Marital Troubles in Older Couples: Positivity, Personality and Health

Abstract

In this paper, we examine the implications of health and personality characteristics for marital conflict, using dyadic data from the 2010 wave of the National Social Life Health and Aging Project (NSHAP), a nationally-representative probability survey, which interviewed both members of 955 couples, aged 36 to 99. We find that wives with husbands in worse physical health are more likely to report increased levels of marital troubles, but that wives in worse physical health do not appear to trouble their husbands. Furthermore, husbands' personality characteristics predict more marital conflict, but wives' personality characteristics are seemingly of no consequence. Specifically, higher levels of husbands' extraversion, lower levels of agreeableness, high neuroticism, and low levels of a new measure, which we name positivity, all contribute to increased marital conflict, according to wives' reports. Couples where both partners report marital conflict are also typified by husbands with high neuroticism, and low positivity.

KEY WORDS: Conflict, Families in middle and later life, Health, Marriage, Personality, Survey research

Married people show better health and lower mortality risk than the unmarried (Holt-Lunstad & Birmingham, 2008; Waite & Gallagher, 2000), but the benefits depend on the quality of the marriage, with poor quality marriages being no better and perhaps worse than no marriage (Umberson, Williams, Powers, Liu, & Needham, 2006; Williams, 2003). Marital quality is important across the life span but seems to be particularly important in later life as health tends to decline and chronic conditions accumulate (Carstensen, 1991; Umberson, et al., 2006). Marital conflict tends to accelerate age-related decline in physical and mental health and to increase the risk of dying (Birditt & Antonucci, 2008; Coyne, et al., 2001). In short, marital quality is a key component in overall quality of life.

Conversely, while both physical and mental health can be diminished by poor marital quality, poor marital quality can also be precipitated by poor health. The physical health challenges of a spouse or long-term partner can become a burden, as their spouse is no longer able to contribute to the household and may need care (Booth & Johnson, 1994; Joung, van de Mheen, Stronks, van Poppel, & Mackenbach, 1998). At the same time, depression, anxiety and stress can create new challenges as partners' emotional states become more volatile (Gagnon, Hersen, Kabacoff, & Van Hasselt, 1999). By this account, reducing the chance of marital conflict is not simply a matter of marital partners' attitudes toward each other, but also of addressing the physical health and psychological states of the two people who make up the marriage.

The same account can be extended to psychological traits from psychological states, in terms of traits being personal endowments for the maintenance of marital quality. It is currently a well-established finding that the personality of one's partner matters for marital quality, in addition to one's own personality (Botwin, Buss, & Shackelford, 2006; Donnellan, Assad, Robins, & Conger, 2007; Robins, Caspi, & Moffitt, 2000). Negative personality traits generally

predict greater conflict and worse communication between partners (Caughlin, Huston, & Houts, 2000; Heaven, Smith, Prabhakar, Abraham, & Mete, 2006; McNulty, 2008). Partners who recognize each other's personality traits may therefore be more able to avoid conflict by anticipating recurring patterns of behavior and perception, tied to their partner's personality, or their own (Kilmann, 2012). Understanding how, why, and how much personality matters for marital quality and conflict is therefore crucial for predicting which marriages will become sources of stress, and for helping distressed couples reduce conflict.

In this paper, we examine the implications of personality and health for marital conflict in a nationally-representative survey of older couples. Our sample allows us to make population-level generalizations in a way that most existing studies cannot (Caughlin, et al., 2000; McNulty, 2008; Slatcher & Vazire, 2009). Furthermore, we apply a structural equation model (SEM) to a battery of personality questions in order to extract the respondents' overall propensity to put forth positive aspects of their personality, regardless of their other traits. We find that wives of highly-positive husbands are less likely to report marital conflict, suggesting positivity may be a trait-like psychological disposition. We also find that the husband's physical health affects how much marital conflict the wife reports, but that the reverse is not true. We discuss the implications our findings for further studies on marital quality, and underscore the importance of personality and health as foundations for marital quality and the avoidance of marital conflict.

Background

High levels of conflict are the most important predictor of marital dissatisfaction (Christensen & Walczynski, 1997). Some researchers propose what is called the *social structure hypothesis* to explain the origins of marital conflict, which calls attention to power imbalances between men and women (Eldridge & Christensen, 2002; Gottman, 1994). Both husbands and

wives, at some point in the relationship, may desire some kind of change from their partner in terms of the partner's behaviors or attitudes. However, because men are typically advantaged in terms of wealth and power, they are more able to resist women's demands and withdraw from negotiations, thereby reducing their partner's satisfaction with the relationship (see Eldridge & Christensen, 2002).

In recent decades, numerous scholars have raised objections to the social structure hypothesis, arguing that while structural inequalities between men and women surely do exist, not all studies produce findings that are consistent with the social structure hypothesis. Specifically, power imbalances between men and women do not seem to be either necessary or sufficient for conflict. For example, women have been found to sometimes be *more* dominant than men in marital relationships (Vogel, Murphy, Werner-Wilson, Cutrona, & Seeman, 2007), and when women make demands of husbands, the same pattern of withdrawal may occur (Christensen & Heavey, 1990). As an alternative to the social structure hypothesis, numerous researchers have proposed what has been called the *individual differences hypothesis*. This line of work looks to the traits of both partners, arguing that a person's individual psychological traits lead to behavior that troubles their partner (Caughlin, 2000; Eldridge & Christensen, 2002; Vogel, et al., 2007).

