

Original contribution

Childhood adversities and depression: I. Effects of early parental loss on the rearing behaviour of the remaining parent

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Summary

Although early parental loss and perceived rearing have both been the target of intensive research, they have rarely been linked. This study examined the effects of parental loss on the perceived parenting of the remaining caregiver. The effect of early (before age 16) experience of the father's or mother's death or separation from them for 12 months or longer on the rearing behaviour of the remaining parent was studied retrospectively among 1,329 pregnant women. Women who had experienced either death of or separation from the father reported having received less care from the mother. However, experiences of loss of the mother did not show significant effects on the perceived rearing behaviour of the father. The number of siblings was correlated with reduced paternal and maternal care and with reduced maternal overprotection. Our hypothesis that early parental loss experience would have a negative influence on parental rearing behaviour was proved only for the effects of the paternal loss. Search for other determinants may be warranted.

Keywords: Rearing; early parental loss, childhood adversities, depression.

Introduction

It has long been recognised that a variety of experiences in early life exert influence on later development and the onset of psychiatric disorders (e.g. Bowlby, 1977, 1988). Although first observed by clinical psychotherapists, empirical evidence has also been accumulated (e.g. Kessler and Magee, 1993). There has been much study of both early parental loss and perceived rearing experience. The issue of lone mothers and their children has been a recent focus of research and clinical interest (Roberts, 1995).

The main focus of research on early loss experience has been the loss of a parent, either by death or by a long-term separation. For example, Brown et al. (1977) reported that the onset of depression among housewives in a community sample was associated with early parental loss experience, but not with early loss of any other family members. Reviewing the literature, Tennant (1988) claimed that parental separation was a more potent predictor of psychiatric disorders in adulthood than parental bereavement. However, the lengthy gap between the parental loss experience and the onset of adult psychopathology leads to speculation about possible mediating factors.

Perceived rearing experience is another area of intensive research on the relationship between early human life experience and the later onset of psychiatric disorders. Perris and his co-workers mainly in Europe and Parker and his co-workers in Australia found independently that poor parenting was related to the adult onset of depression (Perris et al., 1985, 1986; Parker, 1983a; Parker and Hadzi-Pavlovic, 1982), anxiety (Parker, 1981), and other minor psychiatric morbidity (Parker, 1983b). For example, Parker (1983a) claimed that depression of the neurotic type was characterised by the experience of low care and overprotection by a parent.

Although the above two types of early human life experience – parental loss and perceived rearing – have both been the targets of intensive research, they

have rarely been linked. Recently, Oakley-Brown et al. (1995) studied the two variables as a risk factor of adult major depression in their community epidemiological study, and calculated the adjusted relative risks; they concluded that when the effects of the other factors were controlled, only the perceived rearing experience remained as a significant predictor of adult major depression, while loss experiences failed to show significance in this respect. However, we are not aware of any studies, which examined the effects of the parental loss on the perceived rearing attitude of the remaining parent. If poor parenting style mediated the effect of the early parental loss on the likelihood of adult depression, it should attract the interest of both researchers and clinicians whether the mediation was limited to a parent of a particular sex (e.g. only mother's parenting being affected by the loss of the father), to a particular type of loss (e.g. separation or death), or to a particular age-range of the child. This is because it is hardly believable that the loss of a parent itself directly causes adult depression a few decades later; some aspects related to the parental loss may actually mediate the effect.

We report here data on the effect of parental loss on the perceived parenting of the remaining caregiver; these were obtained from reanalyses of a data set of a large sample of women of our on-going longitudinal study. The effects of these two variables on the adult onset of depression will be reported in a subsequent paper.

Method

Sample

Women attending the antenatal clinic of a general hospital in Kawasaki, an industrial city located near Tokyo in Japan, were consecutively invited for a questionnaire survey (Kitamura et al., 1996, 1998a, 1998b). A total of 1,329 women were recruited. No exclusion criteria were applied, other than being at more than 12 weeks gestation at the time of entry to the study. Of the total of 1,329 women who were distributed the questionnaires, 1,073 returned them in a usable form. They were aged between 16 and 41, with a mean (S.D.) of 28.1 (4.3) years. This study was carried out between 1985 and 1986. Using the same data set, we have already reported results on the other topics (Kitamura et al., 1996, 1998a, 1998b, 1998c; Sugawara et al., 1997).

Measures

Questionnaires were distributed three times during the pregnancy – early (when they entered), in the middle period (approximately 20 weeks gestation), and late (approximately 34 weeks gestation).

The questionnaire given in early pregnancy included items concerning death of and separation from a parent for 12 months or longer before the woman was 16 years of age. If the subject reported any loss experience, further enquires were made about both the subject's and the parent's age at the time of loss, the causes of the loss, and (for separation) its duration in years.

