# Chapter 7
# Changes in Spousal Relationships over the Marital Life Course


**Paul R. Amato and Spencer L. James**

Social scientists have learned a great deal about marriage since the first empirical studies were conducted in the 1930s (Burgess and Cottrell 1939; Terman et al. 1938). We know, for example, about the correlates of marital quality, the predictors of divorce, and the consequences of marital conflict and divorce for health and general wellbeing. Despite many decades of research, however, gaps remain in our understanding of how spousal relationships change over the marital life course. These gaps are due partly to the scarcity of long-term longitudinal studies of married people, especially studies based on nationally representative samples. Although some studies have examined long-term trends in marital happiness, few have focused on other marital dimensions, such as the frequency of shared activities or conflict. Moreover, we know little about how marital trajectories differ between spouses who divorce and those who remain continuously married.

To address these gaps in our understanding, we show how three dimensions of marital relationships—happiness, participation in shared activities, and discord—change over time in a nationally representative (U.S.) sample of married people. We focus on the relationship trajectories of two particular groups: those who remain continuously married and those who divorce. We also consider whether relationship trajectories vary by gender, marriage order, and education. We accomplish these goals using pooled time series analyses (with random and fixed effects models) and 20 years of panel data from the Marital Instability over the Life Course (MIOLC) study. These analyses cast light on several theoretical perspectives on stability and change in marriage.

P. R. Amato (✉)
Department of Sociology, Pennsylvania State University, State College, PA, USA
e-mail: pxa6@psu.edu

S. L. James
School of Family Life, Brigham Young University, Provo, UT, USA



D. F. Alwin et al. (eds.), *Social Networks and the Life Course*, Frontiers in Sociology and Social Research 2, https://doi.org/10.1007/978-3-319-71544-5_7

## Theoretical Perspectives

Three general ways of thinking about changes in spousal relationships appear in the research literature. *Marital stability perspectives* stress the homeostatic nature of spousal relationships. The enduring dynamics perspective (Huston et al. 2001) assumes that spouses have stable traits, such as genetic predispositions, personalities, attachment styles, and relationship skills that affect the quality of their interaction. These factors lead to stable patterns of interaction in the early years of marriage—or even prior to marriage. Because relationship dynamics crystallize early, interpersonal problems typically emerge in the early years of marriage and endure over time. Karney and Bradbury's (1995) vulnerability-stress-adaptation model also emphasizes the stable traits that people bring to relationships, such as a tendency to experience negative affect (neuroticism) or make problematic attributions about a partner's behavior. These factors not only increase the level of discord in relationships, but also impair people's ability to cope with stressful circumstances that arise during marriage. In summary, relationship stability perspectives suggest that (a) most of the risk factors that lead to divorce are present at the start of marriages, and (b) relationship characteristics tends to be stable over many years because the individual and couple traits that shape relationships change slowly, if at all.

Huston and colleagues also outlined two *marital decline perspectives*, based on the idea that most marriages are harmonious during the newlywed stage but deteriorate over time (Huston et al. 2001). The disillusionment perspective suggests that people enter marriage with romanticized and idealized images of their spouses. After the newlywed years, however, people become disillusioned with their marriages as they move beyond romanticized fantasies and adopt more realistic views of their spouses' limitations. As disappointment sets in, feelings of satisfaction and love begin to wane, and feelings of ambivalence and doubt emerge. A related perspective based on the notion of emergent distress assumes that all married couples begin as affectionate and loving partners. During the early years they may even avoid conflict to maintain a positive emotional tone. But as time passes, an accumulation of disagreements, expressions of negative sentiment, and troubling behavior leads to relationship distress. Because conflict arises in all relationships, declines in attraction to one's spouse are normative.

Another marital decline perspective was advanced by Pineo (1961). According to this view, spouses marry at a time when they are most compatible. As the years pass, however, individuals change in random, largely unanticipated ways. These changes lead to incompatibility and a poorer relationship fit. These ideas are consistent with exchange theory (Sabatelli and Shehan 1993), which assumes that spouses "exchange" valued characteristics that each brings to the marriage. Changes in these characteristics over time tend to disrupt the equity of the exchange and lead to unhappiness.

A related decline perspective can be drawn from sociological life course theory (Elder 1998), which assumes that relationships are shaped by the timing and

sequencing of events and the roles that spouses enter and leave during marriage. According to this view, the positive feelings reported by newlyweds tend to decline as couples struggle with the challenges of rearing young children, paying off mortgages, dealing with work-family conflict, caring for aging relatives, and experiencing age-related decrements in health (VanLaningham et al. 2001). In other words, the accumulation of normative but stressful events, obligations, and circumstances creates "wear and tear" on marriages and consumes much of the time that couples might otherwise devote to relationship-strengthening activities.

Although they appear frequently in the research literature, the theoretical models described thus far may be too pessimistic. It is true, as noted earlier, that some individuals possess negative traits that undermine relationships. But other individuals possess positive traits that strengthen relationships, such as honesty, generosity, trust, conscientiousness, good communication skills, the willingness to compromise, and a knack for resolving disagreements peacefully. Correspondingly, some people are able to allocate their time effectively and find a reasonable balance between life course demands and the needs of their marriages. Moreover, all individuals—even if those with difficult personalities—have the capacity to learn, adapt, and grow. These positive traits make it possible to adapt to changing circumstances and deal with the inevitable problems that arise in relationships and in life more generally (Hawkins et al. 2007). According to a *marital resilience perspective,* not all spouses are doomed to see the quality of their relationships erode over time. Although marriages headed for divorce may deteriorate, spouses with resilient relationships can maintain—or even improve on—the generally positive relationship dynamics that characterize the early years of marriage (Canary et al. 2002). From this perspective, spending many years together provides opportunities for couples to experience even deeper levels of appreciation, closeness, and contentment.

## Empirical Evidence

Does previous research provide support for any of the three theoretical models—based on the notions of stability, decline, and resilience—outlined earlier? Although many longitudinal studies of marital quality can be found in the literature, few have lasted longer than 5 years. Moreover, most longitudinal studies have involved only two waves of data and, hence, are unable to detect nonlinear patterns of change. Despite these limitations, a consistent finding in this literature is that marital satisfaction declines over the first few years of marriage (e.g., Kurdek 1999; Lindahl et al. 1998). How marital quality changes after this, and whether couples that eventually divorce begin their marriages with troubled relationships, is less clear.

