

THE TRANSMISSION OF PARENTING BEHAVIOUR WITHIN THE FAMILY: AN EMPIRICAL STUDY ACROSS THREE GENERATIONS

Isabelle Roskam*

“Why do parents parent the way they do?” is a very important question. The aim of the current research is to study whether and to what extent the way parents have been parented influences the way they parent. Original data were collected from 48 families across three generations. Grandparents, parents and young adults were asked to report on how they had been parented, how they themselves had parented in the case of the grandparents’ and parents’ generations, or how they were planning to parent in the case of young adults without children. We tested the hypothesis of a “childrearing tradition” across three generations of respondents in a cross-sectional study with a non-clinical sample. Some arguments in favour of continuities have been found, in particular for supportive rather than for controlling parenting. The results hence suggest that reports on parenting behaviour correlate from one generation to the next and even across two non-consecutive generations. The similarities that have been displayed result from the influence of the parenting individuals have received on the way they themselves parent. Our results also suggest that such an influence may be higher for childrearing attitudes such as warmth that have consistently been regarded as desirable, than for those that have been regarded as more controversial in society, such as harsh discipline.

Introduction

“Why do parents parent the way they do?” (Belsky, 1984) (p. 83) is a very important question. From a theoretical point of view, the answer lies in the determinants of childrearing behaviour, i.e. the factors that account for behavioural issues in mothers and fathers. From a clinical point of view, understanding the factors involved in parenting is crucial for the design of evidence-based intervention programs (Roskam & Meunier, 2012).

Belsky (1984) was one of the first researchers to propose a theoretical model of the determinants of parenting. Individual differences were considered to stem from three main sources of influence: parental factors such as personality traits or developmental history, child-related factors such as tem-

* Isabelle Roskam, Psychological Sciences Research Institute, University of Louvain, Belgium.

Correspondence concerning this article should be addressed to Isabelle Roskam, Psychological Sciences Research Institute, Place Cardinal Mercier, 10, 1348 Louvain-la-Neuve, isabelle.roskam@uclouvain.be

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perament or special needs, and contextual factors such as spouse or social network support. The aim of the current study is to focus on the parents' developmental history, and in particular whether and to what extent the way they have been parented influences the way they parent. Original data were collected across three generations. Grandparents, parents and young adults were asked to report on how they had been parented, how they themselves had parented in the case of the grandparents' and parents' generations, or how they were planning to parent in the case of young adults without children. We tested the hypothesis of a "childrearing tradition" (Vermulst, de Brock, & van Zutphen, 1991) across three generations of respondents in a non-clinical sample (Vermulst et al., 1991).

Intergenerational transmission interested researchers many years ago. The first studies on this topic were published in the fifties (Itkin, 1952; Staples & Smith, 1954; Woods, Glavin, & Kettle, 1960). The vast majority of subsequent studies focused on the intergenerational transmission of child maltreatment and abuse in clinical samples (Egeland, Jacobvitz, & Sroufe, 1988; Hunter & Kilstrom, 1979; Kim, 2009). Although such studies are less directly relevant to our main objective, the hypothesis of the transmission of parenting behaviours from one generation to the next received strong empirical support in non clinical samples. In 1992, a review mainly based on cross-sectional studies supported this hypothesis (Van Ijzendoorn, 1992). However, it stressed the methodological limitations of retrospective studies where the parents' generation reported on how they had been parented when they were children. Retrospective data are subject to memory distortions. Data have also been collected in most available studies from single respondents who reported both about their parents' behaviour and about their own parenting behaviour. Single informant reports potentially exaggerate the correlation between parenting behaviours in two consecutive generations and produce method variance problems (Conger, Neppl, Kim, & Scaramella, 2003; Putallaz, Costanzo, Grimes, & Sherman, 1998; Van Ijzendoorn, 1992).

Later on, several longitudinal studies overcame the methodological limitations of cross-sectional ones. They controlled for the cohort effect, because the two generations involved reported on their own parenting behaviour or had been observed at about the same point in their life span (Van Ijzendoorn, 1992). Also, while the causal interpretation of bivariate correlations in cross-sectional studies is not endorsed, repeated measures of parenting behaviour with similar or at least comparable instruments across two generations was found to be an ideal design for studying the intergenerational transmission of parenting behaviour (Putallaz et al., 1998; Van Ijzendoorn, 1992).

