the standard for their mother's care. With a greater share of daughters, however, there are more instances in which multiple daughters feel that they have a claim to this role.

For example, in one all-daughter family of seven daughters, three daughters perceive that they are their mother's preferred caregiver. One daughter maintains that she is her mother's preferred caregiver because “I have more experience with that type of background—I'm a CNA.” The other two daughters each perceive that their mother turns to them when she has care needs because they have a close, unique bond. For example, one of the daughters describes:

We've got a great understanding. She can talk to me sometimes when she can't talk to others ... I do more for her than most of my sisters. I am always there, you know, not to take anything from them—but she always calls me. (Daughter, all daughter sibship of seven daughters)

As a result, in sibships with a higher proportion of daughters, it is less common for a single sibling to emerge as the natural and obvious authority on their mother's care.

Support for versus challenges to one's approach to care

In predominantly-son sibships, there tends to be more consensus about who is the mother's preferred caregiver, as well as which child is best suited for the role: the/a daughter. These daughters are often expected to take lead roles in their mother's care, but also face fewer challenges regarding their care decisions and approaches to care. This is highlighted by the ways in which daughter caregivers in these

families often describe their siblings as passive, thankful supporters. For example, one daughter in a predominantly-son sibship describes that her two brothers:

Find comfort knowing that I am handling a certain situation like for instance when I take her to the hospital ... they don't come but they know that she is in good hands and that she is being well taken care of and so they find comfort in that. That goes for my dad, too. And they let me know that, you know, that they are appreciative of that. You know, it is less stress for them. I just call them when it is over, they love it. (Daughter, predominantly son sibship of one daughter and two sons)

In sibships with a higher proportion of daughters, there tends to be less consensus about who is the authority on their mother's care. When daughters are on the same page about mothers' care needs and preferences, then the lack of an obvious and natural authority does not translate into conflict and criticism. However, in instances in which daughters disagree about the appropriate amount of or approach to care, then daughters are more likely to perceive criticism from siblings regarding the care that they provide their mother.

For example, Jennifer, a daughter caregiver in an all-daughter sibship of two daughters, explains that she and her sister have different perspectives on the appropriate level of care for their mother. She perceives that her sister Laura is critical because “sometimes she will say she thinks I am doing too much,” but Jennifer is adamant, “I am not.” Jennifer shares that, although her sister has a medical background, she feels that her mother prefers her approach to care because “um again, I am just more sympathetic. I am closer to her.” Given her relationship with her mother, Jennifer maintains that she better understands her mother's needs. However, it is possible that her sister, Laura, feels that she better understands their mother's needs and is qualified to criticize Jennifer's approach to care given her medical background.

In families with a higher proportion of daughters, some caregivers also describe how different “camps” have formed in the family, with different and sometimes contradictory perspectives on their mother's care. For example, Clarissa, a daughter caregiver in a balanced-gender sibship with three daughters and two sons, describes that “there are like two camps in the family.” She says that one sister “totally spoils” their mother and “will focus everything on her,” and her other sister has “unrealistic expectations” for Clarissa as a caregiver. Clarissa feels that her brother Peter, however, is on her side. For example, she describes that Peter shares her view that her sister is too involved in their parents' care:

Well, Karen is the one who calls every hour to my parents and so she is overly involved. In fact my brother and I have said, this is very weird, you know, she is overly involved in everything they do and I work with

a lot of multi-handicap, well my parents aren't that bad that they need that intervention and I think she tries to helicopter manage them and in fact they do very well. (Daughter, balanced sibship of three daughters and two sons)

Whereas Clarissa maintains that her experience with care work makes her better positioned to understand her mother's needs, her sister Karen suggests that, based on what her mother has confided in her, she better understands their mother's preferences:

Just because you know, for instance ... when my dad has gotten sick and been in the hospital and she would say what would I do without you, you know. Cause like I said, my siblings won't help her with her colostomy bag or anything ... They don't feel they should have to do that and you know, my mother is the type of person who accepts us for who we are and what we can do. (Daughter, balanced sibship of three daughters and two sons)

Overall, a greater percentage of daughters in higher proportion-daughter sibships perceive care-related criticism because they and at least one sibling hold conflicting views regarding the appropriate amount of or approach to care for their mother. As these cases demonstrate, perceived criticism often reveals a lack of consensus among siblings regarding who best understands their mother's care needs and preferences. In comparison, in predominantly-son sibships, daughters describe greater consensus among siblings that they have more authority when it comes to their mother's care, both due to their gender and to gendered characteristics. As such, daughters in these families tend to perceive higher caregiver expectations, but also face fewer challenges from siblings regarding their approach to care.

