

# Intergenerational Exchange in the UK\*

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## Abstract

In this paper, I analyse recent survey data on the exchange of practical support and assistance between adult children and their non-coresident parents. Using latent class analysis, three types of exchange relationship are identified: (1) those who rarely exchange assistance with their parents (low-level exchangers), (2) those who regularly exchange assistance with their parents (high-level exchangers), and (3) those who give support to their parents (givers). Since low-level exchangers account for three fifths of the sample, the overall level of intergenerational exchange in contemporary UK is much lower than that reported in previous studies. However, the associations between latent class membership and standard covariates are broadly consistent with previous research. Members of the three latent classes report broadly similar level of subjective well-being and received comparable level of social support when all sources are taken into account. This suggests that givers and low-level exchangers are able to find substitutes from other types of personal relationships for practical support. Finally, I discuss the discrepancy between the findings of this paper and those of earlier studies in the context of historical research on family and kinship in England.

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# 1 Introduction

There is an important tradition of British community studies in the 1950s and the 1960s (e.g. Firth, 1956; Dennis *et al.*, 1956; Mogeys, 1956; Young and Willmott, 1957; Kerr, 1958; Willmott and Young, 1960; Stacey, 1960; Rosser and Harris, 1965; Bell, 1968). Based on ethnographic as well as survey data, these studies provide a vivid account of the close family ties that existed in those communities at that time. The closeness of family ties arose partly out of necessity, but it was also a matter of choice. Thus, for example, because of the post-war housing shortage, many young couples had no choice but to stay with one set of parents (usually the bride's) for a period of time (Young and Willmott, 1957, ch.2). But when they managed to set up their own household, many would prefer to live near their parents (see also Mogeys, 1956, pp.54–55; Rosser and Harris, 1965, pp.214–215). Young and Willmott (1957) reported that more than two thirds of their respondents in Bethnal Green lived within two or three miles of their parents. In this working class neighbourhood in East London, the mother–daughter bond was especially strong, with over half of the married women reported seeing their mother the day before the interview, and 80 per cent within a week. Young and Willmott (1957, p.61) claimed that '[after marriage] the daughter continues to live near her mother. She is a member of her extended family. She receives advice and support from her in the great personal crises and on the small domestic occasions'. Very similar results were reported by Rosser and Harris (1965, pp.218–219).

But it would seem that social change was already afoot. Young and Willmott (1957, ch.9) argued that suburbanisation was weakening the extended family. And in a companion study, they reported that extended family ties were weaker among the middle class (Willmott and Young, 1960).<sup>1</sup> Extrapolating the trends of 'counterurbanisation' (Champion, 1989, pp.87–90) and the growth of middle class occupations (Goldthorpe and Mills, 2004, pp.195–197) in the UK since the 1960s, we should expect intergenerational links to have weakened.

Indeed, other social changes in the past few decades are also relevant. For example, there is considerable evidence that young adults from divorced families often feel less close to, and have less contact with, their father (Cooney, 1994; Booth and Amato, 1994; Furstenberg Jr. *et al.*, 1995; Grundy, 2005; de Graaf and Fokkema, 2007). Given the sharp increase in the divorce rate

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<sup>1</sup>To be more precise, the thesis that Willmott and Young (1960, p.78) advanced is at once stronger and more specific. They argued that social mobility 'creates a barrier inside the family only for men, not for women'. Subsequent research in the US had found little evidence supporting the mobility thesis (see e.g. Litwak, 1960).

since the late 1960s, we might also expect a weakening of intergenerational ties.

Also relevant is the growing affluence in the postwar period. Affluence affects personal relationships in subtle and intriguing ways (Offer, 2006). But, at the minimum, affluent societies offer market alternatives to the services and assistance provided by the extended family. For example, paid nannies might stand in for grandparents over childcare. As British society becomes more affluent, intergenerational ties might weaken correspondingly.

