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The Importance of Feeling Understood in
Marital Conversations about End-of-Life Health Care

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Abstract

This study investigates processes within marital discussions about end-of-life medical treatment preferences. The associations among marital quality, the perception of having been understood following discussion, and intentions for whom to appoint as a health care surrogate are addressed. Data from 2,969 white married couples in their mid-60s are analyzed. Four-fifths of primary respondents reported that their partners understood their preferences extremely well. Primary respondents' perceptions of high marital quality were associated with feeling extremely well understood. In turn, feeling understood partially mediated the relationship between perceptions of marital quality and the intention to appoint the partner as durable power of attorney for health care (DPAHC). Implications for research on marital communication and quality end-of-life health care are discussed.

Keywords: advance care planning; aging; death and dying; marital communication; marital quality; medical decision-making

Most dying older adults value quality of life over length of life, yet in the United States today lives are frequently prolonged after the capacity for meaningful social, psychological, or intellectual functioning has profoundly diminished (Field & Cassel, 1997). Prolongation occurs in part because of miscommunication between older adults and their family members: Family members often do not know their older relatives' treatment preferences, yet frequently serve as surrogates for dying older relatives who have become incapable of making their own medical decisions (Carr & Khodyakov, 2007; Moorman, Hauser, & Carr, 2009). Although dying is an extremely difficult topic for older adults and their families to discuss, open communication is considered essential to efforts to safeguard quality of life. Health care providers recommend that older adults (a) have conversations about their end-of-life preferences with their families, and (b) legally appoint a surrogate, or durable power of attorney for health care (DPAHC), to advocate for the fulfillment of their treatment preferences should they become incapacitated (American Medical Association, 1996).

Prior studies have examined surrogates' understanding of older adults' preferences for specific medical interventions (e.g., Fagerlin et al. 2001; Pruchno et al. 2005). In a typical study, older adults are asked to name their treatment preferences in a range of scenarios, and surrogates are asked to predict the older adult's responses. For example, a scenario may ask the older adult if he or she would want cardiopulmonary resuscitation (CPR) if he or she had severe dementia and went into cardiac arrest. Surrogates are said to understand if they correctly identify – even by chance - the older adult's response. Notably, surrogates who have discussed the older person's care preferences with him or her perform no better on these specific treatment measures than do surrogates who have had no discussions with the older person (Shalowitz, Garrett-Mayer, & Wendler, 2006).

Surrogates' understanding of and ability to articulate their loved one's treatment preferences is essential to health care providers, who are charged with meeting older adults' preferences for administering, withholding, or withdrawing treatments. But most older adults care about the overall goal of treatment - high quality of life while dying – more than the narrower goals of particular interventions (Singer, Martin, & Kelner, 1999). Further, a substantial minority of older adults prefer that family members make end-of-life decisions on their behalf (e.g., Moorman, 2008; Puchalski et al., 2000). Although knowing older adults' treatment goals would allow surrogates much-needed flexibility when authorizing specific treatments, it is unknown whether surrogate/older adult discussions improve understanding of goals.

The present study

Despite the importance of understanding older adults' goals at end-of-life, only one prior study has asked broad questions about level of understanding: Ditto and colleagues (2001) found that 95% of older adults, and 97% of their surrogates, believed that the surrogates understood the older adult's preferences “pretty well” or “very well” following discussion. I examine the degree to which older married persons perceive they have been understood by their spouses following discussion of their end-of-life medical care preferences. I focus on the “patient” perspective rather than on the “surrogate” perspective because Western medical models expect competent adult individuals, rather than families, to take responsibility for health behaviors such as planning for end-of-life (Fan, 2007).

I select married persons because a majority (55.9%) of Americans aged 65 and older are married, and among married older persons who appoint a DPAHC, over half appoint their spouse (Carr & Khodyakov, 2007; U.S. Census Bureau, 2008). The spouse is a common choice for

several reasons. First, one's spouse may be one's closest confidante, truly the person who best understands one's end-of-life wishes. Second, one may incorrectly believe that one's spouse is the person who best understands one's end-of-life wishes: People are motivated to think well of persons to whom they are committed (Festinger, 1975; Heider, 1958). A large body of psychological research demonstrates that people idealize their spouses, a bias that enhances marital quality but can lead to poor decision-making when situations call for an objective assessment of the spouse's abilities (Gagné & Lydon, 2004). Third, one may feel obligated to appoint one's spouse as DPAHC because the spouse may interpret the appointment of someone else as a sign of distrust. Because I have dyadic data on marital quality, the quality of other family relationships, and individual psychological well-being, I can empirically address these pathways.

Correlates of perceived understanding

End-of-life preferences are challenging topics to broach with a spouse; perhaps fewer than half of spouses wish to be involved in decision-making (Azoulay et al., 2004). Many couples never engage in discussion, and when discussion occurs, many factors work against understanding. For instance, older persons may be reluctant to reveal preferences they fear might upset or burden their spouse, spouses may offer "supportive" responses that the older person does not perceive as helpful, and partners may disagree (Coyne & Smith, 1991; Dakof & Taylor, 1990). Therefore, a research goal is to determine the correlates of end-of-life conversations that older persons perceive to be successful.