In an early study, Pineo (1961) reported on 400 married couples first studied in the 1930s and followed up 20 years later. Husbands as well as wives reported general declines in a variety of relationship characteristics between interviews, including satisfaction, love, intimacy, and shared activities. Vaillant and Vaillant (1993) followed 169 male college students and their wives (first studied in the 1930s and

1940s) for 40 years. Among husbands, marital adjustment declined during the first 15 years of marriage then stabilized, whereas among wives, marital adjustment declined continuously. (Wives reported especially large declines in resolving disagreements.) VanLaningham, Johnson, and Amato (2001) used 17 years of national data from the first five waves of the MIOLC study (initiated in 1980) and found that marital happiness declined continuously at all marital durations, with no upturn in the later years of marriage.

More recently, Birditt et al. (2012) followed 320 newlywed couples for 16 years and found a general (average) decline in marital happiness for wives as well as husbands. The authors also used mixture modeling to show that not all spouses followed the same trajectory, however. James (2015) used data from 2604 women in the 1979 National Longitudinal Survey of Youth who reported on their marriages between 1992 and 2010. Reports of happiness and communication declined modestly but continuously, on average, whereas reports of conflict were curvilinear (increasing and then declining after the first decade). James also used mixture modeling to demonstrate heterogeneity in these trajectories.

Taken together, the studies by Pineo (1961), Vaillant and Vaillant (1993), VanLaningham et al. (2001), Birditt et al. (2012), and James (2015) are consistent in showing that spousal relationships tend to become less positive over time. The latter two studies also show, however, that not all couples follow the same pattern of decline. Moreover, no studies have considered how the relationship trajectories of continuously married spouses differ from the relationship trajectories of spouses who end their marriages in divorce.

## Contributions of the Current Investigation

To assess the three general theoretical perspectives outlined earlier, we draw on the MIOLC study. This data set has four advantages for the current inquiry: (1) it is based on a randomly selected national sample of married individuals, (2) it is relatively large with over 2000 cases, (3) it contains multiple-item measures of several relationship dimensions, and (4) it includes six waves of data collected over a 20-year period. A disadvantage is that it was initiated in 1980, which means that the results may not be generalizable to more recent marriage cohorts. Nevertheless, the MIOLC continues to be a useful data set available for understanding long-term changes in marital relationships.

The current study is similar in certain respects to VanLaningham et al. (2001), which also used the MIOLC. The two studies differ in several important respects, however. First, the VanLaningham et al. study was conducted before the final (6th) wave of data (collected in 2000) was available, whereas we use all six waves of data. The additional wave makes it possible to extend the range of marital duration estimates with greater precision. Second, VanLaningham et al. did not examine marital quality trajectories for respondents who divorced—a central focus of the current study. Third, VanLaningham et al. focused only on marital happiness, whereas the

current study includes three conceptually distinct relationship dimensions. Fourth, although VanLaningham et al. provided suggestive evidence that period effects were present in their data, they did not directly test or control for them. The current study, in contrast, includes controls for period effects that can distort estimates of marital duration effects.

To summarize, the current study reveals how three spousal relationship dimensions (happiness, shared activities, and discord) change over the marital life course. A central goal is to consider how relationships change for spouses who either divorce or remain together. Can the troubled relationships of divorced spouses be observed in the initial years of marriage, as the marital stability perspective suggests? Or do these relationships begin happily and then decline abruptly, as the marital decline perspective suggests? What about spouses who remain continuously married? Do they also report declines in relationship quality, as the marital decline perspective suggests? Or do they report consistently positive relationships, or even improvement in relationship quality, as the marital resilience perspective suggests?

In addition to focusing on divorce, we consider whether relationship trajectories vary with gender (husband versus wife), marriage order (first versus higher-order marriages), and education (college versus non-college). Since Jessie Bernard's (1982) discussion of "his" and "her" marriages, gender differences in marriage have been of broad interest to family scholars (Jackson et al. 2014). Marriage order is of interest because, since the rise in divorce rates in the 1960s and 1970s, an increasing percentage of marriages have been remarriages for one or both spouses (Bramlett and Mosher 2002). With respect to education, college and non-college educated spouses differ substantially on a variety of marital behaviors, including age at marriage, having children prior to marriage, and the probability of ending a marriage in divorce (Cherlin 2014). Whether these two groups also differ with respect to relationship trajectories is not clear.

## Method

### *Sample*

Our analysis was based on the 20-year MIOLC study (Booth et al. 2000). The target population consisted of all married individuals in households in the contiguous United States with a telephone, both spouses present, and both spouses 55 years of age or less in 1980. Telephone interviewers used random digit dialing to select a sample of households and a second random procedure to select either the husband or wife for an interview. Seventeen percent of targeted individuals could not be reached after 20 calls. Of those individuals contacted, 78% gave complete interviews. The final sample consisted of 2034 married persons. When compared with U.S. Census data, the sample was representative of married individuals with respect to age, race, household size, home ownership, presence of children, and region of the country, although there was an overrepresentation of women—a common

**Table 7.1** Sample descriptive statistics

| | Mean | Standard deviation | Standard error |
|---|---|---|---|
| Age | 35.58 | 9.16 | 0.23 |
| Duration of marriage in 1980 (years) | 12.84 | 9.19 | 0.23 |
| Gender (1 = wife) | 0.60 | – | 0.01 |
| Marriage order (1 = remarried) | 0.14 | – | 0.01 |
| College graduate (1 = yes) | 0.19 | – | 0.01 |
| Divorced during study (1 = yes) | 0.19 | – | 0.01 |
| NonHispanic white (1 = yes) | 0.88 | – | 0.01 |
| Cohabitation prior to marriage (1 = yes) | 0.17 | – | 0.01 |
| Children during marriage (1 = yes) | 0.72 | – | 0.01 |

Note: Sample statistics are based on the number of cases (N = 1617) rather than the number of observations. Standard deviations are not shown for binary variables

outcome in surveys. The sample was tracked and re-interviewed in 1983, 1988, 1992, 1997, and 2000, with re-interview rates of 78%, 84%, 89%, 88%, and 87%, respectively.

The data set for the current analysis included pooled data from all six waves. Respondents contributed records for each wave in which they were married and participating in the study. An advantage of pooled time series analysis is that it allows cases to contribute all available data, irrespective of attrition (Johnson 1995). Only respondents who participated in two or more waves of data collection were included in the analysis, however. The analytic sample involved 7076 observations (records) from 1617 individuals. Of these individuals, 790 remained married and continued through the final interview in 2000, 313 divorced, 77 experienced the death of a spouse, and the remaining 437 dropped out of the panel. Of those respondents who divorced or experienced the death of a spouse during the study, 89 remarried and reported on their new relationships in two or more waves. We included these observations in the analyses. One advantage of including these remarried cases is that it weakened the correlation between duration of marriage and year of interview.