However, despite these social trends, recent studies often conclude that the extended family has remained strong in the UK. For example, McGlone *et al.* (1999) have compared data from the British Social Attitudes Surveys of 1986 and 1995. They report a general decline in the frequency of contact with kin and best friend over time, and this decline is ‘particularly true of contact with parents and children’ (McGlone *et al.*, 1999, p.146). Nevertheless, they also claim that ‘the family remains an important source of help, especially for young families’ McGlone *et al.* (1999, p.154). Similarly, Grundy (2005, p.233) analyses data from a retirement survey conducted in 1994 and reports that ‘between two thirds and three quarters of parents were involved in some sort of exchange relationship with at least one of their children’. She also notes that this exchange relationship is strongly reciprocal, and that children are responsive to their parent’s needs.

Further, in a study designed to replicate Rosser and Harris (1965), Charles *et al.* (2008, p.120) note that ‘[Rosser and Harris] found . . . that support was widely exchanged [within the extended family], and our findings, more than 40 years later, paint a very similar picture’. More generally, they conclude that ‘the character of family life and of the relationships formed by those who do ‘do’ family in Swansea in 2002 is remarkably similar to that reported by Rosser and Harris for Swansea in 1960 and by Young and Wilmott for Bethnal Green in 1957’ (Charles *et al.*, 2008, p.xii).

Given the apparent discrepancy between empirical evidence and theoretical expectation, my goal in this paper is to use recent data from the British Household Panel Survey (BHPS) to ascertain just how much intergenerational exchange there is between adult children and their non-coresident parents in contemporary UK. Do they regularly exchange practical help with each other? And who are more likely to be involved in such exchange relationship? I shall also consider the implications of intergenerational exchange for personal well-being. Are individuals *less* involved in intergenerational exchange socially more isolated? Could they find support from other types of personal relationship?

To anticipate a key finding of my analysis, the overall level of intergenerational exchange in the UK at the turn of the twenty-first century is much

lower than that reported in previous sociological studies. I shall discuss the discrepancy of findings in the concluding section of the paper. Unfortunately, lacking comparable and nationally representative survey data from earlier periods, it is impossible to carry out a systematic analysis of change over time, and my discussion in the concluding section is unavoidably speculative in nature. But by taking a longer historical view, I shall place my results in the context of findings of historians and historical demographers.

## 2 Data and method

In 2001 BHPS respondents were asked whether they have relatives of various kinds who were *not* living with them. Those with a non-coresident mother and/or a non-coresident father were then asked about their parents' age, whether their parents live together, how far away their parents live, and how often they keep in touch by visit, telephone and email. But most relevant for our present purpose, respondents were also asked 'Nowadays, do you regularly or frequently *do* any of the things listed on this card for your parents? ... And do you regularly or frequently *receive* any of the things listed on this card from your parents?' The eight types of assistance on the relevant card are shown in Table 1.<sup>2</sup>

Table 1: Percentage of respondents who regularly exchanged help of various types with non-coresident parents ( $N = 4,394$ ).

	giving	receiving
a Giving them (you) lifts in your (their) car	26.5	12.2
b Shopping for them (you)	18.2	9.5
c Providing or cooking meals	9.2	13.4
d Helping with basic personal needs like dressing, eating or bathing (Looking after your children)	2.1	21.7
e Washing, ironing or cleaning	5.5	6.4
f Dealing with personal affairs, e.g. paying bills, writing letters	12.4	3.3
g Decorating, gardening or house repairs	18.9	9.4
h Financial	5.5	13.2

<sup>2</sup>Of the 2,862 respondents with two non-coresident parents, 647 reported that their parents were not living together at the time of the interview. Unfortunately, for this group of respondents, the relevant BHPS questions did not specify with which parent the respondents exchanged help.

It should be noted that the BHPS questions refer to the exchange of service or assistance, not frequency of contact or emotional closeness. Also, the exchange is of a material kind rather than advice or moral support which is less costly. Finally, the exchange has to be ‘regular or frequent’. Thus, these questions are quite demanding. The response to the sixteen items of Table 1 form the basis of the following analysis. Typically, in quantitative analyses of data of this type, the various kinds of help (and the giving and receiving of help) are treated as *separate* dependent variables (see e.g. Ermisch, 2004; Grundy, 2005). This analytical strategy has the important advantage of being sensitive to possible differences in the determinants of the various types of exchange. For example, while large geographical distance would make it difficult to help kin with daily domestic chore, it should be less of a barrier to sending or receiving financial aid.