The Parental Bonding Instrument (PBI; Parker et al., 1979) was included in the second questionnaire. The PBI has two subscales – care and overprotection – which assess affective behaviour and overprotective rearing respectively, for each parent, when the subject was aged under 16. Although many parental characteristics could be rated by such a questionnaire, Parker focused on care and overprotection as they were “consistently suggested as principal dimensions in factor analytic studies, are held to underpin interpersonal relationships, are central to theoretical expositions about child development” (Parker, 1990), and low care/overprotection has been linked to psychopathology. The care subscale includes items such as “(My father/mother) was affectionate to me,” and “seemed emotionally cold to me” (reversed item). The overprotection subscale includes items such as “tried to control everything I did”, and “gave me as much freedom as I wanted” (reversed items). In the present study, the number of PBI items was reduced from 25 to 16 (8 care and 8 overprotection items), which had the highest factor loadings on the two factors in Parker et al.'s (1979) original report. The means of paternal care, paternal overprotection, maternal care, and maternal overprotection (S.D.) were 15.5 (4.5), 7.3 (3.7), 18.0 (4.1), and 7.0 (3.8), respectively. Their Cronbach's α coefficients were 0.84, 0.74, 0.83, and 0.75, respectively. The validity of the PBI has been examined for both the English (Parker, 1983b) and Japanese (Kitamura and Suzuki, 1993) versions.

Data Analysis

The women with and without each loss experience of a particular parent were compared by t-test in terms of the PBI scores of the remaining parent. Since there were two PBI subscales (care and overprotection) and three classifications (death, separation, and either) for each parent, we set α at 0.008 (0.05/2/3) following Bonferroni correction. Since we found significant correlations between the number of the siblings and three of the PBI scores (Kitamura et al., 1998c), each PBI score was compared between the women with and without a loss experience by analysis of covariance (ANCOVA) with the number of siblings as a covariate. All statistical analyses were done by using the SPSS-X programme (SPSS Inc., 1980).

Results

Paternal death before the age of 16 was reported by 59 (5%); paternal separation by 73 (6%); paternal loss of either type by 132 (11%); maternal death by 25 (2%); maternal separation by 37 (3%); and maternal loss of either type by 62 (5%). No women reported both of the losses of a particular parent. Of the 59 women who had experienced death of the father before the age of 16, 11 (19%) had been aged 4 or less at the time of the paternal death, while 21 (36%) between 5 and 10, and 27 (46%) aged 11 or more. Of the 73 women who had experienced separation from the father before the age of 16, 25 (34%)

had been aged 4 or less at the time of paternal separation, 21 (29%) between 5 and 10, and 27 (37%) 11 or more. Of the 25 women who had experienced death of the mother before the age of 16, 5 (20%) had been aged 4 or less, 10 (40%) between 5 and 10, and 10 (40%) 11 or more. Of the 37 women who had experienced separation from the mother before the age of 16, 12 (32%) had been aged 4 or less, 14 (38%) between 5 and 10, and 11 (30%) 11 or more.

The PBI scores were not correlated with the current age of the women (paternal care, $r = -0.02$; parental overprotection, $r = -0.02$; maternal care, $r = -0.04$; maternal overprotection, $r = -0.01$; NS).

The number of siblings ranged between 0 and 10, with a mean (S.D.) of 2.0 (1.5). Three of the PBI scores were negatively correlated with the number of siblings (paternal care, $r = -0.10$, $p < 0.001$, paternal overprotection, $r = -0.09$, $p = 0.003$; maternal care, $r = -0.01$, $p = 0.410$; maternal overprotection, $r = -0.08$, $p = 0.004$). Most of these were slight in magnitude, but statistically significant. Thus, the more siblings the women had, the lower the scores for paternal care and the paternal and maternal overprotection.

Women who had experienced separation from the father reported less maternal care than those women who had not (Table 1). But those who experienced death of the father reported no difference in the maternal care. The maternal overprotection scores did not differ between the women who had experienced death of or separation from the father and those who had not. This was also the case when those with experience of the father's death and those who had experienced paternal separation were combined: those women who had experienced either death of or separation from the father reported less maternal care than those who had never experienced any paternal loss, while the two groups did not differ in terms of reported maternal overprotection (Table 1).

Contrary to the effects of paternal loss on the rearing behaviour of the mother, maternal loss showed no significant effects on the perceived rearing behaviour of the father. Thus, the PBI scores of the father did not differ between those women with and without any type of maternal loss (Table 1).

Among the women who had reported a particular loss experience, the three groups of women with different ages at the time of loss (0–4, 5–10, 11–15) did not differ significantly in terms of any PBI scores.