One of the most significant contributions was a longitudinal study conducted with more than 2,000 participants over 20 years (Chen & Kaplan, 2001). Where 7th graders perceived that they were being parented well, this

was shown to predict the extent to which they themselves used constructive parenting behaviour in middle adulthood, i.e. monitoring, communication with the child, involvement, affection and discipline. Modest but significant correlations ranging from .06 to .12 were displayed. While this study relied entirely on self-report questionnaires, another important longitudinal study over 20 years combined observational measures of warm, sensitive and stimulating parenting with questionnaires (Belsky, Jaffee, Sligo, Woodward, & Silva, 2005). It was shown that mothers who had experienced authoritarian parenting in their early childhood were less likely to behave in a warm, sensitive and stimulating manner when interacting with their 3-year-old child ($r = -.29$). However, this main effect was not confirmed for fathers ($r = .04$). The intergenerational transmission of fathering has been longitudinally tested more recently with a multi-agent and multi-method approach to constructive parenting, i.e. monitoring, discipline, warmth and involvement (Kerr, Capaldi, Pears, & Owen, 2009). Parenting behaviour of fathers from the first generation was examined when their child was 9 to 12 years old, while the behaviour of fathers from the second generation was assessed when their own child (third generation) was 2 to 3 years old and again at 5 to 7 years old. Moderate intergenerational continuity was displayed in the results, with correlation coefficients of .33 and .35 respectively in early and middle childhood. A similar range of association was shown for parental monitoring and harsh discipline (Bailey, Hill, Oesterle, & Hawkins, 2009) as well as for aggressive parenting (Conger et al., 2003). Assessment of monitoring and harsh discipline was obtained with questionnaires completed by the parents in the first generation when their adolescent was 13 years old and by those in the second generation when they became parents. Correlations were .17 for monitoring and .23 for harsh discipline (Bailey et al., 2009). Assessment of aggressive parenting was obtained through direct observation of parent-child interaction. It was first obtained when the children were 9th and 10th graders, and for a second time 5 to 7 years later when the members of the second generation were becoming parents and their child was at least 18 months of age. The correlation of angry aggressive parenting between the two consecutive generations was .30.

In sum, despite methodological properties with regard to the cross-sectional or longitudinal design, to instruments (self-report questionnaires, observations or mixed), to respondents (single or multiple), and to parenting behaviours under consideration (positive as warmth or negative as aggressive), the main conclusion is that patterns of childrearing behaviour are partly transmitted across generations.

It has been contended that the process by which these patterns could be transmitted from one generation to the next is that of social learning, involving observing, modeling and reinforcement (Bandura, 1977; Chen & Kaplan,

2001; Simons, Whitbeck, Conger, & Wu, 1991). In the absence of competing models, it is argued that children accept their parents' childrearing behaviour as typical, having little awareness of the alternatives. Such a direct mechanism of influence has been held to explain the continuity that has been observed in empirical studies (Putallaz et al., 1998). A mediational model involving interpersonal style, parenting beliefs, psychological state and social participation has also been cited as a factor explaining continuity in parenting behaviour across generations (Chen & Kaplan, 2001; Kerr et al., 2009; Kitamura et al., 2009; Putallaz et al., 1998). Very recently, epigenetic effects have been suspected to account for the transmission of parenting from one generation to the next. The repetition of maternal care in laboratory studies across generations of rodents has been explained by the influence of early interactional experiences on gene expression in offspring, in particular the level of neuropeptide (oxytocin and estrogen) receptors within the medial preoptic area of the hypothalamus (Champagne & Meaney, 2007; Peña & Champagne, 2012).

However, the modest to moderate coefficients that have been reported in the studies reviewed indicates that there is also a certain discontinuity across generations (Bailey et al., 2009). Although they share norms about parenting with their own parents, parents differ from the previous generation with regard to their socialisation experiences as a parent. For example, the historical and contextual perspective on "how to be a good parent" as conveyed in the media or by peers may be slightly different. Also, the influences of the parent's partner and of each child's temperament could explain discontinuity.

Current study

The current study contributes to the wonderful field of research into the determinants of parenting, and in particular the intergenerational transmission of parenting behaviours. One original feature is that it includes respondents from three consecutive generations, rather than two as in previous research, and it is therefore cross-sectional. Each of the respondents in the three generations, i.e. the grandparent (G1), the parent (G2) and the young adult (G3), reported on both their perceptions of their parents' childrearing behaviour and their perceptions of their own childrearing behaviour. The hypothesis of intergenerational transmission was tested for a large panel of parenting behaviours. Supportive parenting encompasses the affective nature of the parent-child relationship and refers to a variety of related behaviours including warmth, acceptance, involvement, autonomy demands, monitoring, and the establishment of guidelines. Controlling parenting encompasses parents' efforts to control their children's behaviour including, for example, harsh discipline, ignoring, inconsistent discipline and material rewarding (Roskam & Meunier, 2012).