An alternative strategy would treat the sixteen items of Table 1 as indicators of an underlying structure of intergenerational exchange, and the goal of this strategy is to uncover this latent variable (Hogan *et al.*, 1993; Silverstein *et al.*, 1997). This strategy also has its advantages. First, as a latent variable technique, it explicitly allows for measurement error in the data. Thus, although all indicators are measured with some degree of error, together they give us a more reliable picture of the underlying construct of interest. Secondly, as a data reduction procedure, it bypasses the need of presenting (and discussing) sixteen separate regressions, and allows us to focus on the associations between the underlying variable and covariates of interest. Finally, this approach reveals which types of exchange tend to go together, and since we consider both the giving and receiving of assistance, it directly incorporates the notion of reciprocity in the model. Given these advantages, I shall adopt the second strategy in this paper.<sup>3</sup>

Specifically, I apply latent class models to the response to the items of Table 1, as reported by adult children aged 25 to 54 ( $N = 4,394$ ).<sup>4</sup> Latent class analysis can be regarded as the categorical counterpart of factor analysis. The basic idea is to capture the association that exists among the observed categorical indicators through a small number of discrete latent classes. In effect, this association is regarded as resulting from a mixture of types within

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<sup>3</sup>I have also carried out separate regressions for individual items of exchange. These are reported in Tables 9 and 10 in Appendix B.

<sup>4</sup>Intergenerational exchange as reported by adult children is likely to be different from that as experienced and reported by the parents. I shall consider the parents’ experience in a companion paper. I have also repeated the analysis of this paper with a smaller sample of adults who live with their own children ( $N = 2,446$ ). The results obtained for that restricted sample are essentially the same as those reported here. Details are available on request.

the population studied, so that if these types can be identified and separated as latent classes, then conditional on membership of these classes, the indicators will become statistically independent of each other. This principle of ‘local independence’ is key to all latent variable analyses, including latent class models (McCutcheon, 1987).<sup>5</sup>

The object of analysis of latent class models is the cross-tabulation formed by the observed indicators. In the present case, the binary response to the sixteen items of Table 1 form a 16-way contingency table with 65,536 (i.e.  $2^{16}$ ) cells. But since there are only 4,394 respondents, this contingency table is clearly too sparse to support reliable analysis. Some preliminary data reduction is therefore necessary. In considering which items to combine, I am guided mostly by the pairwise association of the items. It can be seen from Table 8 in Appendix B that the odds ratios between items ‘b’ (shopping), ‘c’ (providing or cooking meals) and ‘e’ (washing, ironing and cleaning) are relatively high in relation to both giving and receiving of help. Thus, these three items are combined to form a single indicator of ‘domestic help’.<sup>6</sup> I am also guided by the wordings of the items. Since item ‘f’ uses paying bills as an example of dealing with personal affairs, it is combined with item ‘h’ to form a single indicator of ‘financial aid’. Having combined these items, we now have a much smaller 10-way contingency table with 1,024 ( $2^{10}$ ) cells, which forms the basis of the following analysis.

## 3 Results

### 3.1 Latent class measurement model

Table 2 shows that the overall level of intergenerational exchange in contemporary UK is rather modest. At a maximum, 27 per cent of the respondents regularly give their parents a lift in their car. At the low end, only 2 per cent of the respondents regularly help their parents with dressing, eating or bathing, which suggests that most parents in our sample are in good health

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<sup>5</sup>Thus, if there are three observed categorical variables  $A$ ,  $B$ ,  $C$  with  $I$ ,  $J$  and  $K$  categories respectively, a latent class model with  $T$  classes can be expressed as follows:

$$\pi_{ijk}^{ABC} = \sum_{t=1}^T \pi_t^X \pi_{it}^{A|X} \pi_{jt}^{B|X} \pi_{kt}^{C|X},$$

where  $\pi_t^X$  is the probability that a person belongs to latent class  $t$ ,  $\pi_{it}^{A|X}$  is the probability that this person is found at level  $i$  of  $A$  given membership in latent class  $t$ , and so on.

