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ABSTRACT

This study used meta-analysis to explore the magnitude and direction of the linkage between marital and parent-child relations. The study also assessed variables that might moderate this association or provide insight regarding possible mechanisms responsible for such an association. A search of electronic databases provided 51 studies, including dissertations, for analysis. The analysis examined 12 moderator variables: (1) the operational definition of marital quality; (2) the operational definition of parent-child relationship; (3) parent gender; (4) child gender; (5) parent/child gender; (6) method of assessment; (7) timing of measurement; (8) birth order; (9) developmental stage of the family life cycle; (10) child's versus adult's perspective; (11) family stress level; and (12) publication status. Meta-analysis revealed an overall positive relationship between the quality of marital and parent-child relationships. Overt marital conflict was more strongly related to the quality of the parent-child relationship than was marital satisfaction. The father-daughter relationship was more strongly associated with the marital relationship than were mother-daughter or mother-son relationships. Birth order was the only variable which did not moderate the association between marriage and parenting. (MM)

The Linkage between Marital Quality and the Parent-Child Relationship

A Meta-Analysis

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It is widely believed that a linkage, crucial to the understanding of child behavior, exists between the marital relationship and the parent-child relationship (Belsky, 1981). For example, it is hypothesized that marital disharmony leads to child adjustment problems through its association with the parent-child relationship (Grych & Fincham, 1990) and that poor peer relationships in childhood are related both to parents' low marital quality and to negative parent-child interactions (Gottman & Katz, 1989).

Two alternative explanations for how marital quality might affect the parent-child relationship have been proposed (Easterbrooks & Emde, 1988; Engfer, 1988). The "spill-over" model posits a positive association between marital quality and the parent-child relationship. This model suggests that parents who are happily married will be more available and responsive to their children, leading to a more positive parent-child relationship, while parents who are unhappily married will be more irritable and emotionally drained and less able to attend to their children, producing a more negative parent-child relationship. The alternative model, the "compensatory" model predicts a negative correlation between quality of marriage and quality of parent-child relationships. According to this hypothesis, a stressful marriage increases parents' attention to the child, perhaps as compensation for the lack of affection or satisfaction in the marital relationship.

Despite the significance attributed to the linkage between the marital and parent-child relationships, empirical evidence has been inconsistent (Grych & Fincham, 1990). While some researchers report that satisfaction and support in the marital relationship are

associated with a positive parent-child relationship, other researchers find evidence of a compensatory process with better or more involved parenting occurring in less satisfied marriages, and still other researchers fail to find any association between marriage and parenting. A number of variables have been proposed to explain these contradictory results. For example, operational definitions of marital quality and the parent-child relationship vary. The current study uses meta-analysis to explore the magnitude and direction of the linkage between marital and parent-child relations as well as to assess variables that might either moderate this association (e.g., parent or child gender, child's age) or provide insight regarding possible mechanisms responsible for such an association (e.g., between parent consistency, harsh discipline).

Method

A computer-based literature search of PsycLit, ERIC, and Social SciSearch was conducted. The reference lists of studies included in the meta-analysis also were examined for relevant studies.

Twelve moderator variables were included in the meta-analysis: operational definition of marital quality; operational definition of parent-child relationship; parent gender; child gender; parent/child gender; method of assessment; timing of measurement; birth order; developmental stage of family life cycle; child's versus adult's perspective; family stress level; and publication status. The two authors independently coded all of the studies included in the meta-analysis. While kappas have not yet been

calculated, percent agreement is over 98 percent. All discrepancies were discussed and resolved.

Computation of effect sizes was performed using D-STAT (Johnson, 1989). Results from individual reports were converted into a standardized effect size (d). This statistic represents the magnitude of an effect and can be derived from means and standard deviations, t-values, F-values, r-values, chi-square values, proportions and frequencies, and significance levels (p-values).