Personality and Marital Conflict

The most commonly-used framework for measuring personality traits is the Big Five, which has exploded in popularity over the last decade, including in social-scientific research (see John, Naumann, & Soto, 2008). The Big Five is part of a hierarchical theory of personality, where lower-level patterns of behavior are aggregated into higher-order traits, which are relatively consistent across situations and time (John, et al., 2008). These traits, summarized in

the mnemonic OCEAN, are Openness to experience, Conscientiousness, Extraversion, Agreeableness and Neuroticism. Big Five factors tend to be unstable at younger ages, but eventually settle into high test-retest reliabilities, even over long periods; one nationally-representative longitudinal study found reliabilities of .62 and higher, with ten years between initial observation and follow-up (Turiano, et al., 2012).

The relationship between higher neuroticism and worse conflict has frequently been replicated across studies (Caughlin, et al., 2000; Gattis, Berns, Simpson, & Christensen, 2004; McNulty, 2008). People higher on trait neuroticism are more likely to be critical of their partners, and also to perceive their partners as being hostile or critical even when observer ratings did not confirm this (McNulty, 2008). Findings related to the other four traits in OCEAN have been inconsistent, but several studies have provided suggestive results. Botwin, Buss and Shackelford (2006) found that women are more likely to prefer socially-desirable personality traits in their partners (i.e. O,C,E and A), and that if their partner was lacking in any of these traits, women were more likely to report dissatisfaction with the relationship. Gattis and colleagues found that low A and low C were tied to marital dissatisfaction, as was low levels of a construct called 'positive expressivity:' being gentle, helpful, kind and understanding (2004). Women are also more likely to be happy with male partners who have high positive emotionality, which is a factor in the Multidimensional Personality Questionnaire proxying a low threshold for experiencing positive emotions, and a view of life as generally pleasurable (DiStephano & Motl, 2009).

Taken together, these studies imply that it may not be any particular scale in OCEA that matters for preventing marital conflict, but the partner's overall positivity on every trait - in short, their global disposition to display an upbeat personality, and to be their best self for the sake of

their spouse. Existing techniques in psychometric personality psychology can be brought to bear on personality batteries, in order to model individuals' response processes, and thereby create a proxy for global positivity. It is not uncommon in SEM to include an additional factor soaking up the variance which is due to person-specific idiosyncrasies of scale use (Chang, Connelly, & Geeza, 2012; DiStephano & Motl, 2009). These are usually called *method factors*, but are sometimes spoken of as capturing additional traits that are of interest to researchers (Chang, et al., 2012). For example Geiser, Eid and Nussbeck discuss willingness to rate oneself high on positive-sounding items in a psychometric battery as possibly representing a kind of trait (Geiser, Eid, & Nussbeck, 2008), and relate it to 'Pollyanna Syndrome,' or a having a highly optimistic self-image and view of life (Matlin & Stang, 1978). Once fit to the data, it may be that a method factor is, as its name suggests, only an artifact of method, but this is a question that has to be investigated empirically, and we propose that if the additional factor is just a survey effect, we will not observe any impact of a husband's method factor score on his wife's appraisal of the relationship. If we do observe some substantial, statistically significant relationship, then we can more plausibly argue that the additional factor is not simply a method factor, but proxies behavior which continues outside the interview, and impacts the partnership.

Mental and Physical Health

Neuroticism is related to mental health, but it is not, itself, poor mental health (John, et al., 2008). It is perhaps best-understood as a person's general level of negative affect, as well as their vulnerability to irritation, anger and worry (Lachman & Weaver, 1997). Other mental characteristics besides neuroticism, or positive personality traits, go into what we call mental health, including mental states, and psychological mental states can also affect marital quality. Living with a more depressed partner, for instance, pressures the non-depressed partner to alter

their behavior and inhibit their negative responses to spouses' depression, leading to stress (Pruchno, Wilson-Genderson, & Cartwright, 2009). Individuals with worse mental health may also be less able to adjust their behavior to the requirements of married life (Gagnon, et al., 1999). One's own mental health and the mental health of one's partner both matter in this context, since each can contribute to lower overall marital satisfaction (Pruchno, et al., 2009).

Physical health also seems to have an impact on marital quality, but few studies examine the physical foundations of marital conflict. Physical health can create greater stress within the relationship, by making it more difficult for one partner to reciprocate kindness (Booth & Johnson, 1994; Joung, et al., 1998). One spouse may end up becoming a caregiver for the other, leading to stress, overwork, and resentment on the part of the caregiver (MacNeil, et al., 2010). Faced with such burdens, some marriages do not survive one partner's health problems; one study found that for women who are not employed, worse physical health predicts marital dissolution (Waldron, Hughes, & Brooks, 1996).

There is presently no name for this current of marital research, but in keeping with the genre of names provided above, one could label this the *health endowments hypothesis*: that psychological states and physical health are both a kind of resource that partners bring to the relationship, each of which can help them to be less burdensome and more able to care for their partners in a reciprocal and equitable manner (Christakis & Allison, 2006). One can conceptualize the relationships between these three hypotheses in this way: personality traits shape what a person *is inclined to do*, health endowments enable what a person *can do*, and social structures create gendered role-relationships which *define what the task is* (e.g. that a wife must be dutiful to her husband, while husbands do not necessarily need to pay close attention to their wives).