<sup>6</sup>A positive response from any of the three items would mean a positive response for the combined indicator of ‘domestic help’.

and thus do not require help of an intensive personal kind. If we were to consider any kind of help, then 44 per cent of the respondents regularly give assistance to their parents, and almost the same proportion (43 per cent) regularly receive parental help. What is not clear from Table 2 are: (1) which kinds of help tend to go together, and (2) to what extent the giving and receiving of help is reciprocal. To answer these questions, we now turn to latent class analysis.

Table 2: Percentage of respondents who regularly exchanged help with non-coresident parents ( $N = 4,394$ ).

	giving	receiving
lift in car ('a')	26.5	12.2
domestic help ('b', 'c', 'e')	22.2	20.2
personal care or childcare ('d')	2.1	21.7
financial aid ('f', 'h')	15.5	14.4
decorating, gardening and house repair ('g')	18.9	9.4
Any help (i.e. items 'a' to 'h')	43.6	42.6

Note: letters in parentheses refer to original BHPS items, see Table 1.

When latent class models are fitted to our data, a fairly straightforward pattern can be discerned. Table 3 shows that we cannot reject a model postulating three latent classes by the conventional standard of 5 per cent of type I error.<sup>7</sup> I report the solution of this three-class model in Table 4. It can be seen that members of the first and largest latent class, which accounts for 60 per cent of the sample, have relatively low probability of exchanging help with their parents. Indeed, their probabilities of giving or receiving help are, almost without exception, much lower than those of the other two latent classes. For example, as regards giving parents a lift, the probabilities for latent class 1, 2 and 3 are 0.06, 0.51 and 0.67 respectively.

Table 3: Goodness of fit statistics of latent class measurement model as applied to data on intergenerational exchange.

#latent class	$G^2$	$df$	$p$	BIC
1	5176.26	1013	0.00	-3320.78
2	1837.40	1002	0.00	-6567.37
3	1029.70	991	0.19	-7282.80

Members of the second latent class constitute just over one fifth of the

<sup>7</sup>A four-class model would overfit the data, with  $G^2 = 772$  for  $df = 980$  and  $p = 1$ .

sample (22 per cent). Compared with those in the first latent class, they are much more likely to be involved in intergenerational exchange, though the balance of the exchange is tilted somewhat in favour of receiving help, especially when receiving help with childcare ( $p = 0.52$ ) is compared to giving intensive personal care to parents ( $p = 0.01$ ). Indeed, members of the second latent class are most likely of all to have received parental support and assistance. Finally, for members of the third latent class, who make up 18 per cent of the sample, the flow of help generally goes from the respondents to their parents.

Given these patterns of intergenerational exchange, I shall refer to the three latent classes as ‘low-level exchangers’ (Ls), ‘high-level exchangers’ (Hs) and ‘givers’ (Gs) respectively. Overall, our latent class analysis shows that in contemporary UK the exchange of support and assistance between adult children and their parents is rather limited, at least when compared to results reported in previous research.<sup>8</sup> Perhaps this is a real social change since the 1950s. But other interpretations are also possible. I shall return to this issue in the concluding section of this paper.

Table 4: Relative size of the latent classes and the conditional probabilities of giving and receiving help.

		latent class		
		1 (L)	2 (H)	3 (G)
	relative size	0.601	0.219	0.180
giving	lift in car	0.057	0.505	0.666
	domestic help	0.010	0.385	0.729
	personal care	0.000	0.009	0.105
	financial aid	0.049	0.164	0.500
	decorating, etc.	0.063	0.270	0.513
receiving	lift in car	0.022	0.472	0.034
	domestic help	0.034	0.668	0.197
	childcare	0.116	0.517	0.188
	financial aid	0.062	0.380	0.134
	decorating, etc.	0.037	0.327	0.003

<sup>8</sup>See Appendix A for an alternative approach to classify the respondents which validate our latent class solution.