In 1980 the mean ages of wives and husbands were 35 and 37, respectively. The majority of respondents (88%) were white, and 17% had cohabited with their spouses prior to marriage. The majority of couples (72%) were parents in 1980, although some no longer had children living at home. (See Table 7.1 for a summary of sample descriptive statistics.)

## *Variables*

*Relationship Characteristics* Marital happiness was based on ten items. Sample items included, "How happy are you with the amount of understanding you receive from your spouse?…with the amount of love and affection you receive?…with your sexual relationship?…with your marriage overall?" Responses were scored in the

direction of greater happiness (1 = *not too happy*, 2 = *pretty happy*, 3 = *very happy*), and the mean response served as the scale score. Alpha reliability coefficients ranged from .87 to .88 across waves.

To measure shared activities, respondents were asked how often they engaged in six activities with their spouses: eating dinner, shopping, visiting friends, working on projects around the house, and going out for recreation. Responses were scored in the direction of frequent interaction (1 = *never*, 4 = *almost always*), and the mean response served as the scale score. Alpha reliability coefficients ranged from .64 to .69 across waves.

General relationship discord was a composite based on three sub-scales. To assess marital problems, respondents were asked about the presence of 13 problems in their marriages, including whether they or their spouses get angry easily, have feelings that are easily hurt, are jealous, are critical, avoid talking, or have had extra-marital sex. The total number of reported problems served as the measure. Marital conflict was based on five items, including "In general, how often do you disagree with your spouse?" (1 = *never*, 5 = *very often*), and "How many serious quarrels have you had with your spouse in the last two months?" (0–4 or more). The mean response across the five items served as the scale score. Divorce proneness is the propensity to divorce and includes both a cognitive component (e.g., thinking that one's marriage is in trouble) and a behavioral component (e.g., talking with one's spouse about divorce). The scale included 13-items, such as "Has the thought of divorce or separation ever crossed your mind?" Because the sum of the items was positively skewed, the log (base 10) served as the scale score. The three scales (problems, conflict, and divorce proneness) were equally weighted (using Z scores) and added to produce a measure of general relationship discord. The reliability for the composite was 0.85 across all waves.

*Marital Duration* Marital duration was measured in years and was time-varying in the analysis. In 1980 this variable ranged from 0 to 38 with a mean of 12.8 (S = 9.2). In 2000 (the final survey year) this variable ranged from 20 to 58 with a mean of 33.1 (S = 8.9). The longitudinal data set included 242 spouses who had been married for 2 years or less at the time of the first interview, and 205 spouses who had been married for 40 years or longer at the time of the final interview. We also included a quadratic term (years married squared) to capture nonlinear trends.

*Divorce* As noted earlier, 313 spouses (19%) divorced during the study. Divorce was treated as a time-invariant variable in the analysis because the focus was on spouses who ever divorced, irrespective of when the event occurred.

*Gender* The respondent's gender was included in all analyses (0 = *husband*, 1 = *wife*). The majority of respondents (60%) were female.

*Marriage Order* Marriage order was coded 0 = first marriage for the respondent, 1 = second or higher order marriage for the respondent (14% of respondents were in second or higher-order marriages). In an alternative specification, we scored this

variable 1 if it was a second or higher-order marriage for the respondent *and* the respondent's spouse, but the results were identical to those reported later.

*College Graduate* The respondent's education was coded 0 = not a college graduate, 1 = college graduate (19% of respondents were college graduates). In alternative specifications, we scored this variable 1 if the respondent *and* the respondent's spouse were college graduates, but the results were identical to those reported in the main analysis.

*Periods* Period effects were estimated by including dummy variables for each survey year (1983, 1988, 1992, 1997, and 2000), with 1980 serving as the omitted reference category.

*Attrition* Of all the respondents interviewed in 1980, 53% no longer were participating in the panel by 2000 (including respondents who died). We relied on a variation of Heckman's (1979) two-step method to correct for attrition bias. We relied on logistic regression to model the attrition of respondents from the panel and used the resulting equation to calculate the probability of dropping out of the panel for each case. Attrition was more common among African Americans, relatively young or old spouses, renters, spouses with little education, spouses married for only a few years, and spouses living in the south. This variable was included as a control variable in the random effects models.

## *Analysis*

We estimated the statistical models with the xtreg procedure in Stata. We estimated random and fixed effects models because each has offsetting advantages and disadvantages. Random effects models allowed us to estimate regression coefficients for divorce, gender, marriage order, and college—four of the central variables in our study. Fixed effects models (unlike random effects models) allowed us to control for all unobserved time-invariant variables, including demographic characteristics and stable personality traits that may affect attrition. Fixed effects models also allowed us to control for cohort effects, given that year of birth and age at marriage are fixed. Fixed effects models do not allow for the inclusion of time-invariant variables, however, so we could not use them to estimate regression coefficients for divorce, gender, marriage order, and college. We could, however, model interaction terms between these variables and marital duration, which was sufficient for our purposes. It is common for researchers working with pooled time series data to compare the results of both types of models (e.g., Teachman 2011; Turney and Carlson 2011). To the extent that random and fixed effects models yield comparable findings, confidence in the conclusions is strengthened.

Although a good deal of attrition occurred in the panel study (as noted earlier), missing data among cases participating in each wave was modest and represented

no more than 1% of observations for the variables used in the analysis. For this reason, we relied on listwise deletion to deal with within-wave missing data.

Prior to analysis, the relationship variables (happiness, shared activities, and discord) were transformed to Z scores (mean = 0, standard deviation = 1). Doing so made it easier to assess the magnitude of change over time and to make comparisons across outcomes.

## Results from Random Effects Models

### *Overall Trends*

Table 7.2 shows the equations (unstandardized coefficients) for all three spousal relationship variables. We begin by focusing on the Model 1 results without the interaction terms. For marital happiness, the negative coefficient for years married (−.015) and the positive coefficient for years married squared (.0003) indicated a curvilinear trend. Not surprisingly, spouses who eventually divorced reported lower levels of happiness (−.710 of a standard deviation) than did spouses who remained married. Consistent with many studies, wives reported less happiness than did husbands (−.187 of a standard deviation). The dummy variables for survey year reveal that marital happiness declined during the 1980s and 1990s but rebounded in 2000. Finally, the significant coefficient for attrition (−.495) indicates that spouses with a high probability of dropping out of the sample reported less happiness—a result that supports the usefulness of controlling for attrition bias.