Research Questions

Our hypotheses can be summed up as saying that poor health, high neuroticism and low positive personality traits will increase marital conflict. The review of the marital conflict literature also makes clear that each of these hypothesized effects may vary by gender, and that husbands, by virtue of their more advantaged gender roles, may be able to 'opt out' of interacting with conflict-inducing wives. Wives on the other hand may be more likely to put their husbands' emotional and physical well-being under their care, and thus their husbands may be a larger and more inescapable part of their lives. If this is so, we would expect larger effects for all of these factors - physical health, mental health and personality - on wives rather than husbands.

We use dyadic data in a nationally-representative probability sample to address these questions. When we say 'dyadic data' we mean both the husbands and the wives are given surveys, and provide their own responses rather than having their partners respond for them. Most studies that have this kind of data do not use nationally-representative samples (Bouchard & Arseneault, 2005; Neyer & Voigt, 2004; Pruchno, et al., 2009). Conversely, when studies do use nationally-representative samples to study marital quality, their data are almost never dyadic (Bookwalla, 2011; Umberson, et al., 2006; Warner & Kelley-Moore, 2012). We are able to fulfill both these criteria, using the dataset described below.

Method

Sample and Measures

Our data come from the second wave of the National Social Life, Health and Aging Project (NSHAP), which was fielded in 2010-11. NSHAP is a nationally-representative study of older adults, designed to collect extensive information on the social and romantic/sexual lives of older respondents, as well as a broad array of health status assessments. The first wave of

NSHAP comprised 1455 men and 1550 women over the age of 57, for a total of 3005 respondents with a response rate of 75.5%. In Wave 2, spouses and coresident partners were also interviewed using the same protocol for the focal respondents. Interviews were completed with 955 partners, which yielded a sample of 955 marital and cohabitational dyads. The Wave 2 response rate was 76.9% including partners.

Our outcome is a scale which we call 'couple trouble.' The scale was composed of three items, the respondent's perception of: 1) how often their partner makes too many demands, 2) how often the partner criticizes the respondent, 3) how often the partner gets on the respondent's nerves. The internal consistency of the scale was found to be acceptable for both genders (α = 0.65 for men, 0.65 for women).

The Big Five was measured using the Midlife Development Inventory or MIDI (Lachman & Weaver, 1997). The MIDI comprises a list of adjectives, with a prompt for the respondent to rate how much each of these words describes them on a four-point scale, where the options are "*Not at all*," "*A little*," "*Some*," and "*A lot*." The MIDI has been used in the Health and Retirement Study (HRS) and the Midlife Development the United States (MIDUS) study (Lachman & Weaver, 1997). The MIDI is also highly consistent across time at older ages (Turiano, et al., 2012), meaning we can be confident that our personality measure describes the person not just as they are today, but as they have been for at least several years before the interview. Which adjectives load on which latent, OCEAN factors will be described below.

NSHAP contains a module that asks the respondent to name up to five individuals with whom they discuss important matters, which is an adaptation of the name generator used in the General Social Survey (Cornwell, Schumm, Laumann, & Graber, 2009). If the respondent does not list their spouse as a confidant, the interviewer adds the spouse to the roster regardless. Then

the respondent is asked if there is some additional, special friend who they did not name, making a maximum of seven. Information on respondents' demographics, the length of their partnership, and self-rated physical and mental health were obtained in NSHAP as well. We use these items as controls. Self-rated global physical health is one of the most reliable predictors of mortality and declines in health (Idler & Kasi, 1991, 1995), and generally, individuals who report that they are in poor physical health are correct in their assessment, according to objective measures (Idler & Kasi, 1995). Self-rated global mental health, while it is not a substitute for more specific mental health measures, loads strongly onto numerous other mental health factors (Fleishman & Zuvekas, 2007). We also control for whether the respondents are married or cohabiting, and how many years they have been residing together. We will always use the term 'husbands' and 'wives' to refer to male and female partners respectively. We categorize a couple as 'married' if both partners report that they are married. See Table 1a for the proportion married versus cohabiting.

Analytic Strategy

The first stage of our analysis uses SEM to extract the Big Five dimensions of personality, as well as the additional factor that we hypothesize will capture general positive self-presentation. Consider the responses of individuals i to a set of personality adjectives j. An m-dimensional factor model for y_{ij} takes the form:

$$y_{ij} = \boldsymbol{\mu}_j + \boldsymbol{\Lambda}_j' \boldsymbol{\gamma}_i + e_{ij}$$

Where $\boldsymbol{\mu}$ denotes the intercept for item j, $\boldsymbol{\Lambda}$ is the vector of factor loadings for that item, $\boldsymbol{\gamma}$ is the factor score estimated in the SEM, and e is the error term. Under conventional specifications of the Big Five, m is five, and so $\boldsymbol{\Lambda}$ will have five possible entries, each assigned to an item j. To model global positivity, we fit a sixth factor which we allow to predict respondents' scores on all items, meaning the model becomes:

$$y_{ij} = \mu_j + \Lambda_j' \gamma_i + \Omega_j' \omega_i + e_{ij}$$

where the new terms Ω and ω are vectors containing the sixth factor loading, and the sixth factor score respectively. Thus every Big Five factor score will be interpretable as a latent trait, net of the sixth factor. This will change the interpretation of the factor loadings, as we point out later in the paper. Since the response categories are ordinal, we employ an ordered probit link between y_{ij} and the right side of the equation, meaning that all factor loadings are in standard deviation units from a standard normal distribution, with a mean of 0.