Based on previously published results, modest to moderate correlations ranging from .10 to .30 were expected between consecutive generations. Relatively lower correlations were expected between the grandparent (G1) and the young adult generation (G3). We hypothesised that different socialisation experiences would have a greater impact and produce greater discontinuity between non consecutive generations. Moreover, because of shared method variance, higher correlations were expected when the data had been provided by the same informant assessing both their perceptions of their parents' childrearing behaviour and their perceptions of their own childrearing behaviour than when two different informants reported on their own childrearing behaviour alone.

It was expected that the way the young adults (G3) planned to behave as parents in the future would be predicted by the childrearing behaviour of their parents (G2); also, the childrearing behaviour of the grandparents towards their children (G1 to G2) was expected to explain an additional but smaller element of the variance in the young adults' intentions (G3) over and above the G2 effect.

Method

Sample and procedure

Data were collected among 48 families in the French-speaking part of Belgium. Each family consisted of a grandparent (G1) (75% grandmothers) with a mean age of 71.75 years ($SD = 5.42$, range 63-83), a parent (G2) (66% mothers) with a mean age of 47.17 years ($SD = 4.26$, range 39-59), and a young adult (G3) (64% girls) with a mean age of 18.44 years ($SD = 2.02$, range 17-26).

Two questionnaires were administered to the participants. The first one was a self-report about their own parenting behaviour towards their 10-year-old child in the past (for G1 and G2) or in the future (for G3). The second one focused on their perceptions of the parenting behaviour they had received from their parents when they were 10 years of age (for G1, G2 and G3). Ten years was chosen as an age that the participants could remember in terms of their perception of their own parents' behaviour as well as a time in their child's life by which the parents, thanks to long experience of their role, had sufficient awareness of their own childrearing behaviour for self-report purposes. The two questionnaires were administered in a random order to the 48 families with a one-week interval. This was done in order to limit the bias of association between the two; in addition, if the two questionnaires had been administered at the same moment to the same respondent, correlations between the two phenomena might have been increased by the need for cognitive consistency or the influence of mood.

The young adults (G3) were contacted at university by means of an announcement they received by email. The inclusion criteria were that they had to be between 18 and 25 years old in order to maximise the chance that they would have at least one grandparent still alive and that they had to be planning to become a parent in the next ten years. They were asked to give the first questionnaire to their mother or father (G2) as well as to the mother or the father of the G2 parent (G3). The respondents were asked to complete the questionnaire within the following seven days and to send it back to the research team at the Psychological Sciences Research Institute. They were informed in a letter accompanying the questionnaire that the data would remain confidential. One week later, each participant received the second questionnaire. Again, they were asked to complete it within the next seven days and to send it back to the research team at the Psychological Sciences Research Institute. Complete data were obtained for 48 families. Note that incomplete data were also obtained for 18 families, with missing data for at least one of the three generations or for one of the two questionnaires. These were not included in the analyses.

Instruments

Parenting behaviour was assessed with two versions of the *Evaluation des Pratiques Educatives Parentales* (EPEP) (Meunier & Roskam, 2007). It is derived from the Ghent Parental Behaviour Scale (GPBS) (Van Leeuwen & Vermulst, 2004) which was validated with Dutch-speaking samples. Conceptually, the EPEP is based on the social interactional approach of Patterson and colleagues that children's maladaptive and antisocial behaviour is related to the parents' contingent use of aversive and ineffective management techniques (Patterson, 1982). In the original English scale, 58 items assessed five factors representing observable CRB: monitoring, discipline, positive reinforcement, problem solving, and parental involvement. Later Dutch studies were unable to replicate the five-factor structure (Van Leeuwen & Vermulst, 2004). Authors suggested that some constructs were too broadly defined and that additional scales were needed. Discipline was divided into several constructs and autonomy (referring to the responsibility for coping and decision-making given by parents to their child) was added because of its theoretical relevance. The final version of the GPBS contains 45 items with a nine-factor solution: positive parenting, monitoring, rules, discipline, inconsistent discipline, harsh punishment, ignoring, rewarding, and autonomy. The nine-factor solution has been validated with mothers, fathers, and 8- to 14-year-old children in 600 families, as well as in an independent sample of 175 families. Cronbach's α s ranged from .52 to .88. The amount of variance explained was 35% for mothers, 40% for fathers, 51% for children about their mother, and

47% for children about their father. The French version of the questionnaire, the EPEP scale replicates and validates that nine-factor solution as well as completing the Dutch analysis with more discriminative measures and a test-retest reliability assessment.