The results for the shared activities were comparable to the results for happiness in some respects. In particular, the negative coefficient for years and the positive coefficient for years squared in Model 1 indicate a curvilinear trend. In addition, spouses who divorced reported fewer activities than did spouses who remained married, and wives reported fewer activities than did husbands. Respondents with a high probability of attrition reported fewer activities than did respondents with a low probability. Finally, the coefficients for survey years reveal that shared activities declined substantially during the years of the study, with an especially large drop in the final year of the study. With respect to discord, the Model 1 equation shows a significant decline over time, and the quadratic term was not significant. Consistent with earlier results, discord was higher among spouses headed for divorce than for spouses who remained together and higher among wives than husbands. The dummy variables for year of survey suggest that discord increased during the 1980s and 1990s.

Figure 7.1 shows the overall trajectories of marital happiness, shared activities, and discord, based on the Model 1 equations with all covariates set at their means. Note that happiness declined during the first 20 years of marriage and then stabilized. The amount of decline was modest, however, and represented only about one-fifth of a standard deviation. Shared activities also declined during the first

**Table 7.2** Random effects regression of spousal relationship characteristics on marital duration

| | Marital happiness | | Shared activities | | Marital discord | |
|---|---|---|---|---|---|---|
| | Model 1 | Model 2 | Model 1 | Model 2 | Model 1 | Model 2 |
| Years married | −.015*** | −.006 | −.027*** | −.021*** | −.013*** | −.021*** |
| | (.004) | (.004) | (.004) | (.004) | (.004) | (.004) |
| Years married$^2$ | .0003*** | .0002* | .001*** | .001*** | −.0001 | −.0001 |
| | (.0001) | (.0001) | (.0001) | (.0001) | (.0001) | (.0001) |
| Divorce | −.710*** | −.116 | −.539*** | −.182 | .740*** | .194* |
| | (.057) | (.100) | (.054) | (.100) | (.058) | (.098) |
| Divorce × years | – | −.048*** | – | −.035** | – | .054*** |
| | | (.012) | | (.013) | | (.011) |
| Divorce × years$^2$ | – | −.0001 | – | .0003 | – | −.0004 |
| | | (.0004) | | (.0004) | | (.0004) |
| Female | −.187*** | −.196*** | −.129** | −.134** | .149** | .157*** |
| | (.044) | (.044) | (.041) | (.041) | (.045) | (.045) |
| Remarried | −.043 | −.070 | −.003 | −.017 | .010 | .034 |
| | (.063) | (.063) | (.059) | (.059) | (.064) | (.065) |
| College | .044 | .034 | .029 | −.034 | −.006 | .002 |
| | (.057) | (.056) | (.052) | (.052) | (.058) | (.058) |
| 1980 | – | – | – | – | – | – |
| 1983 | −.187*** | −.184*** | −.166*** | −.163*** | .075** | .072** |
| | (.025) | (.024) | (.026) | (.026) | (.023) | (.023) |
| 1988 | −.253*** | −.257*** | −.367*** | −.367*** | .150*** | .152*** |
| | (.032) | (.032) | (.032) | (.032) | (.031) | (.031) |
| 1992 | −.267*** | −.291*** | −.384*** | −.393*** | .239*** | .256*** |
| | (.039) | (.039) | (.039) | (.039) | (.039) | (.039) |
| 1997 | −.244*** | −.291*** | −.374*** | −.395*** | .143** | .181*** |
| | (.049) | (.049) | (.048) | (.048) | (.049) | (.049) |
| 2000 | .016 | −.051 | −1.160*** | −1.190*** | −.108 | .033 |
| | (.056) | (.057) | (.055) | (.055) | (.056) | (.057) |
| Attrition | −.495* | −.636** | −.523* | −.595** | .453 | .575* |
| | (.233) | (.232) | (.218) | (.218) | (.238) | (.238) |
| Constant | .463*** | .343*** | .605 | .539*** | .083 | .182** |
| | (.058) | (.059) | (.056) | (.057) | (.059) | (.060 |
| R squared | .056*** | .101*** | .105*** | .107*** | .110*** | .110*** |

Note: Table values are unstandardized regression coefficients with standard errors in parentheses. Sample sizes are 1616–1618 cases (6618–6705 observations), depending on the equation
* p < .05. ** p < .01. *** p < .001 (two-tailed)

20 years of marriage (about one fourth of a standard deviation). After 25 years of marriage, however, shared activities began to increase, and by year 40 this variable was about as high as it had been in the first year of marriage. Finally, discord between spouses declined continuously and represented a drop of nearly two thirds of a standard deviation over a 40-year period.

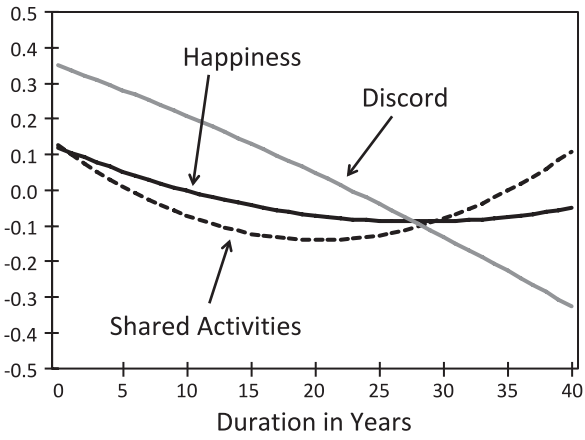


**Fig. 7.1** Marital happiness, shared activities, and discord by duration of marriage in years (random effects models)

## *Trends for Spouses Who Divorced or Remained Married*

The Model 2 equations in Table 7.2 show the results of interacting divorce and marital duration. For marital happiness, the divorce × years married coefficient was negative and statistically significant (−.048). This result indicates that marital happiness declined more steeply over time for spouses who divorced than for spouses who remained together. The coefficient for divorce in Model 2 was low and not significant (−.116). This result indicates that the gap in marital happiness between spouses who either divorced or remained together was modest in the first year of marriage (that is, at year = 0) but became larger in subsequent years.