We will use these factor scores in our regressions to predict self-reported trouble with one's partner, separately by gender to see whether the same personality factors which affect wives' appraisal of the relationship affect husbands, or whether there are gendered effects. Because reports of trouble are very likely to be correlated within-couples (which we test below), estimating the regressions separately for men and women may not be sufficient for modeling the unique effects of personality variables on men's reports of trouble, separate from women's reports of trouble. In other words, the correlation of couple trouble within dyads will lead to inefficient regression estimates (Zellner, 1963). To address this problem we use Seemingly Unrelated Regression Equations (SURE):

$$(1) \quad y_{iH} = x_{iH}' \beta_H + \epsilon_{iH}$$

$$(2) \quad y_{iW} = x_{iW}' \beta_W + \epsilon_{iW}$$

Equation 1 predicts some outcome for husbands (H) and equation 2 predicts some outcome for wives (W). x_i' is a vector of predictors and β is a vector of regression coefficients. These two equations are estimated simultaneously, along with a correlation between the disturbance terms ϵ_{iH} and ϵ_{iW}, with the notation ρ. If the estimated correlation is not significantly different from zero, then the two equations for husbands and wives could be estimated separately. Towards the

end of the analysis we will briefly describe personality differences in couples where both husbands and wives jointly report couple trouble, which SURE does not allow us to discuss.

SURE requires husbands to be paired with wives in rows of data, which is problematic for same-sex couples. In these data, there was one same-sex male couple and one same-sex female couple. In order to include these two couples in the regression equations, we employ Full Information Maximum Likelihood (FIML), which is a technique for handling missing data. Unlike imputation, FIML does not create simulated values, but rather makes use of all information that exists for any of the variables included in the model by computing a casewise likelihood function, using means and covariances for all variables that are observed for a particular case (Enders & Bandalos, 2001). In simulation studies, FIML has been shown to give more consistent and efficient estimates of model parameters than complete case analysis, or single value imputation, further recommending it for our use here (Enders & Bandalos, 2001). Thus as long as there are some variables that do not have missing data, FIML allows us to include the entire sample, meaning even though some husbands have missing data on their wives' variables, because they are members of a same-sex partnership, their information can still be used in SURE. Our estimation sample is therefore the entire 955 couples.

Results

Figure 1 shows results from the SEM. Previous to fitting this model, we attempted several alternative specifications, comparing models by three measures: the chi-squared test of model fit, the Confirmatory Fit Index (CFI), and the Root Mean Squared Error of Approximation (RMSEA). Smaller chi-squared values, higher CFI and lower RMSEA indicate better model fit (Ullman & Bentler, 2003). First, we fit a model with five latent factors corresponding to OCEAN, estimating all covariances between latent factors (χ^2 4919.67; CFI .85; RMSEA .10).

Second, we fit a model using the General Factor of Personality (Erdle & Rushton, 2011; Van der Linden, Scholte, Cillessen, te Neijenhuis, & Segers, 2010), which is a common second-order trait in the personality literature (χ^2 5083.59; CFI .84; RMSEA .10). Finally, we fit the model as shown in Figure One, which adds a sixth factor, and leaves all factors constrained to have covariances of zero; allowing additional paths would mean the model was no longer identified (χ^2 2078.66; CFI .94; RMSEA .07). The chi-squared test was always significant $p<.001$, but the chi-squared test is rarely insignificant in large surveys because it is sensitive to sample size (Ullman & Bentler, 2003). This final, six-factor model had the best fit. Variances of latent factors were constrained to one, and means set to zero, again to ensure the model was identified.

The sixth factor on the left could be interpreted in several different ways. On the one hand, the sixth factor could be capturing social desirability (Bäckström, Björklund, & Larsson, 2009), but if so, we would expect positively worded items to load positively on to the sixth factor, and negative items to load negatively. However, 'worrying' and 'nervous' do not load onto this factor at all, making that interpretation implausible. We could interpret it as an acquiescence factor (Krosnick, 1999), but this is also contrary to the results, since then we would expect all items to load positively on it, and this is not the case. Likewise this does not seem to be a factor capturing scale-use, for the same reasons. We name this factor *P* for *Positivity,* because it displays high positively loading factors for positively worded items, but ignores, for the most part, negatively worded items (note that the absolute value of the loading on 'moody,' while significant, is small). Positivity also has the highest loadings on the terms 'friendly,' 'warm,' 'lively,' and 'caring,' which are part of the prosocial extraversion and agreeableness scales. Positivity loads less strongly on openness and conscientiousness, and it is lowest for 'organized.' As was said above, at this stage is it not clear whether positivity is simply a survey artifact, or

something that continues to predict behavior outside the survey context. If we find that one partner's positivity score affects the other partner's appraisal of trouble in the relationship, then we can more plausibly argue for the latter.

Table 1a presents characteristics of the 955 partner dyads. Husbands (72) were three years older than their wives (69) on average. The couples are predominantly non-Hispanic whites, have some post-secondary education, and, for the most part, represent their self-rated physical and mental health as better than poor or fair. Respondents also reported having some trouble within their relationships, indicating that there were moments when they felt that their spouses could be critical, demanding and could get on their nerves. It is worth mentioning that the gender difference was statistically significant ($p < .01$), with men reporting slightly more trouble than women. It is also interesting that the couple's race (.88), education (.40) and age (.69) were highly correlated; a result that reveals considerable intra-couple homogeneity. Finally, note that almost none of the variables in this table had any missing data.