The meta-analysis is based on 51 studies, including dissertations. These studies represent a total sample of 1628 boys, 2406 girls, and 2988 children whose gender was not specified. As some studies report separate effect sizes for the different moderator variables, studies could contribute more than one study to the analysis. For example, the same study could report correlations between marital satisfaction and global quality of the parent child relationship as well as report correlations between marital satisfaction and between-parent consistency. As a result, studies yielded a different number of effects: 16 studies yielded only one effect size, 15 studies yielded two effect sizes, four studies yielded three effect sizes, four studies yielded four effect sizes, one study yielded five effect sizes, five studies yielded six effect sizes, four studies yielded eight effect sizes, one study yielded ten effect sizes, and one study yielded 32 effect sizes. Thus, a total of 183 effect sizes, representing 51 separate studies, were computed.

Results

Mean Effect Size

MEAN EFFECT SIZE FOR THE ASSOCIATION BETWEEN MARITAL AND PARENT-CHILD RELATIONS

d	95% CI	r	p	Dev.	Homo.
+0.4462	+0.42 / +0.47	+.2178	.0000	0.357	-4.985

k = 183 (51)

Q = 903.86, df = 182, p < .0001.

Effect sizes ranged from -0.52 to +2.30.

Effect sizes ranged from -0.52 to +2.30. The weighted mean effect size was +.45 with a 95% confidence interval of +0.42 to +0.47. Thus, an overall positive relationship between marital and parent-child relationship quality is indicated. While these results do not imply a causal explanation, they do support the "spillover hypothesis", the idea that a positive marital relationship spills over to the parent-child relationship, versus the alternative hypothesis of a compensatory process.

Cohen (1977) provides us with some standard with which to judge effect sizes: An effect size of .20 is small, .50 is medium, and .80 is large. Thus, the current effect size

of .45 indicates a moderate association between marital and parent-child relationship quality.

Homogeneity

The homogeneity statistic Q indicates whether the weighted effect sizes are sufficiently different from each other to reject the null hypothesis that they are drawn from a common population.

In this meta-analysis, Q was 903.9 (df = 182), $p < .0001$, and the hypothesis that the effect sizes are homogeneous was rejected. Thus, although there is an overall positive relationship between marital and parent-child relationship quality, we cannot be assured that any variability in effect sizes (which, as mentioned earlier, ranges from -.52 to +2.30) is due to sampling error. Rather, variability may be due to other variables that moderate the relationship between marital and parent-child relationship quality. Therefore, categorical model testing was used to explore whether potential moderator variables account for variation in the magnitude of effect sizes.

Categorical model testing

Categorical model testing, following Hedges and Olkin's (1985) statistical procedures, provides a between-classes effect (analogous to a main effect in an analysis of variance) and a test of the homogeneity of the effect sizes within each moderator variable category. (The terms class and category are used interchangeably.) This between-classes effect is estimated by Q_B, which has an approximate chi-square distribution with p-1 degrees of freedom, where p is the number of classes. The homogeneity of the effect sizes within each class, wi, is estimated by Q_{Wi} which has an

approximate chi-square distribution with m-1 degrees of freedom, where m is the number of effect sizes in the dimension.

As noted above, twelve potential moderators were examined in this study; they were selected to address theoretical and methodological considerations. The current report focuses on those moderator variables with the most substantive interest.

Dimensions of Marital Quality

Studies examining the linkage between the quality of the marriage and the quality of the parent-child relationship differ in how they define and measure the construct "quality of marriage" (Goldberg & Easterbrooks, 1984). Typically studies examine either global marital satisfaction or marital conflict.

CATEGORICAL MODEL TESTING: DIMENSIONS OF MARITAL QUALITY

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_W)
MARITAL QUALITY	18.48***				
SATISFACTION		132 (43)	+0.42 B	+.21	583.66***
OVERT CONFLICT		49 (12)	+0.54 A	+.26	300.92***
COALITIONS		2 (1)	+0.89	+.41	.80
OVERALL:		183	+0.45	+.22	903.86***

*** $p \leq .001$; A differs significantly from B

The between-class effect, the Q_B statistic, is significant (18.48) indicating that the dimension of marital quality examined has a significant moderating effect on the magnitude of the association between marital and parent-child relations.

When a categorical model with more than two classes showed a significant between-class effect, contrasts were computed between the mean weighted effect sizes for these classes. These tests, which are analogous to contrasts in the ANOVA procedure, are approximated by a chi-square distribution with p-1 degrees of freedom for post hoc tests and one degree of freedom for a priori tests, where p is the number of dimensions. Contrasts were conducted only between classes with a sample size of three or more independent studies.