With respect to shared activities, the divorce × years married interaction term in Model 2 was negative and significant. This result indicates that participation in shared activities declined more steeply for spouses who divorced than for spouses who remained together. Moreover, the coefficient for divorce in Model 2 was low and not significant, which indicates that the gap between spouses who either divorced or remained together was small in the first year of marriage. With respect to discord, the divorce × years married interaction term also was significant and positive. This result indicates that discord increased more steeply over time for spouses who divorced than for spouses who remained together. Contrary to the results for happiness and shared activities, however, the *b* coefficient for divorce was significant (.194), which indicates that even in the first year of marriage, spouses who later divorced reported more conflict than did spouses who remained together.

Figure 7.2 shows the estimated trajectories for spouses who divorced and remained married, based on the coefficients in Model 2 (Table 7.2) with all covariates set at their means. In the first year of marriage, spouses who later divorced reported slightly (but not significantly) less happiness than did spouses who remained together. Spouses headed for divorce revealed a sharp decline in happiness in subsequent years, however, dropping about one standard deviation within 20 years—assuming that they stayed married for that long. Spouses who did not divorce

exhibited a different trajectory, with an almost imperceptible decline in happiness during the first two decades of marriage (5% of a standard deviation) followed by a small increase (10% of a standard deviation) during the next two decades.

Trajectories of shared activities for divorced and continuously married spouses also are shown in Fig. 7.2. Spouses who divorced scored slightly lower at the beginning of the marriage than did spouses who remained together. Shared activities in the divorced group declined two thirds of a standard deviation during the first two decades of marriage. The mean for the continuously married group also declined, albeit more gradually, and bottomed out after 20 years, with an overall decline of about one fifth of a standard deviation. The frequency of shared activities increased again in subsequent years and by 36 years had returned to where it started at the beginning of the marriage.

Finally, spouses who divorced reported more discord (conflict, problems, and divorce proneness) in the first year of marriage than did spouses who remained together. Moreover, discord increased over time for spouses headed for divorce, whereas it declined over time for spouses who remained together. The decline in discord for continuously married spouses represented 85% of a standard deviation over 40 years—a large change.

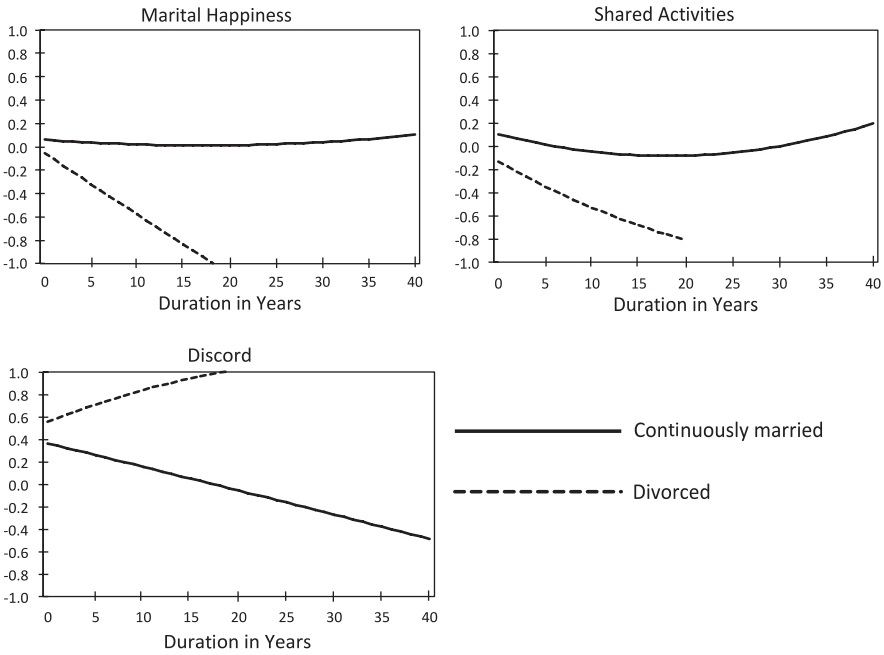


**Fig. 7.2** Spousal relationships by divorce and duration of marriage in years (random effects models)

### *Gender Differences*

In subsequent models (not shown), we examined differences between husbands and wives by including interaction terms between gender and years married, years married squared, and divorce. No two- or three-way interaction terms were significant for the frequency of shared activities. For happiness and discord, however, the three-way interaction terms (gender × years married × divorce) were statistically significant (all $p < .05$). The corresponding three-way interaction for shared activities only approached significance ($p = .09$).

Figure 7.3 shows the marital happiness trajectories separately for husbands and wives. Husbands and wives headed for divorce reported declines in marital happiness, but the decline was steeper for wives than for husbands. Among wives who remained continuously married, marital happiness changed little. Among husbands who remained continuously married, marital happiness increased modestly (about one-tenth of a standard deviation) but significantly. These results are consistent with prior research showing that wives tend to be report less marital happiness and more relationship problems than do husbands (Amato et al. 2007; Jackson et al. 2014). The current results indicate, however, that the gap between husbands and wives grew larger over time, irrespective of whether couples stayed together or divorced.

Although the three-way interaction between gender, divorce, and the number of years married was only marginally significant for shared activities ($p = .09$), we include a figure for this outcome for the sake of completeness. As was the case for marital happiness, reports of shared activities declined more steeply among wives headed for divorce than among husbands. The trends for husbands and wives who remained together were essentially identical.

Figure 7.3 also illustrates gender differences in the trajectories of discord. Among wives in marriages that ended in divorce, reports of discord started at a relatively high level in the first year of marriage and increased substantially over time. Among husbands in marriages that ended in divorce, in contrast, reports of discord were relatively high in the first year of marriage and changed little after that. As with marital happiness, wives headed for divorce held especially dismal views of their relationships as the years passed. Among marriages that remained intact, wives reported more discord early in the marriage than did husbands. Over time, however, both wives and husbands reported less discord, with the two trajectories converging after 30 years of marriage.