Table1b provides summary statistics on the five personality factors, including positivity. Here we can see that there is more missing data on the personality variables, probably because the personality battery was administered in the leave-behind questionnaire, and some respondents never returned it. All gender differences are significant, but correlations within couples on these measures are fairly low. Compare these correlations to the within-couple correlations on race (.88) and education (.40); none of these correlations are greater than .10. We also found that these correlations were low prior to fitting the structural equation model, and that correlations between any two personality scales were low within couples (lower than .10, results not shown). The significant scores on agreeableness, neuroticism and positivity suggest some matching within pairs. Note as well that none of the correlations are negative.

Table 2 provides the results from SURE, predicting couple trouble, using personality, demographic controls, health and social context (married or not, network size, years living together). Note that the personality scales and the outcome have all been standardized, years living together is in decades starting at 0, and age is given in decades starting at 50. Thus the constant is interpretable in each equation as the average amount of couple trouble for a respondent with average personality characteristics, under the age of 50, without post-secondary education, no network members, unmarried, just starting living together, ethnic minority in good mental and physical health. We chose to dummy for non-Hispanic White, with the reference group being all other ethnoracial identities, in order to reduce the number of predictors in the model; including dummies for non-Hispanic blacks and Hispanics did not change the results for the personality scales. We also dummy for having a college education or more. We can see at the bottom of the table that rho is .23, and significant at $p < .001$, meaning it was suitable to use SURE in this case.

In accord with previous studies, the respondent's own neuroticism seems to predict higher levels of trouble with the partner. However, note the gender asymmetry in the effects of partner's neuroticism: wives with more neurotic husbands, net of their own neuroticism, are more likely to report trouble with their partner. Regarding positivity, the respondent's own positivity does not predict differences in couple trouble, either for husbands or for wives. In contrast, a husband's positivity predicts less trouble reported by their wives. Husbands who are more agreeable are also less likely to trouble their wives. Strangely, having a more extraverted husband, net of his other personality characteristics, means that the wife is *more* likely to be troubled by her husband. The zero-order correlation between husbands' positivity and wives' reports of couple

trouble is -0.14 ($p < .001$). The correlation between self-reported Neuroticism and reports of couple trouble is .17 for men, and .12 for women (both $p < .001$).

We have placed '§' signs to indicate where the coefficients for husbands and wives are different from each other, according to a Wald test, with a minimum significance level of .05. The effect of partner's positivity on reports of couple trouble is no different for men and women, even though the coefficient is significant for husbands' effect on wives, but not for wives' effect on husbands. This difference is significant at .10 ($p=.09$). There are only two significant differences between husbands' and wives' coefficients. The first is network size: wives who report more couple trouble also report larger social networks. Second, husbands who report being in poor or fair physical health have wives who rate them as more troublesome. There is no effect of wives' physical health on husbands' reports of couple trouble. Also note that husbands and wives with poor or fair self-reported mental health are more likely to report couple trouble than those in better mental health. It seems in terms of personality and physical health husbands' scores are more likely to affect wives' reports of trouble than the reverse.

Note the positive correlation between post-secondary education and couple trouble for husbands. We investigated this further at the level of zero-order correlations and found that men with less than a high school degree had couple trouble scores 0.24 standard deviations lower than men with more education ($p < .01$), and that women had couple trouble scores 0.14 standard deviations lower than more educated women (n.s.). All higher levels of education were not distinguishable from each other in terms of their levels of couple trouble for men or for women.

These results only tell us whether husbands report that their wives trouble them, or if wives report their husbands trouble them; it does not show us whether it is only the wife, only the husband or both who are reporting trouble. In order to create categories which divide couples

into partnerships where both, neither, or only the male or female partner report trouble, we dichotomized the scales at 2.33 (the median for both genders). This cut point means that the respondent's partner had to be troubling them at least 'some of the time' for two out of the three component items. Out of all couples, 382 couples reported no trouble at all (40.0%), 215 were couples where the wife troubled the husband but not vice-versa (22.5%), 165 were couples where the husband troubled the wife but not vice-versa (17.3%), and there were 192 couples where each partner reported the other as troublesome (20.1%).

Figure 2 shows levels of neuroticism and positivity for husbands and wives, for each of the four categories of partners directly above. Each of the items which make up neuroticism run from 1 to 4; the mean of neuroticism as a factor score centers on 2 for 'moody,' 3 for 'worrying,' 2 for 'nervous' and 3 for 'calm.' We also add 95% confidence intervals. Personality scales were standardized for husbands and wives separately. Note the dramatic differences in positivity and neuroticism between husbands in no-trouble relationships and husbands in both-troublesome relationships, while one-sided troublesome relationships are no different from one another. Women's confidence interval bars overlap for every relationship category, suggesting that differences in wives' personalities are less consequential than husbands' for reducing trouble in long-term partnerships.

Discussion

In this paper, our central question was whether poor health and negative personality traits predict marital conflict, including the health and personality of one's partner. We hypothesized that male personality traits and health would have a larger effect on their wives' reports of couple trouble than female traits and health would have on husbands' reports of trouble. In the course of this investigation, we discovered that personality had little to no correlation within couples. This

finding was surprising because some previous research has suggested that couples tend to be congruent in their personality traits, and to become more congruent over time (Rammstedt & Schupp, 2008). Considering the average length of cohabitation between partners in this sample was more than forty years (median 44 years), it seems unlikely that partners began their lives together as similar, and then became less congruent over time. The very high correlation of education and ethnicity within-couples would suggest that personality factors are generally less important for the formation and persistence of long-term partnerships, compared to social status characteristics. This is in line with other research which shows that individuals with poor mental health do not usually prefer or avoid other individuals with poor mental health (Schaefer, Kornienko, & Fox, 2011). We discovered similarly low correlations of mental health within-couples.