Since the number of siblings showed significant correlations with three of the PBI scores, analysis of

Table 1. *Effects of parental loss on the perceived rearing behaviour of the remaining parent*

Remaining parent	Parental loss		t
	Yes	No	
Mother			
Paternal death			
Care	16.7 (4.6)	18.0 (4.1)	2.39
n	55	1029	
Overprotection	7.2 (3.3)	7.1 (3.8)	0.17
n	53	1040	
Paternal separation			
Care	16.3 (5.0)	18.1 (4.0)	2.94*
n	67	1017	
Overprotection	7.2 (4.6)	7.1 (3.8)	0.25
n	66	1027	
Either loss of the father			
Care	16.4 (4.8)	18.2 (4.0)	3.79*
n	122	962	
Overprotection	7.2 (4.0)	7.0 (3.8)	0.34
n	119	974	
Father			
Maternal death			
Care	15.6 (4.6)	15.5 (4.5)	0.03
n	20	1024	
Overprotection	6.8 (3.7)	7.4 (3.7)	0.67
n	21	1021	
Maternal separation			
Care	14.2 (5.3)	15.6 (4.5)	4.64
n	29	1015	
Overprotection	7.6 (3.1)	7.3 (3.7)	0.44
n	28	1014	
Either loss of the mother			
Care	14.7 (5.0)	15.6 (4.5)	1.25
n	49	995	
Overprotection	7.3 (3.4)	7.3 (3.7)	0.11
n	49	993	

SDs in parentheses. * $p < 0.008$.

covariance (ANCOVA) was carried out for each PBI score, with loss experience as the independent variable and the sibling number as the covariate. Paternal separation showed significant main effects on the maternal care score ($F(1,1050) = 12.5$, $p < 0.010$), but paternal death barely failed to reach statistical significance ($F(1,1050) = 3.3$, $p = 0.072$) in its effects on the maternal care score. The number of siblings showed significant effects on all the PBI scores except for the paternal overprotection scores in relation to maternal death and separation.

Discussion

World-wide the rate of early parental loss varies considerably, due to such factors as parental separation, divorce, war evacuation, disease of a parent or child,

boarding school, economic depression, etc. This is also the case in Japan (Kitamura et al., 1998d). The present sample of women reported paternal loss in 11% and maternal loss in 5%. These figures are not very different from those reported by Kitamura, et al. (1998d).

Our main hypothesis was that early parental loss experience would have a negative influence on perceived parental rearing behaviour. This proved to be true only for the effects of the separation from the father on the care exercised by the mother. The reduced maternal care that was retrospectively perceived by the adult child may be attributed to the distorted cognitive style resulting from the loss experience of the father; women who had been separated from their father might thereby become more critical of affectionate attitude of the mother. However, this explanation seems unlikely, because the mother's overprotection score was not affected by the separation from the father. Nor were the paternal care and overprotection scores affected by the loss of the mother.

For maternal attitudes towards the child, only affectionate behaviour was affected by the separation from the father while maternal overprotection remained stable, regardless of the loss of the father. It may be speculated that the child only perceives the mother's behaviour as affectionate when the mother gives repeated signs of affection, whereas perception that the mother is respecting the child's autonomy can be gained even if the mother gives such a sign only a few times during childhood. The effect of the mother's tender and loving care may subside, once she stops giving it, whilst that of the mother's endorsement of the child's self-determination (e.g. what to do and what to put on) may persist, once she has given it. Spousal loss may reduce the amount of time the mother can spend with the child, due to the need for her to spend more time at the workplace, or it may place a heavier burden of responsibility on her for things she had not had to do previously.

The link between the experience of paternal separation and reduced maternal care may be confounded. For example, the cause of the loss (e.g. marital discord resulting in separation) may directly lead to the mother becoming less affectionate. Alternatively, the cause of the reduced maternal care (e.g. personality disorder or depression of the mother (Andrews et al., 1990)) may be causally linked to the marital discord and eventual separation. The finding that the maternal care was affected by the absence of the father (husband), while the paternal care was not

affected by the absence of the mother (wife) is difficult to explain. Those mothers who had lost their husband by separation may have had to spend more time outside the home in a paid occupation, so that they had fewer hours to communicate with the child. Alternatively, females may be more sensitive to the change of marital status, so that their rearing behaviour will be influenced by their emotional reaction to it. When a spouse is lost, males may be more likely to have an opportunity to receive emotional and instrumental support, so that spousal loss may be less disadvantageous socially to men than to women (Colletta, 1979). For example, in 1968, more than half of Japanese children of divorced parents were reared by the divorced mothers, while only 15% of the fathers agreed to take financial responsibility for the child's care. In 1987, the average annual income per family member was 1,040,000 yen among father-child families, compared with 630,000 among mother-child families in Japan (Inoue and Ehara, 1995). In traditional Japanese society, spousal loss is a "shame" for women, but a focus of sympathy for men.