Discussion

Caregivers are often described as the backbone of health care in the United States. However, caregiving takes a toll on caregivers' psychological well-being (National Academies of Sciences, Engineering, and Medicine, 2016), especially for women providing care (Chappell et al., 2015; NAC & AARP, 2020; Pillemer et al., 2018; Pinquart & Sörensen, 2006; Riffin et al., 2019). In order to address and minimize the psychological burden of parent care, it is important to understand what contributes to this gender disparity.

To date, gender differences in exposure to primary stressors of parent care, such as the amount and types of care provided, are most often cited as reasons for this gender disparity. However, the caregiver stress process model underscores the importance of also considering how differences in exposure to secondary stressors (byproducts of these primary stressors, such as family conflict, guilt, and threats to one's self-concept) also contribute to heightened

psychological distress among daughters. Care-related criticism from siblings has been identified as a secondary stressor that fuels family conflict and psychological distress (Brody et al., 1989; Matthews, 2002; Rurka et al., 2021) among those providing parent care. In this article, we utilized a mixed-methods approach to explore how gender shapes caregivers' exposure to this secondary stressor.

According to the gender-as-relational perspective (Connell, 2005; Springer et al., 2012), the implications of gender are inherently situational; to fully understand how gender shapes caregivers' risk of perceiving care-related criticism from siblings, one must consider the family structure in which that care takes place. Consistent with this perspective, quantitative analyses revealed that caregivers' risk of perceiving care-related criticism from siblings was shaped, not only by their own gender, but also by the gender composition of their sibships. In particular, daughters in predominantly-son sibships had a notably lower risk of perceiving care-related criticism than daughters in sibships with a higher proportion of daughters. It is worth noting, however, that sibship size did not have a significant direct effect on caregivers' probability of perceiving criticism from siblings.

To shed light on the processes underlying this pattern of quantitative findings, we examined qualitative data from the same sample of caregivers. In particular, we examined whether caregivers' descriptions of caregiving expectations, the division of care, and care-related criticism and tension in their family offered any insight into why daughters in predominantly-son sibships had a lower risk of perceiving care-related criticism than daughters in sibships with a higher proportion of daughters. This enabled us to not only discuss patterns in caregivers' experiences, but also to provide a more holistic and rich understanding of the underlying social processes (Creswell & Plano Clark, 2017; Suito & Gilligan, 2022).

Daughters were perceived to be better-suited for the caregiver role because of highly gendered factors such as their relationship with their mother, "caring" and "nurturing" personalities, and experience with care work (Cancian & Oliner, 2000; Hequembourg & Brallier, 2005; Ingersoll-Dayton et al., 2003; Kokorelias et al., 2022; Suito & Pillemer, 2006). However, adult children in predominantly-son families tended to rely more heavily on these gender stereotypes to shape caregiver expectations. Daughters in these families were often cast as the most qualified and "natural" caregiver in the family, and, therefore, the clear authority on their mother's care. As a result, daughters in these families often perceived higher caregiver expectations, but also faced fewer challenges from siblings regarding their approach to care. In contrast, adult children in families with a higher proportion of daughters were less able to rely solely on gender stereotypes to shape caregiving expectations. As a result, there tended to be less consensus among siblings regarding who best understood their mother's care needs

and preferences and higher rates of perceived sibling criticism among daughters.

Implications

These findings demonstrate that the stressors experienced by daughters providing parent care depend on the genders of their siblings. Within the context of the United States, most studies conclude that the more sisters one has, the more assistance one has with the objective demands of caregiving (Grigoryeva, 2017; Lin & Wolf, 2020). Based on this literature alone, one might conclude that daughters in families with a high proportion of daughters have a lower risk of caregiver burden and psychological distress. However, as the proportion of daughters in a sibship increases, daughters are at greater risk of perceiving a secondary stressor of caregiving: care-related criticism from siblings. This information is useful to health care professionals as they aim to identify and address the sources of psychological distress for daughters providing parent care.