Furthermore, we found that there was a moderately large correlation in couple trouble within couples. This correlation was highly significant, and warranted fitting SURE. Individual and partner factors reduced this correlation by about a third (.30 to .23). Either partner's poor mental health predicted their own self-reports of conflict. Conversely, wives with husbands in poorer physical health were more likely to feel troubled by their husbands, regardless of their own physical or mental health. This was not true for husbands, suggesting that husbands with wives in worse physical health either do not perceive, or do not pay attention to, trouble from wives. In terms of the significance of this finding for the health endowments hypothesis, it would appear that while one's own mental health predicts reporting more trouble, a husband's physical health matters more for marital quality than the wife's physical health.

The positivity score that we produced nets out the positive performance of personality running through the other, socially desirable personality adjectives, and as such we should take

care in interpreting the results. 'extraversion,' for instance, is a personality factor that is highly associated with positively valued social characteristics, such as being friendly. To remove the positive performance factor from extraversion leaves the remaining E-scale with the asocial (though not necessarily antisocial) components of extraversion. These are impulsivity, low self-control and high levels of energy and vitality, or what is sometimes called 'surgency' (John, et al., 2008). In light of this, it is not surprising that husbands with high levels of extraversion, net of positivity, are more likely to trouble their wives. These individuals may be difficult for their spouses to manage, although without more high-resolution data on the social processes at work in the marriage, this is currently only a basis for future hypotheses.

We found that husbands' positivity protected against higher levels of couple trouble, according to wives' reports. The positivity scale is therefore probably not simply a survey artifact, but has implications for the behavior of husbands outside of the survey. Although we did not find any significant difference between effects of husbands' positivity on wives' reports and wives' positivity on husbands' reports at $p < .05$, the former effect is more than four times as large as the latter. Thus there is some evidence here that husbands' personality matters more for reducing couple trouble than their wives' personality.

While the individual differences hypothesis was originally set up as opposed or separate from the social structure hypothesis, our results suggest aspects of both. However Neurotic or Positive the wife may be, husbands may be less likely to take any notice. If there are power imbalances between men and women in terms of their ability to opt out of conflict, it would seem that men are more able to take advantage of this power. This would also help to explain the finding that husbands' physical health matters to wives' reports of trouble - for wives, what is

happening in the husbands life matters, but what is happening in the wife's life is less consequential for the husband.

We also found noteworthy differences between the personalities of husbands in relationships where both partners trouble each other, compared to relationships where neither partner troubles the other. There were no significant differences between the personalities of wives comparing these two kinds of relationships. This suggests that husbands' personalities matter more for dyad-level marital quality than wives'.

In addition to these substantive findings, this study has methodological implications for the way that future research employs personality batteries. First, we utilized SEM in order to extract the ways in which respondents made use of the adjectives they were presented. The survey is a social situation, and accordingly, *how* people respond to survey questions can tell us as much about the way they interact with others as *what* they report. Method factors help us obtain such insights, by paying more careful attention to the response process as a kind of social process. Social desirability effects are only one such example, and we show that personality batteries can be used to extract positivity as a measure of the person's positive self-presentation. In this way, the survey becomes a kind of stimulus to gauge the respondent's propensity to positively self-present. We found that the positivity of one respondent can matter for what their partner reports about them, lending further support for the utility of these factors in sociologically informed research.

Because this paper was simultaneously interested in personality and health, we did not include very specific measures of health in order to provide a wide picture of the relationship between physical/mental well-being and marital quality. It may be that not all ailments are equal in terms of their tendency to promote marital conflict. Husbands who have diseases that leave

them physically infirm, but mentally stable, may stay amicable in the face of their disability. Chronic diseases that precipitate depression, such as diabetes (Trief, Wade, Britton, & Weinstock, 2002), may be worse for marital quality, because changes in mental health also change the person's outlook on life and correspondingly, their attitude towards their partner (Bookwalla, 2011; Warner & Kelley-Moore, 2012). Future papers investigating health and marital quality may wish to dig deeper and examine specific diseases and marital quality, in order to discover nonobvious connections between diseases, disease trajectories, and relationships with key confidants.

The personality of one's spouse is of more obvious significance for marital quality, however, the way that this connection is supposed to operate becomes less obvious the more carefully one tries to describe it. Personality involves a kind of presentation of self, and a global attitude to the social world (Markus & Cross, 1990; Paulhus & Trapnell, 2008), which one's spouse is exposed to as much or more than any other confidant. Spouses typically cohabit and are often highly emotionally invested in their partners, meaning we would expect that their personalities matter a great deal for relationship quality. We found that the gendered roles of long-term heterosexual partnerships may provide avenues for the expression of personality. Subsequent studies should continue to examine personality batteries in order to explore the social dimensions of personality, including positive self-presentation.