The first version of the EPEP used in the current study was a self-report about the respondent's own parenting behaviour (Self-reported Parenting Behaviour) (Meunier & Roskam, 2007). It was a 35-item instrument yielding nine factors: positive parenting, monitoring, rules, discipline, inconsistent discipline, harsh punishment, ignoring, material rewarding, and autonomy. A five-point Likert-type scale was provided for each item, ranging from "never" to "always". Recently validated on 493 French-speaking mothers and fathers of developing normally children, the EPEP scale has good psychometric properties. Cronbach's α ranged from .65 to .89; the total percentage of variance explained by the nine factors was 64.3%; test/retest correlations for a sample of 45 parents varied between .51 and .84. Confirmatory factor analyses showed that two second-order factors covering the supportive and controlling dimensions of parenting emerged from the initial factor solution. The supportive factor was composed of positive parenting, autonomy, monitoring, and rules, and included items such as "When my child has a problem, we look together at different possible solutions." The controlling factor included discipline, harsh punishment, material rewarding, inconsistent discipline, and ignoring, and included items such as "When my child doesn't obey a rule, I sometimes threaten to punish him or her, but in the end I don't carry out the threat." The fit measures demonstrated an acceptable fit to the data, with goodness of fit index (GFI) = 0.92 and root mean square residual (RMR) = 0.04, although the root mean square error of approximation (RMSEA) was only 0.11 (Hu & Bentler, 1999). All the estimated factor loadings were significant (Meunier & Roskam, 2007). Note that the items were slightly transformed for the current study: for example, one item was worded "When my child had a problem, we looked together at different possible solutions" for the assessments in G1 and G2, but "When my child has a problem, we will look together at different possible solutions" for the assessment in G3.

The second version of the EPEP used in the current study was designed for children and adolescents assessing the childrearing behaviour they received from their parents (Received Parenting Behaviour) (Meunier & Roskam, 2007). It was a 30-item instrument yielding the same nine factors and similar five-point Likert-type scales. It has been validated among 159 8-to-14-year-old children and 834 13-to-18-year-old adolescents ($N = 993$ pooled sample), and found to display good psychometric properties. The analysis supported the relevance of the nine-factor solution. The amount of variance explained was 62.04% for the children, 62.60% for the adolescents, and 61.74% for the two groups taken together. Cronbach's α ranged from .52

to .88. The correlations suggested the same second-order solution for young people as for parents. A CFA was conducted based on the covariance matrix and using maximum likelihood estimation. Although the χ^2 statistic was significant, $\chi^2(26) = 394.3$, $p < .001$, other fit measures demonstrated an acceptable fit to the data. The indices were similar to those for parents: GFI = 0.91, RMSEA = 0.10, RMR = 0.07 for children; GFI = 0.92, RMSEA = 0.12, RMR = 0.07 for adolescents; and GFI = 0.92, RMSEA = 0.12, RMR = 0.06 for children and adolescents together. The completely standardised factor loadings for the pooled sample (children and adolescents) mostly ranged between .40 and .60; error variances ranged between .23 and .88. The two dimensions had almost zero correlations. Note that the items were slightly transformed for the current study: for example, one item was worded "When I had a problem, my parents and I looked together at different possible solutions" for the assessments in G1, G2 and G3.

For both versions, in order to reduce the number of constructs in the current study, the second-order factors of the EPEP scale, i.e. support and control, were used in the analyses.

Analysis strategy

The analyses were conducted with SPSS 19 software. In order to test continuity across the three generations, correlations were computed both for self-reported parenting behaviour (SPB) and received parenting behaviour (RPB). The correlations also informed us about the agreement between the respondents, i.e. G1's SPB and G2's RPB, G2's SPB and G3's RPB. The magnitude of the coefficients was interpreted according to the standard recommendations in psychological sciences, i.e. coefficients lower than .30 were considered to be low or modest, those between .30 and .50 to be moderate, those between .50 and .70 to be high and those higher than .70 to be very high (Field, 2009).

Stepwise regression models were also computed for the prediction of G3's SPB, i.e. how young adults planned to behave as a parent in the future. In a first model, G3's SPB was predicted on the basis of self-reported parenting behaviour in the other two generations, i.e. G2's SPB in a first step and G1's SPB in a second step. In a second model, G3's SPB was predicted on the basis of the parenting behaviour that the respondents in the three generations reported having received from their parents, i.e. G3's RPB in a first step, G2's RPB in a second step, and G1's RPB in a third step. The ΔR^2 indicated whether and to what extent each step explained an additional part of the variance in the outcome.