### 3.2 Characterising the latent classes

Who belong to which latent class? To answer this question, we need to introduce covariates into the analysis. This can be achieved in several ways. In this paper, I employ the method of modal latent class assignment (Goodman, 2007), which works as follows. First, I calculate, on the basis of our preferred latent class solution (cf. Table 4), the probability of our respondents belonging to each of the three latent classes, conditional on their responses to the ten indicators.<sup>9</sup> All individuals with a particular response pattern are then assigned to the same latent class—that to which they have the highest, or modal, conditional probability of belonging. With the respondents then distributed among the three latent classes, I then investigate the association between latent class membership and covariates of interest, using the multinomial logistic regression model.

Assigning individuals to modal latent classes inevitably introduces error into the data, no matter how high the modal probabilities are, and the relative sizes of the latent classes after modal assignment could differ quite significantly from those estimated from the measurement model. However, in our present case, just under 10 per cent of the respondents would be missclassified, which is a modest level.<sup>10</sup> Since measurement errors tend to attenuate the association between variables, the statistical association reported below can be regarded as *conservative estimates*.

Descriptive statistics of the covariates are reported in Table 5.<sup>11</sup> Much of this table is self-explanatory, but it should be noted that social class is measured in terms of a five-fold version of the Goldthorpe class schema, and in cases where both parents are present, parent’s class (age) is taken as the ‘higher’ social class (age) of the two.

Table 6 reports the parameter estimates and standard errors of a multinomial logistic regression in which latent class membership is the dependent variable. It can be seen that, consistent with past research which suggests

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<sup>9</sup>Thus, suppose there are three observed categorical variables  $A$ ,  $B$  and  $C$ , the conditional probability that someone belongs to latent class  $t$  given that this person is at level  $i$  of  $A$ , level  $j$  of  $B$  and level  $k$  of  $C$  is given by the following expression:

$$\pi_{tijk}^{X|ABC} = \frac{\pi_t^X \pi_{it}^{A|X} \pi_{jt}^{B|X} \pi_{kt}^{C|X}}{\sum_{t=1}^T \pi_t^X \pi_{it}^{A|X} \pi_{jt}^{B|X} \pi_{kt}^{C|X}}.$$

<sup>10</sup>Post-assignment, the relative sizes of the latent classes are 0.604, 0.206, and 0.191 respectively, compared with 0.601, 0.219 and 0.180 in the measurement model (see Table 4).

<sup>11</sup>Unfortunately, there is no information on parent’s health status. I will, however, be able to include such information in the companion paper which considers intergenerational exchange from the parent’s point of view.

Table 5: Descriptive statistics

	%		%
male <sup>a</sup>	45.8	no siblings <sup>a</sup>	10.5
female	54.2	siblings	89.5
married/cohabiting <sup>a</sup>	82.1	No child at home <sup>a</sup>	46.1
div/sep/wid	8.4	Youngest child 0–4	24.1
never married	9.5	Youngest child 5–15	29.9
London & South <sup>a</sup>	36.4	distance (<30 min) <sup>a</sup>	61.4
Rest of England	47.8	distance (30–60min)	11.4
Wales	5.1	distance (60–120min)	9.8
Scotland	9.5	distance (>120min)	17.4
Northern Ireland	1.2		
respondent’s social class		parent’s social class	
I+II (salaried) <sup>a</sup>	38.9	I+II (salaried) <sup>a</sup>	32.0
III (routine nonmanual)	22.1	III (routine nonmanual)	20.0
IV (self-employed)	8.0	IV (self-employed)	11.4
V (foremen, technicians)	7.2	V (foremen, technicians)	9.2
VI+VII (manual workers)	23.8	VI+VII (manual workers)	27.5
parents live together <sup>a</sup>	50.4	good health <sup>a</sup>	72.9
parents separated	14.7	fair health	19.0
only mother	25.7	poor health	8.1
only father	9.2		
		mean	sd
parent’s age		66.8	9.4
annual household income <sup>b</sup>		33.6	23.2

Note: <sup>a</sup> reference category; <sup>b</sup> in thousand of pounds.

that women are kin-keepers (Rossi and Rossi, 1990, p.14), female respondents are more likely to be involved in intergenerational exchange, either as high-level exchangers or as givers. The magnitude of the gender association is quite large: the odds of women being givers rather than low-level exchangers is 76 per cent ( $e^{.567} - 1$ ) higher than that of men.