Two complementary theories commonly applied to marital decision-making propose that high marital quality and cooperation should be associated with successful end-of-life conversations. Communal coping theory and interdependence theory posit that partners in high

quality relationships are motivated to define issues they face as “ours” rather than “yours” and “mine” because they are invested in the relationship (Lewis et al., 2006; Lyons, Mickelson, Sullivan, & Coyne, 1998; Rusbult & Van Lange, 2003). A person’s outcome (in this case, feeling understood) is the result not only of his or her own behaviors, attitudes, and characteristics but also those of his or her partner. In this study I examine both partners’ perceptions of marital quality as well as their end-of-life planning behaviors. Some couples will have discussed the end-of-life preferences of both partners. Dyadic data on married couples show that when one partner self-discloses, so does the other, and that high levels of disclosure within the couple lead to the perception that one’s spouse is understanding (Laurenceau, Barrett, & Rovine, 2005). Additionally, some couples will have completed legally-recognized end-of-life planning, include execution of a living will (a document describing a patient’s treatment preferences in the case of incapacitation) and appointment of a DPAHC. Persons who have appointed the spouse as DPAHC and/or given the spouse a copy of a living will can use these formal preparations as a springboard for clarifying spousal understanding in discussions. Therefore, I ask the research question:

Are older married persons’ reports of marital quality and of formal and informal end-of-life planning associated with their perceptions of having been understood in marital conversations about end-of-life health care preferences?

Consequences of perceived understanding

The better the marriage, the more likely that one feels that their partner understands them (Murray, Holmes, Bellavia, Griffin, & Dolderman, 2002). Feeling understood cannot be called an entirely accurate measure; perceptions regarding marital communication are a combination of accuracy, projection, and positive sentiment override (Priem, Solomon, & Steuber, 2009).

Nonetheless, perceptions become a person's reality and affect subsequent thoughts, emotions, and behaviors (Thomas & Thomas, 1928). Scholars conclude that interaction based on biased perceptions benefits a marriage (Murray et al.) Even in the end-of-life context where accuracy is so important, patients' *satisfaction* with decisions has more to do with the process by which they are made (e.g., who makes the final decision) than with their content (Moorman, 2008).

Conversations about end-of-life provide important opportunities for older adults to affirm their perception of spousal understanding and appoint a DPAHC accordingly. Older adults view discussions about end-of-life as a way to prepare themselves and their conversation partners for their eventual death (Singer et al., 1999). Therefore, the perception that their preferences have been understood may be viewed a welcome sign that the spouse is responsive, and would be a supportive surrogate (Reis, 2007). Presumably, those who feel understood will intend to appoint their spouse as DPAHC, while those who do not feel understood will choose another person or no one at all.

In order to assert that older adults choose a DPAHC in this way, I need to establish in my data that people in good marriages have conversations in which they feel understood, and that feeling understood is associated with DPAHC intentions. There are at least two competing explanations. First, if partners in good marriages *assume* that their spouse understands and that conversation is unnecessary, then conversation quality would be unrelated to DPAHC intentions (High, 1993). Second, if an older person feels obligated to appoint the spouse for some reason, such as if the older adult is the spouse's DPAHC and he or she feels compelled to reciprocate, then conversation quality would also be unrelated to DPAHC intentions. Thus, I ask the research question:

Do older adults' perceptions of having been understood in marital conversations about end-of-life health care preferences mediate the relationship between marital quality and/or end-of-life planning and who one intends to appoint as a DPAHC?

Design and methods

Participants and procedure

The Wisconsin Longitudinal Study (WLS) is a long-term study that began with a random sample of 10,317 men and women who graduated from Wisconsin high schools in 1957. They were surveyed at ages 18 (1957), 36 (1975), 54 (1993), and 65 (2005). In 1994, a randomly selected sibling of every graduate who had a sibling was recruited, and 4,778 completed a telephone survey. Siblings were surveyed again in 2005. Also in 2005, the spouses of currently married graduates and siblings were invited to participate in the study for the first time. Thus, although the WLS contains longitudinal elements, data from marital dyads are available only from the 2005 wave, and so the present study is cross-sectional (i.e., based on 2005 data only).

For the first research question, analyses focus on the 2,969 graduates and siblings who (a) participated in the 2005 wave of the WLS, (b) were part of the 70% selected at random to complete a telephone module on end-of-life preparations (modules were administered to random subsamples to reduce the overall length of the survey), (c) were currently married, (d) whose spouses completed a parallel telephone survey, and (e) reported having discussed his or her end-of-life care preferences with the spouse. For the second research question, analyses focus on the 1,059 graduates and siblings who met these criteria and also (f) reported having no DPAHC. Selection of the subsample is presented in Table 1. Hereafter, I refer to graduates and siblings as “primary respondents” and their spouses as “partners” when differentiating between the two.