Results

Continuity across generations

Table 1 displays the correlations between SPB and RPB across the three generations.

Table 1

Correlations between self-reported parenting behaviour (SPB) and received parenting behaviour (RPB) across the three generations: grandparents (G1), parents (G2), and young adults (G3)

	G1 RPB	G1 SPB	G2 RPB	G2 SPB	G3 RPB	G3 SPB
G1 RPB	–	.53***	–.06	–.20	.06	–.03
G1 SPB	.63***	–	.50***	.45***	.31*	.43**
G2 RPB	–.12	.47***	–	.52***	.11	.35*
G2 SPB	–.22	.21	.50***	–	.09	.22
G3 RPB	.22	.35*	.56***	.07	–	.65***
G3 SPB	.06	–.14	–.22	.19	–.01	–

* $p < .05$; ** $p < .01$; *** $p < .001$

Note: Coefficients above the diagonals are for supportive behaviour; those below are for controlling behaviour.

The continuity across generations was firstly appraised by considering the relations between RPB and SPB from the same respondent. In this case, the coefficients ranged from .50 to .65, with an exception for control in the young adults' generation ($r = -.01$).

In order to reduce shared method variance problems, continuity was also considered by relating SPB from two different respondents, i.e. each one assessing their own parenting behaviour. Continuity was found to be moderate for support, with $r = .45$ between G1 and G2, .43 between G1 and G3, and .22 between G2 and G3. Continuity was lower for control, with $r = .21$ between G1 and G2, $-.14$ between G1 and G3, and .19 between G2 and G3.

Agreement between informants

As shown in Table 1, agreement between informants was evaluated by correlating SPB from one generation and RPB from the next. The coefficients were high between G1 and G2; the support that the parents (G2) estimated they had received from their parents (G1) was related to the support that the grandparents (G1) reported having provided to their children (G2), $r = .50$. The same was true for control, with $r = .47$. Conversely, the correlations were low, at .09 and .07 for support and control respectively, between the parenting behaviour that young adults (G3) estimated they had received from their parents

(G2) and the parenting behaviour that the parents (G2) reported having displayed towards their children (G3). The moderate coefficients between G1 and G2 and in particular the very low coefficients between G2 and G3 led us to consider RPB and SPB in two separate models in the regression analyses.

Prediction of the young adults' parenting behaviour

The results of the first stepwise regression analysis are presented in Table 2. In this first model, G3's SPB, i.e. how young adults planned to behave as parents in the future, was predicted on the basis of self-reported parenting behaviour in the other two generations, i.e. G2's SPB in a first step and G1's SPB in a second step.

Table 2

Stepwise regression analysis predicting the young adults' SPB (G3) from G2's and G1's self-reported parenting behaviour

		Support β	Control β
Step 1	G2 SPB	.25†	.19
R ²		.05	.04
Step 2	G2 SPB	.04	.23
	G1 SPB	.41**	-.19
ΔR^2		.13**	.03
Total R ²		.18	.07

† $p < .10$; * $p < .05$; ** $p < .01$; *** $p < .001$

The results of the second stepwise regression analysis are presented in Table 3. In this second model, G3's SPB was predicted on the basis of the parenting behaviour that the respondents in the three generations reported having received from their parents, i.e. G3's RPB in a first step, G2's RPB in a second step, G1's RPB in a third step.

In line with the hypothesis, the supportiveness of the behaviour that the young adults (G3) planned to display as parents was predicted by the parenting behaviour of their parents (G2), while the parenting behaviour of the grandparents towards their children (G1 to G2) also explained an additional part of the variance in the young adults' intentions (G3) over and above the G2 effect. However, in the second model, the grandparents' perceptions of received parenting behaviour from their parents were not significant over and above the predictors from the other two generations. In sum, the results confirm a certain continuity in support across the three generations. The same conclusions can be drawn from the two regression models in which self-reports (SPB) or perceptions of received parenting behaviour (RPB) were

Table 3

Stepwise regression analysis predicting the young adults' SPB (G3) from the three generations' RPB

		Support β	Control β
Step 1	G3 RPB	.65***	-.00
R ²		.42	.00
Step 2	G3 RPB	.61***	.16
	G2 RPB	.28*	-.31†
ΔR^2		.08*	.06
Step 3	G3 RPB	.61***	.16
	G2 RPB	.27*	-.31†
	G1 RPB	-.05	-.01
ΔR^2		.00	.00
Total R ²		.50	.06

† $p < .10$; * $p < .05$; ** $p < .01$; *** $p < .001$

considered as predictors. As expected, the amount of variance explained was nevertheless greater when the young adults' RPB was considered among the predictors, probably because of shared method variance.