As this table shows, overt marital conflict is more strongly related to the quality of the parent-child relationship than is marital satisfaction. (d is .54 for overt marital conflict and .42 for marital satisfaction. K indicates the number of effects for each variable and the number in parentheses is the number of independent studies. The r statistic represents the correlation between marital quality and the parent child relationship when assessing the relevant dimension of marital quality. And you can see that neither marital satisfaction or overt conflict is homogeneous.)

In his 1982 review, Bob Emery hypothesized that marital conflict was more salient to children's adjustment than overall measures of marital discord and distress (Emery, 1982). It is believed that disrupted parenting is one of the mechanisms whereby marital conflict affects children's adjustment. The current results support that hypothesis with

marital conflict more strongly associated with the parent-child relationship than is marital satisfaction.

Parent-Child Relationship Quality

We also examined different dimensions of parent-child quality.

Global quality refers to all studies that assess a dimension of the parent-child relationship or parent-child interaction that could be categorized as reflecting either a positive or negative dimension of the relationship, such as affection or attachment, and could not be categorized under any of the other five categories.

Satisfaction includes studies that assess satisfaction with parenting as an index of parent-child relationship quality.

We examined both within parent and between parent consistency as dimensions that might be associated with marital quality.

Overinvolvement refers to studies that assessed parental encouragement of emotional dependency or the child's involvement in marital conflict.

Discipline includes studies that assess harshness of discipline and use of overt control as an index of parent-child relationship quality.

CATEGORICAL MODEL TESTING: DIMENSIONS OF PARENT-CHILD RELATIONSHIP

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_{Wi})
PARENT-CHILD RELAT	45.42***				
GLOBAL QUALITY		117 (42)	+0.48 A	+.24	580.64***
SATISFACTION		8 (7)	+0.53	+.26	13.93
CONSISTENCY - WITHIN		13 (4)	+0.64 C	+.30	55.87***
CONSISTENCY-BETWEEN		16 (6)	+0.32 D	+.16	62.68***
OVERINVOLVEMENT		6 (3)	+0.24 B,D	+.12	13.50*
DISCIPLINE		23 (10)	+0.30 B,D	+.15	131.81***
OVERALL:		183	+0.45	+.22	903.86***

* $p \leq .05$; *** $p \leq .001$; A differs significantly from B; C differs significantly from D

Overall, dimensions of the parent-child relationship significantly moderate the linkage between marital and parent-child relations, i.e., the category is significant.

Significant between class contrasts indicate that global quality of the parent-child relationship is more strongly associated with marital quality than overinvolvement or discipline; and within parent consistency is more strongly associated with marital quality than between parent consistency, overinvolvement, or discipline.

These results support hypotheses suggesting that marital distress impedes a parent's ability to provide consistent parenting.

Parent-Child Gender

The category based on combinations of parent and child gender also exerts a significant moderating effect. The father-daughter relationship is more strongly associated with the marital relationship than either mother-daughter or mother-son relationships. The effect size for the father-daughter relationship is .67. We have not included the table for parent gender, but father-child relationships, in general, are more strongly associated with marital quality than mother-child relationships.

CATEGORICAL MODEL TESTING: PARENT AND CHILD GENDER

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_{Wi})
PARENT-CHILD					
GENDER	44.94***				
MOTHER-DAUGHTER		23 (8)	+0.39 B	+.19	72.27***
MOTHER-SON		27 (10)	+0.40 B	+.19	94.84***
FATHER-DAUGHTER		16 (8)	+0.67 A	+.32	61.62***
FATHER-SON		20 (10)	+0.50	+.24	78.98***
NO DISTINCTION		97 (40)	+0.41 B	+.20	551.21***
OVERALL:		183	+0.45	+.22	903.86***

*** $p \leq .001$; A differs significantly from B

Developmental Stage of Family Life Cycle

It has been suggested that the support provided by a strong marital relationship may be especially significant during the transition to parenthood, when parenting roles are first being established, compared to later developmental periods. Results support this hypothesis.