[See Table 1]

The WLS does not represent all strata of the U.S. population. All primary respondents graduated from high school, as did nearly all partners. Nearly all primary respondents and partners are non-Hispanic whites. Despite these limitations, the sample is representative of a majority of Americans in this cohort: In 2004, 68.2% of 65- and 66-year-old American men and women were white non-Hispanic high school graduates (U.S. Census Bureau, 2004). (For further information on sample demographics and on participation rates over time, see Hauser [2005].)

Measurement

Perceived understanding. Within the end-of-life planning module, primary respondents who reported having discussed end-of-life treatment preferences with their partners were asked regarding the discussion, ‘How well does [partner] understand your plans and preferences about the types of medical treatment you want if you become seriously ill in the future?’ Primary respondents indicated their perception on a 4-point Likert scale ranging from 1 = *extremely well* to 4 = *not well at all*. The variable was skewed in the direction of greater understanding; I dichotomized it such that 1 = *extremely well understood* and 0 = *less than extremely well understood*. Please note that within each couple, the primary respondent is the focal spouse whose perception serves as the outcome measure.

Preferred surrogate. Primary respondents who reported that they had not appointed a DPAHC were asked, ‘If you were to pick a person to make medical decisions for you, who would you choose?’ I created a dichotomous variable for which 0 = *would appoint someone other than partner* and 1 = *would appoint partner*. Some primary respondents mentioned multiple people, such as their partner and adult children. Any mention of the partner was coded 1, so the categories are mutually exclusive. Eleven primary respondents volunteered that they did

not know who they would name; these 11 were dropped from analyses. Again, recall that the primary respondent is the focal partner whose reported preference is the outcome measure.

Marital quality: Perceived marital closeness and perceived similarity to spouse. Both spouses were asked ‘How close would you say you are to [your spouse]?’ and ‘To what extent do you and [your spouse] share a similar outlook on life?’ For both questions, spouses indicated their perception on a 4-point Likert scale ranging from 1 = *not at all* to 4 = *very*. Because of skew towards the ‘very’ extreme, I dichotomized all four variables such that 1 = *very*, and 0 = *less than very*. While measures with greater variation are certainly desirable, skew in reports of marital quality is very common, and much insightful research has been conducted with dichotomized measures (Windsor, Ryan, & Smith, 2009).

Within couples, spouses reported high levels of agreement in their appraisals of marital quality. In 78.1% of couples, both spouses reported that the marriage was very close, and in 46.3% of couples, each spouse felt very similar to the other. Therefore, I tested my assumption that separate primary respondent and partner reports best represented the marital quality of a couple. I summed primary respondents’ and partners’ reports on parallel questions (e.g., marital closeness), estimated models using the summed scores in the place of separate reports, and compared model fit using the Bayesian Information Criterion (Raftery, 1995). The results of these tests are available upon request. I concluded that models including separate reports accurately represent the data.

Formal end-of-life planning. Both spouses were asked ‘Have you made any legal arrangements for someone to make decisions about your medical care if you become unable to make those decisions yourself? This is sometimes called a durable power of attorney for health care.’ If a spouse had appointed a DPAHC, he or she reported who that person was. Spouses

were also asked, ‘Do you have a living will or advance directive? These are written instructions about the type of medical treatment you would want to receive if you were unconscious or somehow unable to communicate.’ If a spouse responded positively, he or she reported who had a copy. I created dummy variables representing three categories: the spouse ‘appointed spouse as DPAHC and/ or gave spouse a living will,’ the spouse ‘appointed a DPAHC and/or gave someone a living will, but spouse was not involved in any way,’ and the spouse ‘had neither appointed a DPAHC nor given anyone a living will’ (reference). So that the categories were mutually exclusive, anyone who mentioned the spouse as having been involved in some aspect of planning was coded in the first category. For example, a primary respondent who reported that the partner was a recipient of a living will but someone other than their partner was the DPAHC was counted in the first category.

End-of-life discussions. Partners were asked “Have you discussed your plans about the types of medical treatment you want or don't want if you become seriously ill in the future with anyone?” If they responded “Yes,” they were asked to identify their conversation partners. Partners could mention up to three persons or groups of people (e.g., primary respondent and children) with whom they had discussions. I created dummy variables representing three mutually exclusive categories: ‘partner had a discussion with primary respondent,’ ‘partner had a discussion but not with primary respondent,’ and ‘partner did not have a discussion’ (reference). Thus, while all primary respondents had discussed their own treatment preferences with their partners, only some partners had discussed their own treatment preferences with primary respondents.

Age. I used primary respondents’ ages at the time of survey. The average age of primary respondents was 63.4 years ($SD = 4.0$ years, range 40 to 86 years).

Gender. Primary respondent's gender was a dichotomous variable where 1 = *female* and 0 = *male*.

Analytic strategy

Descriptive and multivariate statistics. I assessed the research questions using logistic regressions with corrections for clustering. That is, the 380 graduate/sibling pairs violate the assumption of independent observations. To assess correlates of feeling understood, I estimated one binary logistic model, regressing feeling extremely well understood versus less well understood, on all independent measures. The question regarding DPAHC intentions concerns only primary respondents who had not already appointed a DPAHC. I estimated two binary logistic models, one regressing expecting to name one's partner as DPAHC versus expecting to name someone else, on all independent measures except perceived understanding, and one adding perceived understanding to the model. In all models, I adjusted for the primary respondent's age and sex. The likelihood of having a surviving, cognitively intact spouse in the future diminishes with age, especially for women, so the importance of spousal understanding – at least for DPAHC purposes – also diminishes.