Far less continuity was observed for control in the two models. Both when self-reports (SPB) and when the perceptions of received parenting behaviour (RPB) were considered as predictors, the amount of explained variance was low and the coefficients were mostly non significant. Moreover, the tendency for G2's RPB to be a negative coefficient suggesting discontinuity in controlling behaviour between G3 and G2 (RPB) and young adults' intentions regarding controlling behaviour towards their offspring.

Discussion

The main objective of the current study was to test the hypothesis of a childrearing tradition across three generations of respondents. In particular, the hypothesis of modest to moderate continuity in supportive and controlling childrearing behaviour was tested. The hypothesis that the way that young adults plan to behave as future parents is predicted by both their parents' and grandparents' parenting behaviour was also tested. These hypotheses were only partly verified.

When the same respondent was considered, i.e. when a respondent assessed both the parenting behaviour he had received from his parents and his own parenting behaviour, the correlations supported moderate to high continuity in supportive behaviour, with correlations ranging from .52 to .65, as well as in controlling behaviour, with correlations ranging from .50 to .63. As discussed below, however, there was an exception for the young adults,

who showed a complete absence of correlation between the controlling parenting behaviour they had received and the controlling behaviour they planned to display towards their children in the future. As expected, when two different respondents were considered, i.e. each assessing his own parenting behaviour towards his children, the correlations were lower, but were still moderate, with coefficients ranging from .22 to .45 for support and from .19 to .21 for control. Contrary to what was expected, the correlations between G1 and G3 supportive parenting behaviour were in the same range as those between consecutive generations for supportive parenting, i.e. .43. For controlling parenting, however, the coefficient was far lower, in fact negative, between G1 and G3, i.e. $-.14$.

The same impression of continuity of supportive parenting was given by the regression models, where we sought to predict how young adults would plan to behave as parents in the future. This was predicted by the parents' parenting behaviour and also by the grandparents' parenting behaviour over and above the parents' effect. However, the parenting behaviour that the grandparents reported having received was not related to the young adults' planned childrearing behaviour. Again, the amount of explained variance was higher when the young adults' report of their parents' behaviour was taken into account. But the same main conclusions of continuity across the three generations can be drawn from the two models, even when the shared method variance problem was controlled for. Interestingly, the grandparents' generation contributed significantly to explaining the young adults' report on their intentions to provide supportive parenting. Contrary to what was supposed, the predictive power of the grandparents' parenting behaviour was even higher than that of the parents when different respondents were considered in each generation.

For controlling parenting, however, the results of the regression models suggest a certain discontinuity across the three generations. Even when the young adults' report of their parents' behaviour was taken into account, i.e. with the potential shared method variance problem, the predictive value was nil. Moreover, a clear cut-off between the young adults' and the grandparents' generations appeared, with negative coefficients being reported in the second steps of the models. In sum, the results of both the correlations and the regression analyses suggested a greater continuity in supportive behaviour than in controlling behaviour in parenting. How can this difference be explained? It can be conjectured that the socialisation experiences of the three generations differed much more with regard to controlling than to supportive behaviours. Warmth, autonomy demands, monitoring, involvement and establishment of guidelines in childrearing have probably been considered as socially desirable throughout the last eight decades. These parenting behaviours may have formed part of a shared representation of "how to be a good parent" across the

three last generations. Conversely, various social developments and public debates concerning children's rights and child abuse, including the introduction of laws prohibiting spanking in several European countries, have probably modified the desirability and the perception of harsh discipline, ignoring or rewarding in the last decades. Such modifications could in turn induce discontinuity in controlling childrearing behaviour from one generation to the next.

The main methodological limitation of cross-sectional studies based on single informants has been stressed. Such studies produce a shared method variance problem that potentially diminishes their suitability for testing the intergenerational transmission hypothesis. The double collection of data in the present study, in which each respondent assessed both his parents' behaviour and his own childrearing behaviour, made it possible to overcome this problem to some extent. We were able to confirm some of the results obtained from one respondent using results obtained from others. Nevertheless, the high coefficient in the regression model between young adults' parenting intentions and their perception of their parents' childrearing behaviour stressed the importance of the subjects' appraisal of the warmth and involvement they were exposed to. The way they report their interactions with their parents is actually a determinant of their intentions to parent supportively. The inter-informant comparisons research indeed stressed the relevance of children's reports of their parents' childrearing behaviour (Tein, Roosa, & Michaels, 1994). Children's reports have been shown to differ significantly from those of their parents (Schwarz, Barton-Henry, & Pruzinsky, 1985). Children's reports were considered as more relevant than parents' reports for predicting children's outcomes (Gaylord, Kitzmann, & Coleman, 2003). Children's views on their parents' childrearing behaviour may influence how they behave toward their parents and, in turn, how they interact with peers. In Patterson's (1982) theory, children's perceptions of parenting could predict social competence and behaviour toward peers (Anan & Barnett, 1999; Rigby, 1993).