Additionally, most interventions that aim to promote the well-being of caregivers focus exclusively on a single primary caregiver (Pillemer & Gilligan, 2018). However, adult children often navigate parental care within the context of complex sibling networks (Matthews, 2002; Szinovacz & Davey, 2013). These findings demonstrate the importance of designing interventions that acknowledge the role that other family members play in alleviating or exacerbating caregivers' psychological distress. In particular, these findings suggest it is important for family-based caregiving interventions to consider the sibling network in which many adult children caregivers are embedded.

Directions for Future Research

This article points to several promising avenues for future research and intervention. It demonstrates that the stressors that caregivers experience vary depending on the sibling and family networks in which they are embedded. Future research should explore how other aspects of family context, such as within-family differences in parent-child relationships, shape caregivers' risk of perceiving care-related criticism from siblings. By identifying conditions within a family that place caregivers at greater risk of perceiving care-related criticism from siblings, health care professionals and others serving this population will be better able to identify and address these caregivers' needs.

In this article, we explore how caregivers' gender, as well as the genders of their siblings, influence caregivers' likelihood of perceiving that their siblings are critical of the care that they provide their mother. We maintain that the focus on perceived criticism regarding mothers' care is warranted, given research showing that adult children tend to play a much larger role in their mothers' care than in their fathers' care (Feld et al., 2006; Katz et al., 2000). It is possible, however, that the patterns of perceived criticism

regarding fathers' care would be different. For instance, it is possible that daughters are not perceived to be as "qualified" or "natural" of a caregiver for fathers given that it is a cross-gender tie. Future research should consider how caregivers' gender, as well as the genders of their siblings, influence caregivers' likelihood of perceiving that their siblings are critical of the care that they provide their father.

The caregivers in this study were born between 1943 and 1981, and thus are members of the Baby Boomer (born between 1946 and 1964) and Generation X (born between 1965 and 1980) generations (NAC & AARP, 2020). Preliminary data on Millennial Caregivers (born between 1981 and 1996) suggest that men represent a larger share of the caregivers in this generation (47%) compared to previous generations (39% in Generation X, 38% in the Baby Boomer Generation, and 35% in the Silent Generation; Flinn, 2018). These shifting patterns suggest that it will be important to continue to monitor how gender influences caregivers' risk of perceiving care-related sibling criticism among subsequent generations of caregivers.

Conclusion

There are notable and persistent gender disparities in the psychological consequences of parent care. To minimize the psychological burden of caregiving, it is important to understand what factors may alleviate or exacerbate the psychological distress of daughters and sons providing parent care. According to the caregiver stress process model (Aneshensel et al., 1995; Pearlin et al., 1990), the psychological well-being of caregivers is shaped by a complex, interrelated set of primary and secondary stressors. To date, however, scholars have primarily focused on how gender differences in exposure to primary stressors, such as hours and types of care provided, contribute to this gender disparity. In this article, we extend this line of work by exploring how caregivers' gender, and the gender composition of the sibling networks in which they are embedded, interact to shape their likelihood of perceiving care-related criticism from siblings, a secondary stressor of caregiving with implications for caregivers' relational and psychological well-being (Brody et al., 1989; Matthews, 2002; Rurka et al., 2021). As hypothesized based on the gender-as-relational perspective (Connell, 2005; Springer et al., 2012), daughters' risk of perceiving this stressor varied depending on the genders of their siblings. These findings contribute to a more complete understanding of factors that fuel gender disparities in caregiver burden and distress. In addition, they underscore the importance of considering how caregivers' characteristics interact with characteristics of their sibling networks to shape the stressors and psychological consequences of parent care. This work builds on a growing body of scholarship demonstrating the value of utilizing mixed-methods approaches to gain a nuanced understanding of complex family processes (Suitor & Gilligan, 2022).

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Conflict of Interest

None declared.

Author Contributions

M. M. Rurka took lead in developing, writing, and revising the manuscript and conducted the data analyses. J. J. Suitor and M. Gilligan collaborated on developing the article, consulted on data analyses, and helped to prepare the manuscript. R. T. Frase helped to edit and prepare the manuscript.

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