After controlling for the effect of the number of siblings, paternal separation appeared to be more influential on the perceived care of the mother than paternal death. In his review of the effects of early parental loss experience on the adult psychopathology, Tennant (1988) concluded that it was parental separation but not parental death that appeared to be a risk factor for adult psychiatric disorder. Our findings seem to be in line with this conclusion. However, before concluding that loss of the father causes reduced care by the mother, which in turn causes adult psychiatric disorder, one should explore alternative explanations. For example, the findings may be confounded by loss of the father being mediated to the occurrence of adult disorder through reduced self-esteem. Loss of the father is likely to be followed by social disadvantage such as lower income, inferior education, and greater social deprivation, all of which make the individual more vulnerable to depression (Jones-Webb and Snowden, 1993) and other disorders.

The link between paternal separation, poor maternal care, and adult depression may be a focus of future research, but this paper focuses only on the possible effects of loss of one parent on perceived rearing by the remaining parent. This appeared to deserve research attention because parenting style (Dekovic and Janssens, 1992; Eisenberg-Berg and Mussen, 1978; Goldney, 1985; Kuczynski

et al., 1987; Loeber and Dishion, 1984; MacDonald, 1987; MacDonald and Parke, 1984; Martin and Waite, 1994; Mussen et al., 1970; Pettit et al., 1988; Roberts and Strayer, 1987) and parental loss (Crook and Raskin, 1975; Goldney, 1981; Greer, 1964; Paffenbarger and Asnes, 1966) might exert impacts on child development and psychopathology in a complex manner.

There are some clinical implications of our findings. Firstly, more care should be exercised in eliciting information about a patient's early life experience. Those events examined in our present study are not "abnormal", but they are usually regarded as events that anyone may encounter. Yet they have demonstrated significance in the aetiology of psychiatric disorder: our findings suggest that a report of separation from the father in early life warrants further enquiry about the mother's care. Secondly, since those early experiences may have effects upon adult psychiatric disorder as well as on child development, mental health professionals involved in the care of children who have lost a parent or are receiving unsatisfactory parenting should be alert to not only the immediate, but also the long-term outcome. This may require longer period of a follow-up care than used to be thought necessary, as well as better liaison with teachers and social welfare agencies.

Some limitations of this study must be noted. Firstly, our sample consisted only of pregnant women, and it is not unlikely that men show different relationships between the parental loss and the perceived rearing experience. Psychological and sociological factors related to pregnancy and marriage (or cohabitation) may have confounded the results. Older populations may present different patterns. Before generalising the results, different populations should be examined.

Secondly, this study relied solely on retrospective reports of childhood by adults. A child's perception of the parent's own assessment of his/her parenting behaviour, and the parent's observation of other parent's behaviour do not correspond very well. Thus, Kitamura and Suzuki (1993), studying adolescents and their parents, reported correlations of the PBI scores rated by the three: maternal care, child-mother $r = 0.33$, father-mother $r = 0.55$; maternal overprotection, child-mother $r = 0.46$, father-mother $r = 0.57$; paternal care, child-father $r = 0.32$, father-mother $r = 0.38$; paternal overprotection, child-father $r = 0.40$, father-mother $r = 0.38$. The PBI scores obtained in this study are no more than what

the women thought of as their parent's attitudes towards them; they may differ from what their parents really were. Furthermore, retrospective recall may be distorted by memory error or emotional loading (Aneshensel et al., 1987; Field, 1981; Finlay-Jones et al., 1981; for review Brewin et al., 1993). Direct observation of parenting behaviour of a parent whose spouse has been lost temporarily or permanently may be warranted.

Because of the cross-sectional design of this study, one may cast doubt on the validity of self-report of perceived parenting; it may be coloured by the condition of depression. However, following depressed and non-depressed women over a period of four years, Gotlib et al. (1988) showed that the PBI scores rated at the start and end of this period were stable regardless of the women's depression severity (for general discussion see Brewin et al., 1993). We deliberately administered the SDS in the first trimester and the PBI in the second trimester because antenatal depression is reported to be prevalent in the first trimester and tend to subside in the subsequent trimesters (Kitamura et al., 1993; Kumar and Robson, 1984).

Thirdly, parenting behaviour may be influenced by many factors other than loss of the other parent. A moderate degree of difference in the maternal care score between those with and without paternal separation indicates that parental loss experience exerts only slight, though significant, effects upon the remaining parent's behaviour. Search for other determining variables may contribute to a better understanding of parenting behaviour and children's and parents' mental health.

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