Interestingly, the same conclusions cannot be drawn for controlling parenting. It seems that the determinants of the young adults' intentions to parent in a controlling way lie somewhere other than in the subjects' appraisal of the controlling behaviour of the previous two generations.

While interesting, this study is by no means definitive. Several questions remain, for example about specific patterns of transmission according to gender in each of the three generations of respondents. Gender-related differences are particularly critical in cross-generational research, as the way in which parents and their children influence each other is known to be partly a function of their gender. For example, mothers parent boys and girls differently, and boys and girls behave differently depending on whether they are

interacting with their mothers or their fathers. The small sample size also made it necessary to ignore important socio-demographic variables likely to influence parenting, such as family composition. For example, support and control could be influenced by whether a parent is solely responsible for a child's upbringing or shares that responsibility with another parent. Parenting behaviours may also be influenced by whether a parent is responsible for a single child's upbringing, or whether the child experiences parenting behaviours together with siblings. Our data did not allow this question to be considered. Further studies including numerous male and female respondents from three generations are needed to go beyond these limitations. Also, in the regression model we tried to predict the young adults' intentions regarding their parenting behaviour, and not their actual parenting behaviour. The implications of having considered the views of young adults who are not themselves parents could be that rather than having predicted the intergenerational transmission of parenting behaviour, we have predicted the young adults' beliefs about ideal parenting, based on the parenting behaviour of the previous two generations. Finally, the fact that the participants were recruited at university limits the generalisability of the results, which mainly concern families from a middle-to-high socio-economic status. Replication studies with families from different socio-economic backgrounds would be interesting in the future.

In conclusion, in a cross-sectional study conducted among three generations of respondents we tested the hypothesis of a childrearing tradition within non clinical families and found some arguments in favour of continuities, in particular for supportive rather than for controlling parenting. This outcome suggests that parenting behaviour tends to be similar from one generation to the next, and even across two non-consecutive generations. Despite methodological concerns about the cohort effect, the correlational nature of the data and the retrospective design, it can be argued that the similarities that have been found result from the influence of the parenting individuals have received on the way they themselves parent. Our results also suggest that such an influence may be higher for childrearing attitudes such as warmth that have consistently been regarded as desirable, than for those that have been regarded as more controversial in society, such as harsh discipline.

References

- Anan, R.M., & Barnett, D. (1999). Perceived social support mediates between prior attachment and subsequent adjustment: A study of urban African American children. *Developmental Psychology*, 35(5), 1210-1222.
- Bailey, J.A., Hill, K.G., Oesterle, S., & Hawkins, J.D. (2009). Parenting practices and problem behavior across three generations: Monitoring, harsh discipline, and