Missing data. No more than 5.6% cases were missing data on any given variable, but to address concerns about missing values, I conducted multiple imputation by chained equations (MICE) on the independent variables (Royston, 2005). The final estimates presented for multivariate analyses are the result of averaging findings from across five imputed datasets. Standard errors are further corrected for clustering. Estimates obtained through listwise deletion did not vary appreciably from the estimates presented here. Complete information on the extent of missing data and regression results obtained through listwise deletion are available upon request.

Results

Descriptive statistics

Descriptive statistics for variables used in the analysis are presented in Table 2. Nearly four-fifths (79.0%) of primary respondents reported feeling extremely well understood following end-of-life discussions with their partners. Over one-third (35.8%) of primary respondents had not yet appointed a DPAHC, and most of these (78.5%) said they would appoint their partner, rather than another person, in the future.

[See Table 2]

Are marital quality and end-of-life planning associated with perceptions of having been understood?

Results are presented in Table 3. Primary respondents' perceptions of feeling very close and very similar to their partner were significantly associated with feeling extremely well understood following a discussion. Partners' perceptions of marital quality were not significantly associated with primary respondents' perceived understanding.

Primary respondents who did *any* formal end-of-life planning (i.e., with the partner or with another person) were more likely than those who had not formally planned to feel extremely well understood following discussion with their partner. Partners who discussed their end-of-life preferences with *anyone* (i.e., with the primary respondent or with another person) were likely to be married to primary respondents who felt extremely well understood following a discussion.

[See Table 3]

Do perceptions of having been understood mediate the relationship between marital quality and/or end-of-life planning and DPAHC intentions?

Results are presented in Table 4. Primary respondents who perceived their marriage to be very close anticipated appointing their partner as DPAHC. This relationship was weaker, but still statistically significant, when the primary respondent's perception of having been extremely well understood in conversation was added to the model. The perception of having been understood was associated with expecting to appoint the partner as DPAHC. End-of-life planning behaviors were not associated with DPAHC intentions. Therefore, perceptions of having been understood partially mediate the relationship between marital quality and DPAHC intentions.

[See Table 4]

Discussion

I examined older married persons' perceptions of having been understood following discussion of end-of-life health care preferences with a marital partner. The majority in this sample - nearly 3,000 white, well-educated, healthy adults in their mid-60s who had been married an average of 37 years - felt extremely well understood by their partner. Greater perceived closeness with and similarity to one's partner were associated with the perception of having been extremely well understood. Involvement in other forms of end-of-life health care planning (e.g., completing a living will) was also associated with feeling extremely well understood. Feeling extremely well understood was associated with the intention to appoint one's partner, rather than another person, as DPAHC. Thus, in long term marriages, high relationship quality is associated with older adults' perception that their end-of-life care wishes are understood. This perception is associated with older adults' choice of a DPAHC.

Marital quality and end-of-life planning behaviors are associated with perceived understanding

High marital quality, as perceived by primary respondents, was associated with end-of-life discussions in which primary respondents felt extremely well understood. But partners

perceptions of the marriage were not associated with how well understood primary respondents felt, and this result was not due to collinearity. Based on theory, I had proposed that couples in high quality relationships consider end-of-life to be a couple-level problem rather than the problem of individual partners, and this joint concern may lead to successful discussion of an emotionally challenging topic (Lewis et al., 2006; Lyons et al., 1998; Rusbult & Van Lange, 2003). Can this process be said to be occurring?

One line of research suggests that it cannot, because spouses who perceive their marriage differently have at least some awareness that this is so, and this awareness is distressing (Windsor, Ryan, & Smith, 2009). Older couples whose perceptions of their marriage are discrepant are more distressed than their never-married and long-widowed peers (Hagedoorn et al., 2006). Bereaved spouses who had perceived their marriage more positively than the late spouse did are likely to report anger as a significant part of their bereavement (Carr & Boerner, 2009).

A second line of research suggests that even spouses who feel differently about their marriage can be acting cooperatively. People who have positive illusions about their marriages do not strive to correct their attitudes even when they are consciously aware that these attitudes are biased (Boyes & Fletcher, 2007). In fact, positively-biased attitudes about the spouse can be self-actualizing, leading to better relationship outcomes (Lemay & Clark, 2008). That is, good outcomes such as cooperation and understanding occur despite - perhaps because of - discrepancies between spouses' perceptions. Future, more nuanced studies are necessary to adjudicate between the equity and self-actualizing perspectives.

However, the data on reported behaviors suggest that perceived understanding is not just an illusion in primary respondents' heads. Primary respondents who had formally planned with

anyone—partner or another person—felt better understood following discussion than did older adults who had no living will and/or DPAHC. Prior research shows that patients with well-defined end-of-life care preferences communicate more effectively with their physicians than do people with fluctuating preferences; people who complete formal planning likely have well-defined preferences that they can communicate confidently to their partners (Deep, Griffith, & Wilson, 2008).