Table 1a. Descriptive Statistics (*N*=955 Husbands; 955 Wives), Tests of Gender Differences and Correlation within Couples

		Husbands			*Wives*				
Variables	Range	Mean	SD	% Missing	Mean	SD	% Missing	t-test p-value	Correlation
Couple Trouble Scale	1 to 4	2.33	0.65	0.10%	2.26	0.67	0.10%	.002**	.30***
Non-Hispanic White	0 to 1	0.75	0.44	0.10%	0.74	0.44	0.10%	.897	.88***
College, BA or More	0 to 1	0.57	0.50	0%	0.59	0.49	0%	.256	.40***
Age	36 to 99	72.20	7.23	0%	68.89	7.67	0%	.172	.69***
Poor or Fair Physical Health	0 to 1	0.25	0.43	0.10%	0.23	0.42	0.10%	.225	.15***
Poor or Fair Mental Health	0 to 1	0.10	0.30	0.10%	0.13	0.33	0.10%	.059	.08*
Network Size	1 to 7	4.14	1.66	0%	4.96	1.35	0%	.000***	.19***
Years Living Together	0 to 73	40.28	15.93	5.02%	41.01	15.87	3.98%	.153	.97***
Married (vs. Cohabiting)	0 to 1	0.95	0.20	0%	0.95	0.21	0%	.318	.89***

Note: Couple trouble scale constructed from three items: how often partner gets on respondent's nerves, makes too many demands or

criticizes. Physical and mental health based on self-reports. Social network size based on

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

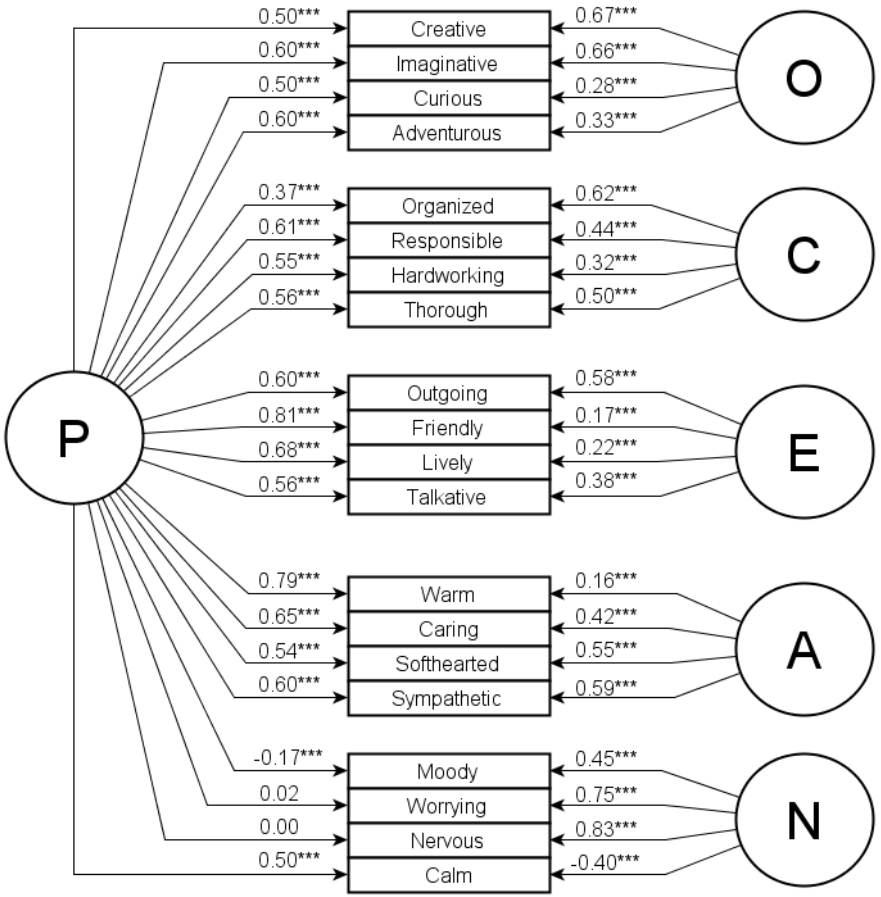
Table 1b. Descriptive Statistics (*N*=955 Husbands; 955 Wives), Tests of Gender Differences and Correlation within Couples

		Husbands			*Wives*				
Variables	Range	Mean	SD	% Missing	Mean	SD	% Missing	t-test p-value	Correlation
Openness	-2.5 to 2.4	0.09	0.75	11.83%	-0.04	0.77	12.04%	.001**	.06
Conscientiousness	-2.6 to 1.9	-0.03	0.70	11.83%	0.03	0.02	12.04%	.049*	-.01
Extraversion	-2.1 to 1.8	-0.02	0.63	11.83%	0.05	0.63	12.04%	.031*	.04
Agreeableness	-2.7 to 1.8	-0.19	0.66	11.83%	0.12	0.58	12.04%	.000***	.07*
Neuroticism	-1.8 to 2.2	-0.08	0.85	11.83%	0.20	0.80	12.04%	.000***	.07*
Positivity	-4.0 to 2.2	-0.20	0.88	11.83%	0.15	0.79	12.04%	.000***	.09**

Note: Couple trouble scale constructed from three items: how often partner gets on respondent's nerves, makes too many demands or criticizes. Physical and mental health based on self-reports. Social network size based on

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

Figure 1. Positivity (left) and the Big Five (right) in a Structural Equation Model



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

Table 2. Predicting Relationship Troubles (Seemingly Unrelated Regression using Full Information Maximum Likelihood; 955 Couples, 1910 Persons)