CATEGORICAL MODEL TESTING: DEVELOPMENTAL STAGE OF FAMILY LIFE CYCLE

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_{Wi})
DEVELOPMENTAL STAGE OF FAMILY LIFE CYCLE	9.84**				
TRANSITION TO PARENTHOOD		31 (15)	+0.54 A	+.26	177.52***
POST-TRANSITION TO PARENTHOOD		149 (36)	+0.44 B	+.21	715.73***
TRANSITION AND POST-TRANSITION		3 (1)	+0.30	+.15	0.76
OVERALL:		183	+0.45	+.22	903.86***

** $p \leq .01$; *** $p \leq .001$; A differs significantly from B

Stressful Life Circumstances

Some of the studies included in the meta-analysis examined families dealing with stressful life circumstances such as divorce, birth of a child with a physical disability, or premature birth of a child. Not surprisingly, a stronger association between marital and parent-child relations was found when families were coping with stressful events.

CATEGORICAL MODEL TESTING: FAMILY STRESS LEVEL

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_{Wi})
STRESS LEVEL	7.06*				
STRESSFUL		26 (10)	+0.54 A	+.26	102.88***
NORMAL		151 (42)	+0.44 B	+.21	780.96***
BOTH		6 (3)	+0.41	+.20	12.95*
OVERALL:		183	+0.45	+.22	903.86***

* $p \leq .05$; *** $p \leq .001$; A differs significantly from B

Birth Order

Birth order is the only variable that we examined that did not moderate the association between marriage and parenting.

CATEGORICAL MODEL TESTING: BIRTH ORDER

CATEGORY	Q_B	k	d_{i+}	r	HOMOGEN (Q_{Wi})
BIRTH ORDER	2.62				
FIRST BORNS		33 (13)	+0.39	+.19	93.15***
LATER BORNS		150 (38)	+0.45	+.22	808.09***
OVERALL:		183	+0.45	+.22	903.86***

*** $p \leq .001$

Method of Assessment

This category examined whether the same observers (or reporters) assessed both the marital relationship and the parent-child relationship or whether the quality of these two subsystems was assessed by independent observers. As expected, there was a stronger linkage between the marital and the parent-child relationships when measurement was nonindependent.

CATEGORICAL MODEL TESTING: METHOD OF ASSESSMENT

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_{WI})
METHOD OF ASSESSMENT	78.55***				
INDEPENDENT		71 (27)	+0.27 B	+.13	215.24***
NONINDEPENDENT		112 (33)	+0.52 A	+.25	610.08***
OVERALL:		183	+0.45	+.22	903.86***

*** $p \leq .001$; A differs significantly from B

Timing of Measurement

There was a stronger association when the quality of the marriage was assessed prior to the birth of the child. In other words, the quality of the marriage was able to predict the quality of the parent-child relationship, although this result is based on a small number of studies. Of course, this result does not imply causality as there could be a third variable explaining the quality of both the marital and parent-child relationships, such as external stressors, parents' relationships with their own parents, or parents' psychopathology.

CATEGORICAL MODEL TESTING: TIMING OF MEASUREMENT

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_{WI})
TIMING OF MEASUREMENT	4.67*				
LONGITUDINAL		7 (5)	+0.66 A	+.31	21.92**
CROSS-SECTIONAL		176 (47)	+0.44 B	+.22	877.28***
OVERALL:		183	+0.45	+.22	903.86***

* $p \leq .05$; ** $p \leq .01$; *** $p \leq .001$; A differs significantly from B

Cross-Classification of Variables

Categorical model testing indicated heterogeneity within all the categories containing three or more studies. In other words, variance could not be accounted for by any single variable. Thus, we cross-classified variables, which is analogous to looking at interactions.

Overt Marital Conflict and Parent-Child Gender

When overt marital conflict is crossed with parent-child gender, studies examining the father-child relationships are homogeneous, although the sample size is quite small with only four independent studies in each group.

As you may have noted, one problem that occurs in the quest for homogeneity is the need to balance homogeneous subgroups on the one hand with sample sizes containing a sufficient number of studies to be meaningful on the other hand.