### *Results for Other Variables*

Spouses in first marriages did not differ from spouses in second or higher-order marriages with respect to happiness, shared activities, or discord. Moreover, marriage order did not interact with divorce or gender with respect to any relationship outcomes. Although second (and higher-order marriages) are more likely than first marriages to end in divorce (Bramlett and Mosher 2002), marriage order does not

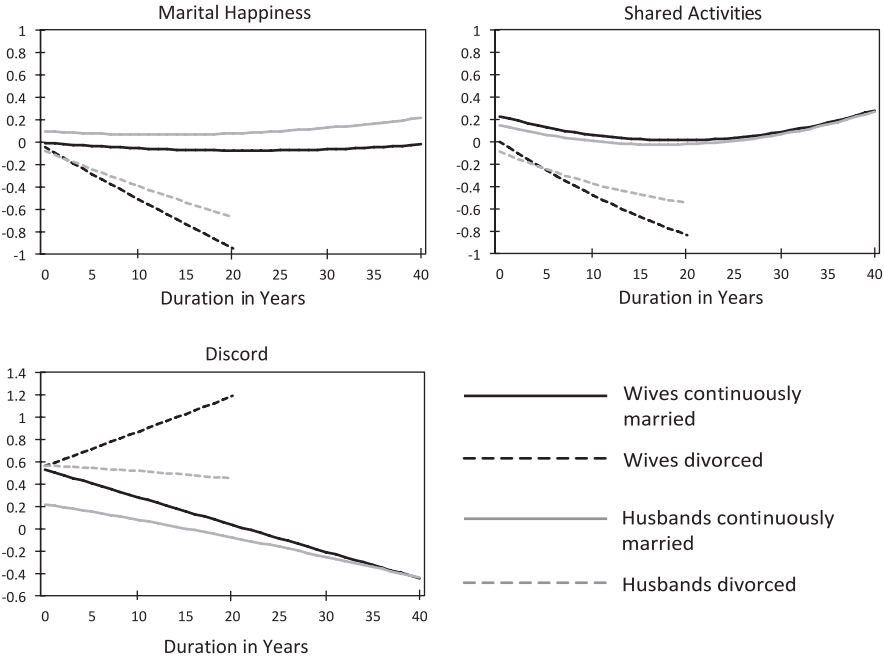


**Fig. 7.3** Spousal relationships for divorced and continuously married wives and husbands (random effects models)

appear to be related to how spouses evaluate their marriages. These results are consistent with several prior studies (e.g., Amato et al. 2007; White and Booth 1985). Presumably, higher-order marriages often end for reasons other than poor relationship quality (such as holding positive attitudes toward divorce, having low commitment to the relationship, or wishing to escape from stepchildren).

Spouses with college degrees did not differ from spouses without college degrees on any relationship outcome. Moreover, education did not interact with divorce or gender in any statistical model. Although divorce rates tend to be lower for spouses with college degrees (Cherlin 2014), having a college degree does not appear to be related to reports of relationship quality—at least in the marriage cohort considered in the current study.

The dummy variables reflecting year of study consistently produced significant results. These period effects are shown in Fig. 7.4, with all other variables in the models set at their means. Happiness and discord reflected one another, with happiness showing declines followed by an increase, and discord showing increases followed by a decline. In contrast, participation in shared activities declined continuously during the years of the study and dropped especially sharply between 1997 and 2000.

It is difficult to determine the cause of period effects like these. Economic recessions in 1980–82 and 1991–91 were associated with increases in unemployment, declines in the real earnings of men, and more family poverty. Starting in the mid

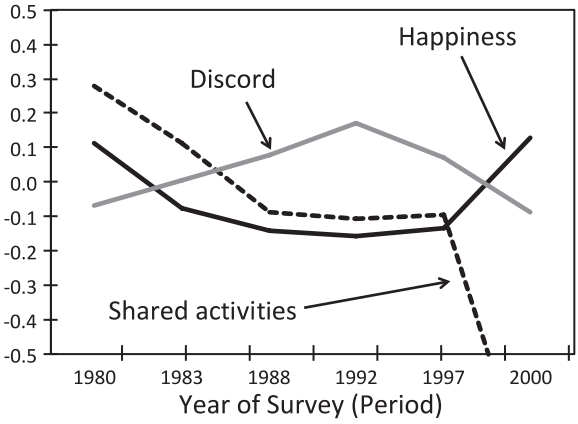


**Fig. 7.4** Spousal relationship dimensions by year of survey (random effects models)

1990s and continuing through 2000, however, the U.S. economy expanded, leading to increases in employment and wages and declines in economic hardship (Gould et al. 2013). These trends may have had negative (and later, positive) effects on marital relationships. Wives' employment expanded during the 1980s and 1990s, which led to greater work-family conflict and tension over gender role (Amato et al. 2007). Moreover, the high rate of female employment in 2000 may have suppressed the frequency of shared activities in that year to an unusually low level. In addition, many observers have argued that American culture became more individualistic after the 1960s (Amato et al. 2007; Cherlin 2004)—another trend that may have decreased the frequency of interaction between spouses. Any of these factors, or a combination of them, could have been responsible for the changes shown in Fig. 7.4.

## *Fixed Effects Models*

The results of fixed effects models are shown in Table 7.3. These equations should be compared with the Model 2 equations in Table 7.2. Divorce status, gender, marriage order, college attendance, and the attrition variable are not in the fixed effects equations because they are time invariant. Although it was not possible to include divorce, it was possible to include interaction terms for years married × divorce (and the other time invariant variables).

The equations in Table 7.3 are similar in many respects to those in Table 7.2. The interactions between divorce and years married were significant and in the expected direction for all three outcomes. A disadvantage of fixed effects models is that they cannot show difference between groups of spouses in the first year of marriage. Because no between-person variance is modeled (only within-person variance) everyone essentially starts in the "same place." Nevertheless, consistent with the results from the random effects models, the fixed effects models reveal that all aspects of relationship quality deteriorated relatively quickly among spouses headed

**Table 7.3** Fixed effects regression of spousal relationship characteristics on marital duration

| | Marital happiness | Shared activities | Discord |
|---|---|---|---|
| Years married | −.008 | −.042*** | .006 |
| | (.006) | (.007) | (.006) |
| Years married$^2$ | .0002* | .0005*** | −.0001 |
| | (.0001) | (.0001) | (.0001) |
| Divorce years | −.072*** | −.040** | .055*** |
| | (.013) | (.014) | (.013) |
| Divorce × years$^2$ | .0002 | .0001 | −.0002 |
| | (.0004) | (.0004) | (.0004) |
| 1980 | – | – | – |
| 1983 | −.178*** | −.102*** | .064 |
| | (.027) | (.030) | (.026) |
| 1988 | −.237*** | −.192*** | −.046 |
| | (.047) | (.050) | (.044) |
| 1992 | −.280*** | −.138 | −.032 |
| | (.066) | (.071) | (.062) |
| 1997 | −.274** | −.046 | −.224** |
| | (.091) | (.098) | (.088) |
| 2000 | −.048 | −.689*** | −.426*** |
| | (.107) | (.115) | (.101) |
| Constant | .295*** | .733*** | −.066 |
| | (.070) | (.076) | (.067) |
| R squared | .081*** | .180*** | .079*** |

Note: Table values are unstandardized regression coefficients with standard errors in parentheses. Sample sizes are 1616–1618 cases (6618–6705 observations), depending on the equation
* p < .05. ** p < .01. *** p < .001 (two-tailed)

for divorce. Among spouses who did not divorce, marital happiness declined slightly and then increased again after about 20 years of marriage—a result directly comparable to the random effects model. Shared activities declined by about three fourths of a standard deviation and then stabilized after 30 years of marriage among spouses in continuously intact marriages. This result differs from the random effects models, which suggested that shared activities increased again after 20 years of marriage. Finally, the level of discord among spouses who remained married increased slightly, but this trend was not statistically significant (see Table 7.3). This contrasts with the random effects result, which suggested that discord declined continuously.