Further, partners who had discussed *their own* end-of-life treatment preferences with anyone—the primary respondent or another person—were likely to be married to primary respondents who felt extremely well understood. Partners who held their own discussions have firsthand knowledge of what listener responses (e.g., self-disclosure, acceptance, care) are helpful, and could bring that experience to bear when playing the role of listener (Laurenceau, Barrett, & Pietromonaco, 1998; Reis & Patrick, 1996). For example, if the partner discussed her preferences with her daughter, and found that her daughter’s expressions of caring made her feel understood, then when that partner listens to her primary respondent’s preferences, she uses caring responses to convey her understanding to him.

Perceptions of having been understood partially mediate the relationship between marital quality and DPAHC intentions

Higher marital quality was associated with an important health behavior, the intention to appoint one’s partner as DPAHC. Some of this relationship was mediated by the sense of having been extremely well understood in marital conversation about end-of-life. Thus, although other variables – in this analysis, gender – are more strongly associated with older adults’ DPAHC choice, the quality of conversations does matter.

Of course, an intention is not a behavior. But when people possess general self-efficacy and perceive that they have choice in a specific situation, they behave in accordance with their intentions (Ajzen, 1991; Armitage & Conner, 2001). Many people perceive end-of-life planning to be under their control; increasing age is associated with a greater likelihood of appointing a DPAHC even within the 65+ population (Black, Reynolds, & Osman, 2008). I anticipate that future waves of the WLS will show that primary respondents followed through on their intentions.

But spuriousness is a concern. White married adults in this cohort, particularly those in high quality long term marriages, perceive their spouses' behavior during conversation to be more positive than independent observers do (Story et al., 2007). Potentially, the positive relationships among marital quality, perceived understanding, and selection of partner as DPAHC are due a rosy view of the world. This possibility is unlikely for two reasons.

First, primary respondents did not uniformly report feeling extremely well understood following end-of-life discussions with close relationship partners. For example, most primary respondents had high quality relationships with their children, yet this feeling did not necessarily translate into feeling understood: Seventy percent reported feeling very close to a randomly-selected adult child, and two-fifths reported feeling very similar to that child. But primary respondents did not perceive that their children understood their end-of-life preferences as well as their partners did. Currently married primary respondents who discussed their end-of-life preferences with an adult child (57.8% of graduates and 53.4% of siblings) felt extremely well understood a little less than two-thirds of the time (61.8% of graduates and 63.8% of siblings). I consider the high degree of perceived understanding in discussion with a partner as evidence of

an important aspect of long term marriages rather than a general belief that close kin are understanding.

Second, the positive relationships among marital quality, perceived understanding, and intended selection of partner as DPAHC remain significant after controlling for depressive symptoms. (Results are available upon request.) Depressed persons are unlikely to give unrealistic positive reports (Allan, Siegel, & Hannah, 2007; Alloy & Abramson, 1979). Indeed, in this sample those persons with more depressive symptoms were significantly less likely to report feeling extremely well understood.

Limitations

This study has several important limitations. First, the data are cross-sectional and retrospective. Although I have suggested that understanding leads to DPAHC choice, I have no temporal evidence that this is the case. Further, the WLS did not ascertain how many discussions occurred, how long ago they occurred, and whether they occurred because the primary respondent had concerns about the partner's level of understanding (thanks to an anonymous reviewer for noting this latter limitation).

Second, the WLS asked a primary respondent how understood he or she felt only if the primary respondent reported having had a discussion. This omission prevented me from comparing persons who had discussions with persons who did not. Some primary respondents probably did not have discussions because they assumed their wishes were already understood (High, 1993).

Third, I used dyadic data; primary respondents whose partners also agreed to participate may be a select sample of persons in particularly high quality marriages. There is some evidence of this. Among all married primary respondents in the WLS, 83.0% reported that their marriage

was very close, and 57.8% reported that they felt very similar to their partner. Among married primary respondents whose partners also participated, 87.0% reported that their marriage was very close, and 64.0% reported that they felt very similar to their partner. Therefore, findings may not be generalizable to persons in less satisfactory marriages.

Fourth, I studied non-Hispanic white high school graduates who varied little in age, health status, marital duration, and number of marriages. Future research is needed before these findings can be generalized to other populations. For example, black couples are less likely than white couples to report high marital quality, and also less likely to plan for end-of-life (Corra, Carter, Carter, & Knox, 2009).

Directions for future research

Many questions about marital communication surrounding end-of-life issues remain open to future research. From the standpoint of relationship researchers, an especially important research question is whether the pattern of associations is similar among persons in younger cohorts, many of whom have experienced more marital transitions and will be more open to nonmarital romantic relationships than the participants in this study. These experiences might provide future older adults with a different set of attitudes about being understood by romantic partners and about future legal obligations to partners.