- drug use in the intergenerational transmission of externalizing behaviour. *Developmental Psychology*, 45(5), 1214-1226.
- Bandura, A. (1977). *Social learning theory*. Oxford, England: Prentice-Hall, Oxford.
- Belsky, J. (1984). The determinants of parenting: A process model. *Child Development*, 55(1), 83-96.
- Belsky, J., Jaffee, S.R., Sligo, J., Woodward, L., & Silva, P.A. (2005). Intergenerational transmission of warm-sensitive-stimulating parenting: A prospective study of mothers and fathers of 3-year-olds. *Child Development*, 76(2), 384-396.
- Champagne, F.A., & Meaney, M.J. (2007). Transgenerational effects of social environment on variations in maternal care and behavioral response to novelty. *Behavioral Neuroscience*, 121(6), 1353-1363.
- Chen, Z.-Y., & Kaplan, H.B. (2001). Intergenerational transmission of constructive parenting. *Journal of Marriage and Family*, 63(1), 17-31.
- Conger, R.D., Neppl, T., Kim, K.J., & Scaramella, L. (2003). Angry and aggressive behavior across three generations: A prospective, longitudinal study of parents and children. *Journal of Abnormal Child Psychology*, 31(2), 143-160.
- Egeland, B., Jacobvitz, D., & Sroufe, L.A. (1988). Breaking the cycle of abuse. *Child Development*, 59(4), 1080-1088.
- Field, E. (Ed.). (2009). *Discovering statistics using SPSS (3rd edition)*. London: Sage.
- Gaylord, N.K., Kitzmann, K.M., & Coleman, J.K. (2003). Parents' and children's perceptions of parental behavior: Associations with children's psychosocial adjustment in the classroom. *Parenting: Science and Practice*, 3(1), 23-47.
- Hu, L., & Bentler, P.M. (1999). Cutoff criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modeling*, 6(1), 1-55.
- Hunter, R.S., & Kilstrom, N. (1979). Breaking the cycle in abusive families. *The American Journal of Psychiatry*, 136(10), 1320-1322.
- Itkin, W. (1952). Some relationships between intra-family attitudes and pre-parental attitudes toward children. *The Pedagogical Seminary and Journal of Genetic Psychology*, 80, 221-252.
- Kerr, D.C.R., Capaldi, D.M., Pears, K.C., & Owen, L.D. (2009). A prospective three generational study of fathers' constructive parenting: Influences from family of origin, adolescent adjustment, and offspring temperament. *Developmental Psychology*, 45(5), 1257-1275.
- Kim, J. (2009). Type-specific intergenerational transmission of neglectful and physically abusive parenting behaviors among young parents. *Children and Youth Services Review*, 31(7), 761-767.
- Kitamura, T., Shikai, N., Uji, M., Hiramura, H., Tanaka, N., & Shono, M. (2009). Intergenerational transmission of parenting style and personality: Direct influence or mediation? *Journal of Child and Family Studies*, 18(5), 541-556.
- Meunier, J.C., & Roskam, I. (2007). Psychometric properties of a parental childrearing behavior scale for French-speaking parents, children, and adolescents. *European Journal of Psychological Assessment*, 23(2), 113-124.
- Patterson, G. (1982). *Coercive family process. A social interactional approach (Vol. IV)*: Eugene, OR: Castalia Publishing.

- Peña, C.L.J., & Champagne, F.A. (2012). Epigenetic and neurodevelopmental perspectives on variation in parenting behavior. *Parenting: Science and Practice, 12*(2-3), 202-211.
- Putallaz, M., Costanzo, P.R., Grimes, C.L., & Sherman, D.M. (1998). Intergenerational continuities and their influences on children's social development. *Social Development, 7*(3), 389-427.
- Rigby, K. (1993). School Children's Perceptions of Their Families and Parents as a Function of Peer Relations. *The Journal of Genetic Psychology, 154*(4), 501-513.
- Roskam, I., & Meunier, J.C. (2012). The determinants of parental childrearing behavior trajectories: The effects of parental and child time-varying and time-invariant predictors. *International Journal of Behavioral Development, 36*(3), 186-196.
- Schwarz, J.C., Barton-Henry, M.L., & Pruzinsky, T. (1985). Assessing child-rearing behaviors: A comparison of ratings made by mother, father, child, and sibling on the CRPBI. *Child Development, 56*(2), 462-479.
- Simons, R.L., Whitbeck, L.B., Conger, R.D., & Wu, C.-i. (1991). Intergenerational transmission of harsh parenting. *Developmental Psychology, 27*(1), 159-171.
- Staples, R., & Smith, J.W. (1954). Attitudes of grandmothers and mothers toward child rearing practices. *Child Development, 25*(2), 91-97.
- Tein, J.-Y., Roosa, M.W., & Michaels, M. (1994). Agreement between parent and child reports on parental behaviors. *Journal of Marriage and the Family, 56*(2), 341-355.
- Van Ijzendoorn, M.H. (1992). Intergenerational transmission of parenting: A review of studies in nonclinical populations. *Developmental Review, 12*(1), 76-99.
- Van Leeuwen, K.G., & Vermulst, A.A. (2004). Some psychometric properties of the Ghent parental behavior scale. *European Journal of Psychological Assessment, 20*(4), 283-298.
- Vermulst, A.A., de Brock, A.J.L.L., & van Zutphen, R.A.H. (1991). Transmission of parenting across generations. *The psychology of grandparenthood: An international perspective*. (pp. 100-122). Florence, KY, US: Taylor & Francis/Routledge, Florence, KY.
- Woods, P.J., Glavin, K.B., & Kettle, C.M. (1960). A mother-daughter comparison on selected aspects of child rearing in a high socioeconomic group. *Child Development, 31*(1), 121-128.

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