## General Discussion

The current investigation considered the evidence for three theoretical perspectives on spousal relationships over the life course. Most studies on this topic have been limited by relatively short time frames of 5 years or less (e.g., Huston et al. 2001;

Kurdek 1999; Lavner and Bradbury 2010). Other studies with longer time frames have involved samples of limited size and geographical range, often without the benefit of probability sampling (e.g., Birditt et al. (2012); Pineo 1961; Vaillant and Vaillant 1993). The current study, in contrast, was based on a large, randomly selected national sample with six waves of data collected over a 20-year period.

Relationship stability perspectives assume that relationship characteristics crystallize quickly and remain constant over time. This continuity reflects the role of stable personal traits such as personalities, genetic predispositions, attachment styles, and social skills, in shaping relationship outcomes (Karney and Bradbury 1995; Huston et al. 2001). If this perspective is correct, then differences between spouses who divorce or remain together should be apparent from the very beginning of the marriage. Contrary to this assumption, however, our random effects models (Table 7.2 and Fig. 7.2) indicated that the differences between spouses who either divorced or stayed married were modest in the first year of marriage. Gaps between these two groups widened considerably, however, as the first decade of marriage unfolded. Our analysis, therefore, provided limited support for the relationship stability perspective.

Relationship decline perspectives assume that marital quality gradually deteriorates for most spouses. This deterioration occurs for several reasons: Spouses become disillusioned as they learn more about one another (Huston et al. 2001), conflict inevitably emerges and takes its toll on relationships (Huston et al. 2001), spouses become increasingly different from one another over time and drift apart (Pineo 1961), and stressful events and social demands accumulate over the life course (VanLaningham et al. 2001). Our random and fixed effects results indicate that this perspective accurately describes the trajectories of spouses who end their marriages in divorce, but it does not apply to spouses who remain married. Marital happiness does not decline, on average, among spouses in stable marriages. Indeed, our results suggest that marital happiness increases slightly in the later years of marriage, especially for husbands. We also find no evidence that relationship discord increases over time for spouses who avoid divorce. Instead, discord either declines (random effects model) or remains constant (fixed effects model). It is true that the frequency of shared activities declines in long-term marriages, although interaction either stabilizes (fixed effects model) or increases again in the later years of marriage (random effects model). This decline in shared activities may occur because spouses in long-term marriages develop new interests or friendships outside of the relationship. Even if one accepts the fixed effects result, however, spouses in long-term marriages appear to be as happy as they had been in the early years of marriage and experience no more conflict.

Our results suggest that the pessimistic conclusions of previous studies may have been due to three limitations: (1) not having longitudinal data of sufficient duration to capture improvements in marital quality in the later years of marriage, (2) failing to separate couples headed for divorce from couples who remain married, thus depressing aggregate levels of relationship quality in the pooled sample, and (3) failing to control for period effects that can shift mean levels of relationship quality downward during particular historical periods. Contrary to previous work, the

current study offers a more optimistic view of how marriages change, at least among spouses who avoid divorce. Our results provide the strongest support for the marital resilience model. Although many marriages end unhappily, a substantial number of spouses are able to maintain satisfying and cohesive marital bonds for many decades.

This paper is not without limitations. First, although the MIOLC is a nationally representative sample of married Americans 55 or younger, these data were originally collected in 1980, and it is possible that more recent marriage cohorts display different patterns of change over time. Second, as is typical of longitudinal studies, the data set suffered from a significant degree of attrition. Although we attempted to correct for attrition bias, this is always a source of concern in longitudinal research. Third, although our total sample included 1617 cases, our estimates of how trajectories began and concluded were based on smaller subsamples. In particular, our estimates of marital quality in the first 2 years of marriage were based on only 242 individuals and 56 divorces. Fourth, although our fixed effects analyses controlled for cohort differences in mean levels of marital quality, our analysis assumed no cohort differences in how marital quality changes over time. Cohort × duration interactions could cause some of our estimates to be misleading. Given the difficulty of disentangling marital duration, period, and cohort effects, we do not test this assumption here. Finally, we only had data from one spouse in each marriage, so we cannot see how changes in one spouse's reports are related to changes in the other spouse's reports.

In the present study, different trajectories were estimated from known groups based on divorce and gender. Mixture modeling—an increasingly common method in the social sciences—makes it possible to estimate trajectories when groups are unknown, and a few recent studies have demonstrated that this method can be applied usefully to study marital relationships (Anderson et al. 2010; Birditt et al. 2012; Kamp Dush et al. 2008; Kamp Dush and Taylor 2012; Lavner and Bradbury 2010). Although more work along these lines could be done with the MIOLC, new sources of long-term data on marriage will become available as ongoing longitudinal studies, such as the National Longitudinal Surveys of Youth (NLSY1979 and NLSY1997), continue into the future. Ultimately, however, a better understanding of how relationships change in more recent marriage cohorts will require the collection of new longitudinal data—an expensive and long-term commitment on the part of researchers, although one that seems worthwhile.

Trajectories of marital quality unfold within the context of many life course events and transitions, such as shifts into and out of employment, having children, the departure of children from the household, and obligations to aging parents. Although the current study documented how marital quality changes over time, we did not focus specifically on how trajectories of marital quality are related to other life course phenomena. Future research could make these linkages more explicit.