Married or cohabiting respondents are less likely to be involved in intergenerational exchange. Compared to them, people of other marital statuses are more likely to be high-level exchangers rather than givers or low-level exchangers; and singles are also more likely to be givers rather than low-level exchangers. The substantive magnitude of the associations with marital status is, for the most part, comparable to that of gender.

Next, we consider two sets of variables which, in part, measure the respondents' need for support and assistance. First, respondents with children are more likely to be high-level exchangers rather than low-level exchangers or givers. The magnitude of these children parameters is again substantial. Having a child aged 0 to 4 raises the odds of being a high-level rather than a low-level exchanger by about 91 per cent ( $1 - e^{.646}$ ).

Respondents in fair health are also more likely than those in good health to be high-level exchangers rather than low-level exchangers or givers. Since high-level exchangers are recipients of parental assistance, the children parameters and the health parameters suggest that parents are sensitive to our respondents' needs.<sup>12</sup>

Respondents with siblings are more likely to be low-level exchangers rather than high-exchangers or givers. This suggests that siblings are able to share out the responsibility of care for parents (see also Spitze and Logan, 1991). But note that this finding is *not* consistent with the strategic bequest argument which posits that in order to compete for potential parental bequests, people with siblings will have to be more attentive to their parents (Bernheim *et al.*, 1985).<sup>13</sup>

There is very little regional difference in the pattern of intergenerational exchange. With London as the reference category, only two of the twelve regional parameters of Table 6 are statistically significant at the conventional 5 per cent level. This is mainly because we have controlled for 'distance to parents' in the model. Without the distance parameters, then six of the eight

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<sup>12</sup>The parameters for poor health are of the same sign as those for fair health, and in the H v L and G v L contrasts, they narrowly fall short of statistical significance with  $p = .07$  and  $p = .09$  respectively. This could be due to the relatively small number of respondents reporting poor health (see Table 5).

<sup>13</sup>Although it is not clear in this paper whether parents with more children receive more support than those with fewer children, we shall be able to address this question in the companion paper, see note 4 above.

Table 6: Multinomial logistic regression model: latent class of exchange relationship as the dependent variable.

	H v L		G v L		G v H	
	$\hat{\beta}$	<i>s.e.</i>	$\hat{\beta}$	<i>s.e.</i>	$\hat{\beta}$	<i>s.e.</i>
female	.514**	.105	.567**	.118	.053	.138
never married	1.189**	.179	.627**	.232	-.562*	.246
div/sep/wid	.741**	.171	.223	.194	-.518*	.215
Youngest child 0–4	.646**	.124	-.019	.156	-.666**	.175
Youngest child 5–15	.425**	.118	-.114	.126	-.539**	.150
fair health	.351**	.119	-.095	.146	-.446**	.163
poor health	.343	.187	.336	.196	-.006	.225
siblings	-.785**	.150	-.548**	.162	.237	.182
Rest of England	.123	.110	-.070	.123	-.193	.146
Wales	.393	.222	.433	.247	.040	.276
Scotland	.571**	.165	.260	.199	-.311	.221
Northern Ireland	.606	.522	1.415**	.482	.808	.561
distance (30–60min)	-.899**	.160	-.774**	.174	.124	.215
distance (60–120min)	-1.683**	.217	-1.166**	.201	.517	.276
distance (>120min)	-2.176**	.195	-2.230**	.218	-.053	.281
class III	.012	.131	-.114	.154	-.126	.175
class IV	-.053	.196	.220	.211	.274	.251
class V	.011	.190	.005	.226	-.006	.258
class VI+VII	.015	.137	-.021	.156	-.036	.181
log household income	-.116	.069	.054	.098	.170	.107
parent–class III	.202	.135	.177	.166	-.024	.188
parent–class IV	.086	.161	-.087	.214	-.173	.237
parent–class V	-.055	.183	.526*	.203	.581*	.239
parent–class VI+VII	-.166	.134	.512**	.150	.678**	.176
parent’s age	-.023**	.005	.072**	.006	.095**	.007
parent separated	-.438**	.135	.681**	.161	1.119**	.183
only mother	-.330*	.153	1.148**	.138	1.479**	.173
only father	-.775**	.203	.041	.182	.816**	.243
constant	2.056*	.859	-6.872**	1.184	-8.928**	1.304

