# Who's got the Upper Hand? Hand Holding Behaviors Among Romantic Couples and Families 

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#### Abstract

The hand holding behavior of romantic couples and family dyads ( $n=886$ ) in public locations around Myrtle Beach, South Carolina was observed. Over $90 \%$ of males in heterosexual romantic couples, parents in parent child pairs, and older siblings in child sibling pairs tended to place their hand on top when holding hands, displaying what we consider social dominance. Women holding hands with men in romantic relationships placed their hand under their partner's hand, and women switched to have their hand on top when holding hands with a child. Results are discussed in relation to social dominance theory and social role theory, along with implications for equality among the sexes.


Keywords Hand holding • Equality among sexes • Social dominance • Social roles

Nonverbal behaviors offer a wealth of information about the social dynamics within interpersonal relationships. When people hold hands, the hand holding behavior communicates information that partners have some type of established relationship. We do not just hold hands with strangers, but the way in which people hold hands could indicate additional information about the status differential and equality between the couple. In order to hold hands, one partner's hand must be on top with palm facing back while the other partner's hand is underneath, with palm facing up. Being on top or in front may indicate superiority in body positioning (Brown 1965). Similarly, Borden and Homleid (1978) found that males generally hold hands with their dominant hand and thereby place their romantic partners on their dominant side

[^0](for the majority, this is the right side). Chapell and colleagues (1998) investigated hand holding behaviors in romantic, college-aged, heterosexual couples and found men's hands to be the upper hand significantly more often than women's. Differences in height, age, hand preferences, ethnicity, culture, and sex of the person initiating the hand holding were studied in a follow-up study of over 15,000 couples by Chapell and colleagues (1999). Although there were some interesting variations, Chapell and colleagues (1999) conclude the male hand on top sex difference is a "robust phenomenon."

We wanted to replicate the male upper hand effect found in previous research (Chapell et al. 1998, 1999), as well as expand these investigations beyond romantic, heterosexual couples to families. We predicted that when romantic couples hold hands, the dominant partner's hand will be on top. In our culture, despite advances, men continue to maintain a hierarchal social advantage over women, due in part to the way sexual stereotypes frame social relations (Ridgeway 2011). Consistent with social dominance theory (for example, Sidanius and Pratto 1999, 2012) and social role theory (Eagly 1987, 1996; Eagly and Wood 2012), men maintain dominance over women. Within families, parents maintain dominance over children, and older children maintain dominance over younger children.

Therefore, we predicted that: 1) Males' hands will be on top when holding the hand of a female romantic partner; 2) Parents' (males' and females') hands will be on top when holding the hand of a child; and 3) Older children's hands will be on top when holding the hand of a younger child. While men are consistently considered dominant, when women take on the social role of mother they become dominant over their children, and their hand-holding behavior is thereby predicted to reverse.

## Method

The hand holding behaviors of 886 romantic couples and family dyads ( $80.1 \%$ Caucasian, 10.2 \% African American, 6.4 \% Hispanic, 2.5 \% Asian, and .8 \% other) were observed in public locations along the beach, public parks, and popular tourist shopping areas around the Myrtle Beach, South Carolina area during the summer. Approximately 14 million tourists visit the Grand Strand each year, and the majority include families ( $56 \%$ ) or couples ( $26 \%$ ) (Myrtle Beach Area Chamber of Commerce 2010).

Four independent observers, blind to the study hypotheses, naturally observed each couple and family dyad in public and coded for observed sex (male or female), race (Caucasian, African-American, Hispanic, Asian, or Native American), age category (child ages $1-12$, teenager ages $13-19$, adult ages $20-60$, older adult ages 60 and over), height category (partner one taller, partner two taller, equal height), whose hand was on top (partner one or partner two), and relationship type (romantic or family). The hand on top in each handholding pair was defined as the hand that was observed to be held in front of and on top of the other partner's hand with the palm facing back. Observers randomly selected locations at random times on random days and independently made their observations. Observers sat on a bench or chair, waited, and recorded observations with paper and pencil on a clipboard. Which member of the couple initiated hand holding behavior was not recorded. Previous
research has demonstrated that males maintain the upper hand position when holding hands with females regardless of who initiated the handholding (Chapell et al. 1999, Study 6). The couples and family dyads were never approached or interviewed.

## Results

Among heterosexual romantic couples observed ( $n=362$ ), the male partner's hand was on top of the female's hand while holding hands in $87.85 \%$ of the cases, $\chi^{2}=207.39, p<.001, \varphi=.76$. In romantic couples where the female was taller than the male or both partners were of equal height ( $n=45$ ), men still had the upper hand in $68.89 \%$ of the cases, $\chi^{2}=6.42, p<.01, \varphi=.38$. Among adults holding hands with children ( $n=469$ ), the adult's hand was on top of the child's hand while holding hands in $97.65 \%$ of the cases, $\chi^{2}=426.03, p<.001, \varphi=.95$. Female adult's hands were on top of the child's hand in $98.25 \%$ of the cases and male adult's hands were on top of the child's hand in $97.24 \%$ of the cases. Female adults had the upper hand when holding hands with female ( $98.3 \%$ ) and male ( $98.1 \%$ ) children equally. Among children holding hands with other children ( $n=42$ ), the older child's hand was on top of the younger child's hand when holding hands in $97.62 \%$ of the cases, $\chi^{2}=38.10, p<.001$, $\varphi=.95$. There was not enough variation in race to conduct meaningful comparisons (the overwhelming majority of our sample was Caucasian).

## Discussion

Results were consistent with previous research related to romantic partner hand holding patterns (Chapell et al. 1998, 1999), and the current predictions expanding the focus on family relationships. These results cannot be explained by height differences or age differences alone. While males are typically taller and older than their female partners in heterosexual relationships, our research and past research (Chapell et al. 1999) suggests height and age differences play a lesser role in determining hand holding positions than sex. Furthermore, current findings reveal new details relating social dominance (for example, Sidanius and Pratto 1999, 2012) and social roles (Eagly 1987, 1996) to hand holding behavior, especially in the area of family dynamics. Women, in particular, interestingly change their hand holding orientation between romantic partners and children as the power differential changes. Furthermore, women keep their hands on top of both male and female children equally. There were even specific instances in our investigation where we saw a man holding a woman's hand with the man's hand on top, and then the same woman holding a child's hand with her other hand, with the woman's hand on top. Women adopt many different social roles in our culture (Eagly and Wood 2012), and in the current investigation, a woman's hand-holding orientation shifted depending on whether her role was that of a romantic partner (submissive to a man) or a parent (dominant over children).

Future research, including experimental manipulations of power differentials in hand holding scenarios, may build on these initial observations. Other investigations may consider hand holding behaviors among those with homosexual orientations, cultural differences, and other special populations as representations of gradations of
social dominance and prescribed social roles. It may be especially interesting to observe hand holding in cultures with varying degrees of inequality among sexes, given recent findings linking sexist ideologies to inequality among sexes, within societies (Brandt 2011). Hand holding, an outward social behavior, may offer a cue to a more complex social hierarchy.

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