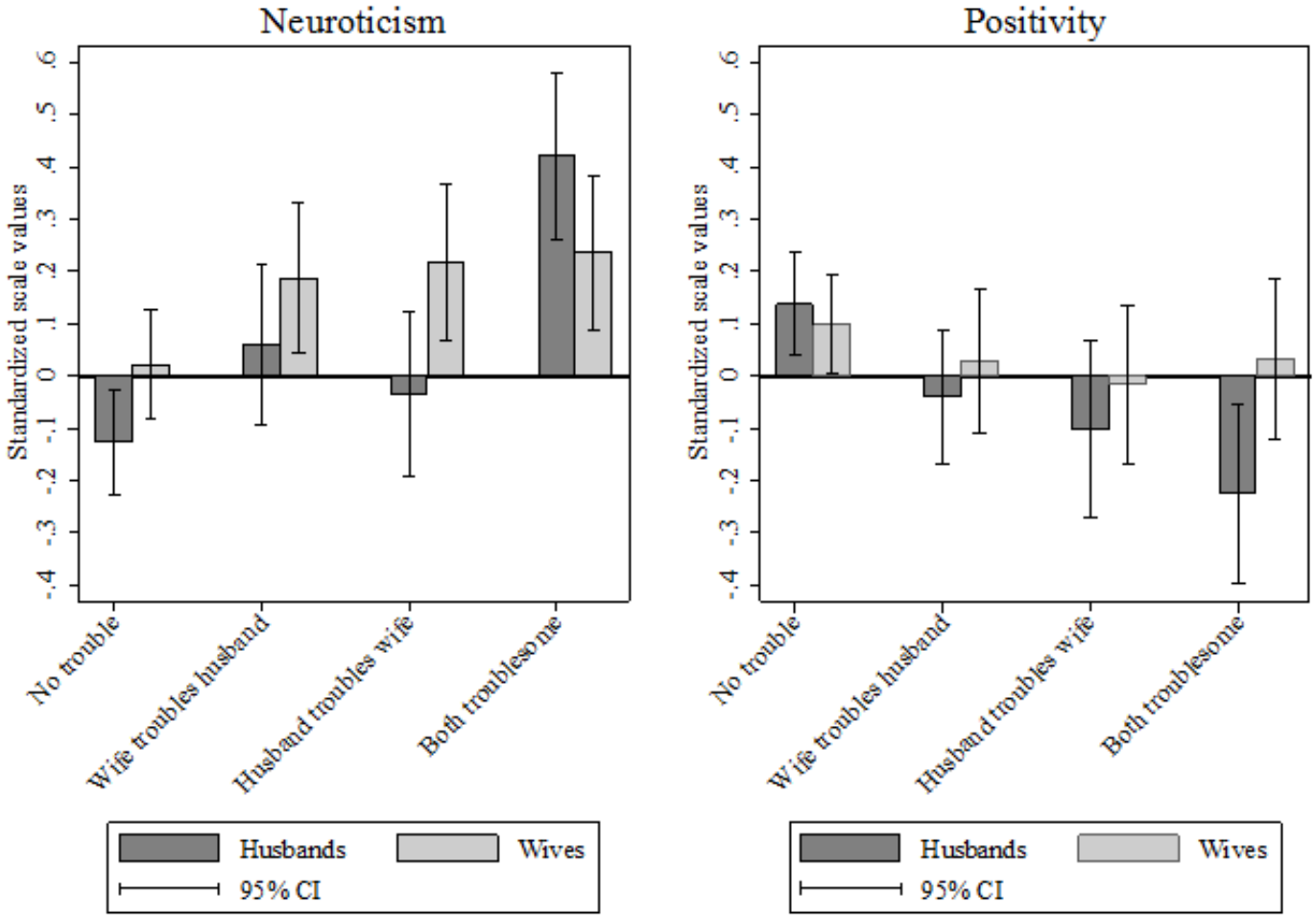
	Husbands			*Wives*	
Variables	b	SE		b	SE
Self					
Married (vs. Cohabiting)	-0.35*	(0.16)		-0.40*	(0.15)
Network Size	0.01	(0.02)	§	0.08**	(0.02)
Decades Living Together	0.05*	(0.02)		0.03	(0.02)
Non-Hispanic White	-0.06	(0.08)		-0.10	(0.08)
College, BA or More	0.15*	(0.07)		0.10	(0.06)
Age (Decades)	-0.04	(0.04)		-0.02	(0.04)
Poor or Fair Physical Health	0.04	(0.08)		-0.10	(0.08)
Poor or Fair Mental Health	0.28**	(0.11)		0.28**	(0.10)
O	-0.01	(0.04)		0.05	(0.04)
C	-0.04	(0.04)		-0.05	(0.04)
E	-0.01	(0.04)		-0.05	(0.04)
A	-0.10*	(0.04)		-0.03	(0.04)
N	0.17***	(0.04)		0.09*	(0.03)
P	-0.07	(0.04)		-0.02	(0.04)
Spouse					
Poor or Fair Physical Health	-0.05	(0.08)	§§	0.27***	(0.08)
Poor or Fair Mental Health	0.01	(0.10)		-0.02	(0.11)
O	0.05	(0.04)		0.03	(0.04)
C	0.05	(0.04)		0.03	(0.04)
E	0.08	(0.04)		0.09*	(0.04)
A	-0.01	(0.04)		-0.08*	(0.04)
N	0.07	(0.04)		0.12***	(0.03)
P	-0.02	(0.04)		-0.12**	(0.04)
Constant	0.13	(0.20)		-0.14	(0.20)
Rho	.23***				

* p<.05, ** p<.01, *** p<.001

§ coefficients different at p< .05; §§ coefficients different at p< .01

Note: Outcome and personality scores standardized within gender

Figure 2. Levels of Neuroticism and Positivity in Couples where Neither Partner Reported Troubles, Only One Reported Troubles, and Both Reported Troubles



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