Second, the present study and others have focused on the spouse who is in the role of “patient.” Future work should focus on the spouse who is in the role of “surrogate.” Does this person feel that he or she understands the patient’s wishes? What factors affect the surrogate spouse’s sense of understanding? When do patients misperceive the surrogate’s understanding?

Third, the applicability of the concept of “understanding” to non-Western cultures and medical and legal systems outside of the U.S. is unknown. Some research suggests that the

relationship between marital quality and effective marital communication is stronger in the U.S. than elsewhere (Rehman & Holtzworth-Munroe, 2007). Additionally, while Western medical ethics focus on patients' right to autonomous decision-making at end-of-life, other systems emphasize the effects of medical decisions on families (Fan, 2007). The marital relationship may be a greater determinant of end-of-life outcomes in the U.S. than in other societies.

Conclusion

I have provided an analysis of the correlates and consequences of middle-class white American older adults' perceptions of having been understood in discussions of end-of-life health care with their marital partners. As the proportion of older persons in the world increases, so will the demand for advances in health care delivery that protect the quality of life of dying persons. Interventions that promote understanding conversations about end-of-life care within the common context of long-term marriage may be key innovations.

References

- Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, *50*, 179-211.
- Allan, L. G., Siegel, S., & Hannah, S. (2007). The sad truth about depressive realism. *Quarterly Journal of Experimental Psychology*, *60*, 482-495.
- Alloy, L. B., & Abramson L. Y. (1979). Judgment of contingency in depressed and nondepressed students: Sadder but wiser? *Journal of Experimental Psychology: General*, *108*, 441-485.
- American Medical Association Council on Scientific Affairs. (1996). Good care of the dying patient. *Journal of the American Medical Association*, *275*, 474-478.
- Armitage, C. J., & Conner, M. (2001). Efficacy of the theory of planned behaviour: A meta-analytic review. *British Journal of Social Psychology*, *40*, 471-499.
- Azoulay, É., Pochard, F., Chevret, S., Adrie, C., Annane, D., Bleichner, G., et al. (2004). Half the family members of intensive care unit patients do not want to share in the decision-making process: A study in 78 French intensive care units. *Critical Care Medicine*, *32*, 1832-1838.
- Black, K., Reynolds, S. L., & Osman, H. (2008). Factors associated with advance care planning among older adults in southwest Florida. *Journal of Applied Gerontology*, *27*, 93-109.
- Boyes, A. D., & Fletcher, G. J. O. (2007). Metaperceptions of bias in intimate relationships. *Journal of Personality and Social Psychology*, *92*, 286-306.
- Carr, D., & Boerner, K. (2009). Do spousal discrepancies in marital quality assessments affect psychological adjustment to widowhood? *Journal of Marriage and Family*, *71*, 495-509.
- Carr, D., & Khodyakov, D. (2007). Health care proxies in later life: Whom do older adults choose and why? *Journal of Health and Social Behavior*, *48*, 180-194.

- Corra, M., Carter, S. K., Carter, J. S., & Knox, D. (2009). Trends in marital happiness by gender and race, 1973 to 2006. *Journal of Family Issues, 30*, 1379-1404.
- Coyne, J. C. & Smith, D. A. F. (1991). Couples coping with a myocardial infarction: A contextual perspective on wives' distress. *Journal of Personality and Social Psychology, 61*, 404-412.
- Dakof, G. A., & Taylor, S. E. (1990). Victims' perceptions of social support: What is helpful from whom? *Journal of Personality and Social Psychology, 58*, 80-89.
- Deep, K. S., Griffith, C. H., & Wilson, J. F. (2008). Discussing preferences for cardiopulmonary resuscitation: What do resident physicians and their hospitalized patients think was decided? *Patient Education and Counseling, 72*, 20-25.
- Ditto, P. H., Danks, J. H., Smucker, W. D., Bookwala, J., Coppola, K. M., Dresser, R., et al. (2001). Advance directives as acts of communication: A randomized controlled trial. *Archives of Internal Medicine, 161*, 421-430.
- Fagerlin, A., Ditto, P. H., Danks, J. H., Houts, R. M., & Smucker, W. D. (2001). Projection in surrogate decisions about life-sustaining medical treatments. *Health Psychology, 20*, 166-175.
- Fan, R. (2007). Confucian familialism and its bioethical implications. In S. C. Lee (Ed.), *The family, medical decision-making, and biotechnology* (pp. 15-26). Dordrecht, The Netherlands: Springer.
- Festinger, L. (1957). *A theory of cognitive dissonance*. Palo Alto, CA: Stanford University Press.
- Field, M., & Cassel, C. (1997). *Approaching death*. Washington, D.C.: National Academy Press.
- Gagné, F. M., & Lydon, J. E. (2004). Bias and accuracy in close relationships: An integrative review. *Personality and Social Psychology Review, 8*, 322-338.