CROSS-CLASSIFICATION OF VARIABLES:
OVERT MARITAL CONFLICT AND PARENT-CHILD GENDER

CATEGORY	Q_B	k	d_{i+}	r+	HOMOGEN (Q_{WI})
PARENT-CHILD					
GENDER	57.45***				
MOTHER-DAUGHTER		10 (5)	+0.41 B,D	+.20	36.78***
MOTHER-SON		10 (5)	+0.16 B,D	+.08	27.88**
FATHER-DAUGHTER		6 (4)	+0.83 A	+.38	12.19
FATHER-SON		6 (4)	+0.41 B	+.20	0.51
NO DISTINCTION		17 (7)	+0.66 C	+.32	166.12***
OVERALL:		49	+0.54	+.26	300.92***

** $p \leq .01$; *** $p \leq .001$; A differs significantly from B; C differs significantly from D

Still, this table reveals a very intriguing result. Father-daughter relationships are more strongly related to overt marital conflict than either father-son, mother-daughter, or mother-son relationships. The effect size is .83, which is considered to be, according to Cohen's standards, a large effect.

Data suggest that when the marital relationship is discordant, fathers withdraw from the family, becoming emotionally unavailable to their children (Amato, 1986; Repetti, 1989). As seen in the current data, this is more problematic for girls than for boys. This may be due to some cross-sex socialization effect whereby fathers exert greater influence

on daughters than on sons (Teyber, 1983). It is interesting that while the father-child effect is stronger for the general category of marital quality, the father-daughter versus father-son effect exists only for overt marital conflict. It seems that in addition to the general negative effects of fathers' withdrawal, the existence of overt marital conflict between husbands and wives particularly impairs the way that girls and fathers respond to one another. Perhaps, in this situation, girls are more likely to identify with their mothers or, conversely, fathers may be more likely to generalize their feelings toward their wives to their female children.

Clinical Implications

In considering the clinical implications of these data, the lack of support for the compensatory model suggests that we cannot assume parents buffer their children from the impact of marital discord. For those of us who treat couples, these data suggest the importance of assessing the parent-child relationship. This is especially true when the marriage is marked by high levels of overt marital conflict. Also, as the marital relationship improves, clinicians may want to assess whether the parent-child relationship, particularly the father-child relationship, is improving as well or whether this relationship could benefit from some intervention.

Conclusions

Finally, the lack of homogeneity among studies demonstrates how important it is for researchers to continue the process of identifying how multiple variables interact to impact the important linkage between the marital and parent-child subsystems.

References

Amato, P. R. (1986). Marital conflict, the parent-child relationship and child self-esteem. Family Relations, 35, 403-410.

Belsky, J. (1981). Early human experience: A family perspective. Developmental Psychology, 17, 3-23.

Cohen, J. (1977). Statistical power analysis for the behavioral sciences. New York: Academic Press.

Easterbrooks, M. A., & Emde, R. N. (1988). Marital and parent-child relationships: The role of affect in the family system. In R. A. Hinde & J. S. Hinde (Eds.), Relationships within families: Mutual influences (pp. 83-103). New York: Oxford University Press.

Emery, R. E. (1982). Interparental conflict and the children of discord and divorce. Psychological Bulletin, 92, 310-330.

Engfer, A. (1988). The interrelatedness of marriage and the mother-child relationship. In R. A. Hinde & J. S. Hinde (Eds.), Relationships within families: Mutual influences (pp. 104-118). New York: Oxford University Press.

Goldberg, W. A., & Easterbrooks, M. A. (1984). The role of marital quality in toddler development. Developmental Psychology, 20, 504-514.

Gottman, J. M., & Katz, L. F. (1989). Effects of marital discord on young children's peer interaction and health. Developmental Psychology, 25, 373-381.

Grych. J. H., & Fincham, F. D. (1990). Marital conflict and children's adjustment: A cognitive-contextual framework. Psychological Bulletin, 108, 267-290.

Hedges, L. V., & Olkin, I. (1985). Statistical methods for meta-analysis. Orlando, FL: Academic Press.

Johnson, B. L. (1989). DSTAT: Software for the meta-analytic review of research literatures. Hillsdale, NJ: Erlbaum.

Repetti, R. L. (1989, April). Daily job stress and father-child interaction. Paper presented at the biennial meeting of the Society for Research in Child Development, Kansas City, MO.

Teyber, E. (1983). Structural family relations: Primary dyadic alliances and adolescent adjustment. Journal of Marital and Family Therapy, 9, 89-99.