\*  $p < .05$ , \*\*  $p < .01$

regional parameters in the H v L and G v L contrasts would be significant and positive (though the four parameters in the G v H contrasts would remain insignificant). Thus, if Londoners are more likely to be low-level exchangers, it is because there are more inter-regional migrants in London, and their greater physical distance from their parents makes it less likely for them to be engaged in intergenerational exchange.

Although geographical distance from parents does not set givers and high-level exchangers apart, there is a monotonic association between physical distance and intergenerational exchange in the H v L and G v L contrasts. The further away one's parent is, the more likely one is a low-level exchanger (Grundy, 2005). The substantive magnitude of these associations is very large. For example, the odds of being a high-level rather than a low-level exchanger for those who live more than two hours away from their parent is about a tenth ( $e^{-2.176}$ ) of those who live within 30 minutes of their parent. Of course, we need to be careful about the direction of causality here. While geographical distance no doubt hampers intergenerational exchange, respondents might also *choose* where they live partly because of such considerations.<sup>14</sup>

Table 6 also shows that, social class and household income is not associated with latent class membership. This is inconsistent with previous research which reported stronger intergenerational ties among the working class (Young and Willmott, 1957; Willmott and Young, 1960). But, again, this is partly due to the distance parameters. If 'distance to parent' is dropped from the model, then the parameters for routine nonmanual workers (class III) and manual workers (class VI+VII) and the income parameter would become significant in the H v L contrast. In other words, routine non-manual workers, manual workers and low income respondents tend to have higher level intergenerational exchange partly because they tend to live closer to their parents.

Turning to social origin, compared with respondents of salariat (class I+II) origin, those with working class parents (class V and class VI+VII) are more likely to be givers rather than high-level or low-level exchangers. This finding is also inconsistent with the strategic bequest argument which would imply that resourceful salariat parents, who are more likely to have bequests to pass on, should receive more attention and assistance from their children. Quite the contrary, it would seem that because working class parents are less able to buy in services, our respondents are more attentive to their

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<sup>14</sup>The 'distance to parent' parameters account for about a third of the explained variance. If we remove these parameters from Table 6, then the Pseudo- $R^2$  of the regression would decline from .172 to .114.

needs.<sup>15</sup> This interpretation is corroborated by the parameters of parent's age, in which respondents with older parents are more likely to be givers rather than high-level or low-level exchangers, and they are more likely to be low-level exchangers rather than high-level exchangers.<sup>16</sup>

Parent's marital status also affects intergenerational exchange. Compared to those with two parents who live together, those with separated or divorced parents, and those with one parent, are more likely to be givers rather than high-level or low-level exchangers, and they are also more likely to be low-level exchangers rather than high-level exchangers (although the parameter for 'father only' is not significant in the G v L contrast).<sup>17</sup>

### 3.3 Does intergenerational exchange matter?

We have seen that, contrary to previous research, the overall level of intergenerational exchange in contemporary UK is rather low: 60 per cent of our respondents are low-level exchangers. But does intergenerational exchange matter? Are low-level exchangers socially more isolated? Could they find support and assistance from other sources? To address these questions, we turn to further questions on social support in the BHPS. In 2001, BHPS respondents were asked 'Is there anyone you could rely on to help you from *outside* your own household, ...'

- (a) if you were feeling depressed?
- (b) if you needed help finding a job for yourself or a member of your family?
- (c) if you needed to borrow money to pay an urgent bill like electricity, gas, rent or mortgage?