- Hagedoorn, M., van Yperen, N. W., Coyne, J. C., van Jaarsveld, C. H. M., Ranchor, A. V., van Sonderen, E., & Sanderman, R. (2006). Does marriage protect older people from distress? The role of equity and the recency of bereavement. *Psychology and Aging, 21*, 611-620.
- Hauser, R. M. (2005). Survey response in the long run: The Wisconsin Longitudinal Study. *Field Methods, 17*, 3-29.
- Heider, F. (1958). *The psychology of interpersonal relations*. New York: Wiley.
- High, D. M. (1993). Advance directives and the elderly: A study of intervention strategies to increase use. *The Gerontologist, 33*, 342-349.
- Laurenceau, J., Barrett, L. F., & Pietromonaco, P. R. (1998). Intimacy as an interpersonal process: The importance of self-disclosure, partner disclosure, and perceived partner responsiveness in interpersonal exchanges. *Journal of Personality and Social Psychology, 74*, 1238-1251.
- Laurenceau, J., Barrett, L. F., & Rovine, M. J. (2005). The interpersonal process model of intimacy in marriage: A daily diary and multilevel modeling approach. *Journal of Family Psychology, 19*, 314-323.
- Lemay, E. P. Jr., & Clark, M. S. (2008). How the head liberates the heart: Projection of communal responsiveness guides relationship promotion. *Journal of Personality and Social Psychology, 94*, 647-671.
- Lewis, M. A., McBride, C. M., Pollak, K. I., Puleo, E., Butterfield, R. M., & Emmons, K. M. (2006). Understanding health behavior change among couples: An interdependence and communal coping approach. *Social Science and Medicine, 62*, 1369-1380.
- Lyons, R. F., Mickelson, K. D., Sullivan, M. J. L., & Coyne, J. C. (1998). Coping as a communal process. *Journal of Social and Personal Relationships, 15*, 579-605.

- Moorman, S. M. (2008). The multiple faces of autonomy in older adults' medical decision making. Presented at the annual meeting of the Gerontological Society of America, National Harbor, MD.
- Moorman, S. M., Hauser, R. M., & Carr, D. (2009). Do older adults know their spouses' end-of-life treatment preferences? *Research on Aging, 31*, 463-491.
- Murray, S. L., Holmes, J. G., Bellavia, G., Griffin, D. W., & Dolderman, D. (2002). Kindred spirits? The benefits of egocentrism in close relationships. *Journal of Personality and Social Psychology, 82*, 563-581.
- National Center for Health Statistics. (2007). *Health, United States, 2007*. Hyattsville, MD: U.S. Government Printing Office.
- Priem, J. S., Solomon, D. H., & Steuber, K. R. (2009). Accuracy and bias in perceptions of emotionally supportive communication in marriage. *Personal Relationships, 16*, 531-552.
- Pruchno, R. A., Lemay, E. P. Jr., Feild, L., & Levinsky, N. G. (2005). Spouse as health care proxy for dialysis patients: Whose preferences matter? *The Gerontologist, 45*, 812-819.
- Puchalski, C. M., Zhong, Z., Jacobs, M. M., Fox, E., Lynn, J., Harrold, J., et al. (2000). Patients who want their family and physician to make resuscitation decisions for them: Observations from SUPPORT and HELP. *Journal of the American Geriatrics Society, 48*(5), S84-S90.
- Raftery, A. E. (1995). Bayesian model selection in social research. *Sociological Methodology, 25*, 111-163.

- Rehman, U. S. & Holtzworth-Munroe, A. (2007). A cross-cultural examination of the relation of marital communication behavior to marital satisfaction. *Journal of Family Psychology, 21*, 759-763.
- Reis, H. T. (2007). Steps toward the ripening of relationship science. *Personal Relationships, 14*, 1-23.
- Reis, H. T., & Patrick, B. C. (1996). Attachment and intimacy: Component processes. In E. Higgins & A. Kruglanski (Eds.), *Social psychology: Handbook of basic principles* (pp. 523-533). Chichester, England: Wiley.
- Royston, P. (2005). Multiple imputation of missing values: Update of ICE. *Stata Journal, 5*, 527-536.
- Rusbult, C. E., & Van Lange, P. A. M. (2003). Interdependence, interaction, and relationships. *Annual Review of Psychology, 54*, 351-375.
- Shalowitz, D. I., Garrett-Mayer, E., & Wendler, D. (2006). The accuracy of surrogate decision-makers: A systematic review. *Archives of Internal Medicine, 166*, 493-497.
- Singer, P. A., Martin, D. K., & Kelner, M. (1999). Quality end-of-life care: Patients' perspectives. *Journal of the American Medical Association, 281*, 163-168.
- Story, T. N., Berg, C. A., Smith, T. W., Beveridge, R., Henry, N. J. M., & Pearce, G. (2007). Age, marital satisfaction, and optimism as predictors of positive sentiment override in middle-aged and older married couples. *Psychology and Aging, 22*, 719-727.
- Thomas, W. I., & Thomas, D. S. (1928). *The child in America: Behavior problems and programs*. New York: Knopf.

United States Bureau of the Census. (2004). *Educational attainment of the population 15 years and over, by single years of age, sex, race, and Hispanic origin: 2004*. Washington, DC:

U.S. Government Printing Office.

United States Bureau of the Census. (2008). *Marital status of people 15 years and over, by age, sex, personal earnings, race and Hispanic origin: 2008*. Washington, DC: U.S.