The current study was able to examine an unusually wide span of the marital life course. Although divorce is common these days, about half of all marriages last a lifetime, and the long-term outlook for most of these marriages is upbeat, with happiness and interaction remaining high and discord declining. This optimistic perspective is not sufficiently acknowledged or appreciated in the social science

literature on marriage, which has tended to assume that relationship quality declines continuously for the majority of couples. Our theoretical understanding may have been unduly influenced by the many studies of the early years of marriage—studies that include many couples that will divorce *after* the study is completed. Incorporating insights from the study of long-term, stable marriages may be a useful corrective to this literature.

## References

Amato, P. R., Booth, A., Johnson, D. R., & Rogers, S. J. (2007). *Alone together: How marriage in America is changing*. Cambridge, MA: Harvard University Press.

Anderson, J. R., Van Ryzin, M. J., & Doherty, W. J. (2010). Developmental trajectories of marital happiness in continuously married indivdiuals: A group-based modeling approach. *Journal of Family Psychology, 24*, 587–596.

Bernard, J. (1982). *The future of marriage*. New Haven: Yale University Press.

Birditt, K. S., Hope, S., Brown, E., & Orbuch, T. L. (2012). Developmental trajectories of marital happiness over 16 years. *Research in Human Development, 9*, 126–144.

Booth, A., Johnson, D. R., Amato, P. R., & Rogers, S. J. (2000). *Marital instability over the life course: A six-wave panel study*. Ann Arbor: Inter-University Consortium for Political and Social Research.

Bramlett, M. D., & Mosher, W. D. (2002). *Cohabitation, marriage, divorce, and remarriage in the United States*, *Series 23, Number 22*. Washington, DC: National Center for Health Statistics.

Burgess, E. W., & Cottrell, L. S. (1939). *Predicting success or failure in marriage*. New York: Prentice-Hall.

Canary, D. J., Stafford, L., & Semic, B. A. (2002). A panel study of the associations between maintenance strategies and relational characteristics. *Journal of Marriage and Family, 64*, 395–406.

Cherlin, A. J. (2014). *Labor's love lost: The rise and fall of the working-class family in America*. New York: Russell Sage Foundation.

Elder, G. H. (1998). The life course as developmental theory. *Child Development, 69*, 1–12.

Gould, E., Mishel, L., & Shierholz, H. (2013). *Already more than a lost decade: Income and poverty trends continue to paint a bleak picture*. Economic Policy Institute. http://www.epi.org/publication/lost-decade-income-poverty-trends-continue/ Accessed 18 July 2016.

Hawkins, A. J., Fowers, B. J., Carroll, J. S., & Yang, C. (2007). Conceptualizing and measuring marital virtues. In S. L. Hofferth & L. M. Casper (Eds.), *Handbook of measurement issues in family research* (pp. 67–83). Mahweh: Lawrence Erlbaum.

Heckman, J. (1979). Sample selection bias as a specification error. *Econometrica, 47*, 153–161.

Huston, T. L., Caughlin, J. P., Houts, R. M., Smith, S. E., & George, L. J. (2001). The connubial crucible: Newlywed years as predictors of marital delight, distress, and divorce. *Journal of Personality and Social Psychology, 80*, 237–252.

Jackson, J. B., Miller, R. B., Oka, M., & Henry, R. G. (2014). Gender differences in marital satisfaction: A meta-analysis. *Journal of Marriage and Family, 76*, 105–129.

Johnson, D. (1995). Alternative methods for the quantitative analysis of panel data in family research: Pooled time-series models. *Journal of Marriage and Family, 57*, 1065–1077.

Kamp Dush, C. M., & Taylor, M. G. (2012). Trajectories of marital conflict across the life course: Predictors and interactions with marital happiness trajectories. *Journal of Family Issues, 33*, 341–368.

Kamp Dush, C. M., Taylor, M. G., & Kroeger, R. A. (2008). Marital happiness and psychological well-being across the life course. *Family Relations, 57*, 211–226.

Karney, B. R., & Bradbury, T. N. (1995). The longitudinal course of marital quality and stability: A review of theory, method, and research. *Psychological Bulletin, 118*, 3–34.
Kurdek, L. (1999). The nature and predictors of the trajectory of change in marital quality for husbands and wives over the first 10 years of marriage. *Developmental Psychology, 35*, 1283–1296.
Lavner, J. A., & Bradbury, T. N. (2010). Patterns of change in marital satisfaction over the newlywed years. *Journal of Marriage and Family, 72*, 1171–1118.
Lindahl, K., Clements, M., & Markman, H. (1998). The development of marriage: A 9-year perspective. In T. N. Bradbury (Ed.), *The developmental course of marital dysfunction*. Cambridge, MA: Cambridge University Press.
Pineo, P. C. (1961). Disenchantment in the later years of marriage. *Marriage and Family Living, 23*, 3–11.
Sabatelli, R. M., & Shehan, C. L. (1993). Exchange and resource theories. In P. G. Boss, W. J. Doherty, R. LaRossa, W. R. Schumm, & S. K. Steinmetz (Eds.), *Sourcebook of family theories and methods: A contextualapproach* (pp. 385–411). New York: Plenum.
Spencer, J. L. (2015). Variation in marital quality in a national sample of divorced women. *Social Science Research, 49*, 16–30.
Teachman, J. (2011). Modeling repeateable events using discrete-time data: Predicting marital dissolution. *Journal of Marriage and Family, 73*, 525–540.
Terman, L. M., Buttenwieser, P., Ferguson, L. W., Johnson, W. B., & Wilson, D. P. (1938). *Psychological factors in marital happiness*. New York: McGraw-Hill.
Turney, K., & Carlson, M. J. (2011). Multipartnered fertility and depression among fragile families. *Journal of Marriage and Family, 73*, 570–587.
Vaillant, C. O., & Vaillant, G. E. (1993). Is the U-curve of marital satisfaction an illusion? A 40-year study of marriage. *Journal of Marriage and the Family, 55*, 230–239.
VanLaningham, J., Johnson, D. R., & Amato, P. R. (2001). Marital happiness, marital duration, and the U-shaped curve: Evidence from a five-wave panel study. *Social Forces, 78*, 1313–1341.
White, L. K., & Booth, A. (1985). The quality and stability of remarriages: The role of stepchildren. *American Sociological Review, 50*, 689–698.

**Paul R. Amato** is the Arnold and Bette Hoffman Emeritus Professor of Family Sociology and Demography at Pennsylvania State University. His research intrests include the causes and consequences of separation and divorce, marriage and marital quality, parent-child relationships, psychological distress and well-being over the life course.

**Spencer L. James** is an Assistant Professor in the School of Family Life, Brigham Young University. His research focuses on marriage and the family.