Government Printing Office.

Windsor, T. D., Ryan, L. H., & Smith, J. (2009). Individual well-being in older and middle adulthood: Do spousal beliefs matter? *Journals of Gerontology*, *64B*, 586-596.

TABLE 1
Selection of primary respondents

	<i>N</i> (% of previous row)
Participated in Wisconsin Longitudinal Study in 2004-2005	11,536 (100)
... and received module on end-of-life preparations	8,090 (70.1)
... and was currently married	6,290 (77.8)
... and partner participated	4,208 (66.9)
... and reported having discussed end-of-life with partner	2,969 (70.5) ^a
... and had not appointed a durable power of attorney for health care	1,059 (35.8) ^b

^a Sample for research question one

^b Sample for research question two

TABLE 2

Sample characteristics ($N = 2,969$)

<i>Dependent variables (reported by primary respondents)</i>	
Felt extremely well understood following end-of-life discussion with partner	79.0%
Appointed partner as durable power of attorney for health care	50.5%
Appointed another person as durable power of attorney	13.6%
No durable power of attorney; would prefer partner	28.1%
No durable power of attorney; would prefer another person	7.7%
<i>Independent variables (reported by primary respondents)</i>	
Perceives marriage to partner as very close	87.6%
Perceives partner to be very similar to self	64.5%
Formally planned for own end-of-life with partner	57.4%
Formally planned for own end-of-life with another person	13.3%
Years of age	Mean: 64.38 (SD: 4.01)
Female	46.3%
<i>Independent variables (reported by partners)</i>	
Perceives marriage to primary respondent as very close	85.4%
Perceives primary respondent to be very similar to self	63.2%
Formally planned for own end-of-life with primary respondent	41.8%
Formally planned for own end-of-life with another person	27.4%
Discussed own end-of-life preferences with primary respondent	54.5%
Discussed own end-of-life preferences with another person	25.4%

TABLE 3

Summary of binary logistic regression analyses, odds of feeling that a partner understands one's end-of-life health care preferences extremely well ($N = 2,969$)

	Odds Ratio (95% C.I.)
<i>Independent variables (reported by primary respondents)</i>	
Perceives marriage to partner as very close	1.96*** (1.49-2.57)
Perceives partner to be very similar to self	1.67*** (1.36-2.05)
Formally planned for own end-of-life with partner	2.08*** (1.63-2.65)
Formally planned for own end-of-life with another person	1.69** (1.22-2.35)
Years of age	1.00 (0.98-1.02)
Female	0.83 (0.68-1.00)
<i>Independent variables (reported by partners)</i>	
Perceives marriage to primary respondent as very close	1.27 (0.96-1.68)
Perceives primary respondent to be very similar to self	1.09 (0.88-1.35)
Formally planned for own end-of-life with primary respondent	1.20 (0.92-1.57)
Formally planned for own end-of-life with another person	1.02 (0.77-1.34)
Discussed own end-of-life preferences with primary respondent	1.45** (1.14-1.85)
Discussed own end-of-life preferences with another person	1.79*** (1.32-2.41)
Wald χ^2 ; df	210.0; 12

Note. Standard errors are corrected for the clustering of 2,969 individuals in 2,589 families.

* $p \leq .05$, ** $p \leq .01$, *** $p \leq .001$

TABLE 4

Summary of binary logistic regression analyses, odds of intending to appoint one's partner as durable power of attorney for health care ($N = 1,059$)

	Model 1	Model 2
	Odds Ratio (95% C.I.)	Odds Ratio (95% C.I.)
<i>Independent variables (reported by primary respondents)</i>		
Felt extremely well understood following end-of-life discussion	--	1.61** (1.17-2.20)
Perceives marriage to partner as very close	1.84** (1.18-1.86)	1.72* (1.11-2.67)
Perceives partner to be very similar to self	1.09 (0.78-1.52)	1.04 (0.74-1.46)
Years of age	0.94*** (0.90-0.97)	0.94*** (0.90-0.97)
Female	0.46*** (0.34-0.64)	0.47*** (0.34-0.65)
<i>Independent variables (reported by partners)</i>		
Perceives marriage to primary respondent as very close	1.02 (0.65-1.61)	1.01 (0.64-1.58)
Perceives primary respondent to be very similar to self	1.06 (0.75-1.50)	1.06 (0.75-1.49)
Formally planned for own end-of-life with primary respondent	0.92 (0.61-1.40)	0.90 (0.59-1.38)
Formally planned for own end-of-life with another person	0.66* (0.44-0.99)	0.66 (0.44-1.00)
Discussed own end-of-life preferences with primary respondent	1.21 (0.85-1.72)	1.19 (0.83-1.70)
Discussed own end-of-life preferences with another person	1.12 (0.70-1.80)	1.06 (0.66-1.71)
Wald χ^2 ; df	48.2; 10	53.9; 11

Note. Standard errors are corrected for the clustering of 1,059 individuals in 1,009 families.

* $p \leq .05$, ** $p \leq .01$, *** $p \leq .001$