And there were five further questions on emotional support: 'Is there anyone who you can ...'

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<sup>15</sup>It could be argued that the strategic bequest argument applies only to resourceful parents who have bequests to pass on. In other words, we should see some interaction effects between class origin and the sibling dummy. But it turns out that when relevant interaction terms are added to the model, none of them is statistically significant.

<sup>16</sup>Recall that high-level exchangers are most likely to receive parental help. Further, because respondent's age is highly correlated with parent's age ( $r = .80$ ), I have not included respondent's age in the regression. But the results are largely the same as those reported here if respondent's age is left in the model.

<sup>17</sup>The interpretation of the parameter of separated/divorced parents is problematic, because as indicated in note 2 above, it is not clear from the BHPS questions with which parent the respondent is interacting. Furthermore, there is no information of the timing of parental separation which might be important in affecting subsequent parent-child interaction. Finally, we do not have information as to whether the widowed, separated or divorced parents have repartnered, which might also be relevant.

- (d) really count on to listen to when you need to talk?
- (e) really count on to help you out in a crisis?
- (f) totally be yourself with?
- (g) feel really appreciates you as a person?
- (h) really count on to comfort you when you are very upset?

Table 7: Percentage of respondents enjoying social and emotional support and mean reported GHQ score by latent class.

	L	H	G
a. depressed	83.4*	90.6	84.7*
b. find job	63.3*	71.7	63.2*
c. borrow money	78.3*	90.3	77.1*
d. listen	90.4*	95.0	92.4*
e. help in crisis	89.9*	95.9	91.8*
f. relax with	90.5*	94.3	92.2*
g. really appreciate you	89.2	92.0	88.6
h. offer comfort when upset	88.4*	94.5	91.5*
.....			
GHQ score (mean)	11.3*	11.8	11.7
GHQ score (s.d.)	5.6	5.9	5.6

See text for question wordings, \*  $p < .05$  for L v H and G v H contrasts (one-tail tests).

The top panel of Table 7 shows the percentage of respondents in the three latent classes who replied ‘yes’ to these questions. Three points are notable. First, the differences between low-level exchangers and givers are minimal. Secondly, compared with low-level exchangers or givers, high level exchangers are consistently more likely to report having someone who could provide practical or emotional support, and that these differences are mostly statistically significant at the conventional 5 per cent level. But, finally, the differences between the three latent classes are, in substantive terms, quite small. Consider item ‘c’ where the difference is largest: 90 per cent of high-level exchangers reported having someone from whom they could borrow money in order to pay an urgent bill. But at 78 per cent and 77 per cent respectively, quite a large majority of low-level exchangers and givers also reported having someone to whom they could turn for financial support. The differences between latent classes are even smaller for other items of Table 7.

A similar but, in fact, reversed pattern is observed for subjective well-being, as measured by GHQ (see bottom panel of Table 7).<sup>18</sup> On average, high-level exchangers have *higher* GHQ scores (i.e. they are *more* distressed) than low-level exchangers or givers, and the L v H difference is statistically significant at the 5 per cent level. However, in substantive terms, the differences between the three latent classes are again quite small (compare the differences in mean with the standard deviations). Thus, it would seem that intergenerational exchange does not matter very much, so far as our respondents' subjective well-being is concerned.<sup>19</sup>

## 4 Summary and discussion

The main findings of this paper are as follows. First, the overall level of intergenerational exchange in contemporary UK is much lower than those reported in previous research: 60 per cent of our respondents offer very limited practical support and assistance to their non-coresident parents, and they receive very little in return.

However, the associations between latent class membership and covariates reported in this paper are largely consistent with the findings of previous studies. For example, women are more likely than men to be kin-keepers, and there is evidence that our respondents and their parents are sensitive to each other's needs. Thus, respondents with children are more likely to be high-level exchangers. Also, respondents with working class parents are more likely to be givers. This last finding and the finding that respondents with siblings are more likely to be low-level exchangers are *not* consistent with the strategic bequest argument.

Finally, I show that although high-level exchangers receive higher levels of emotional and social support than givers or low-level exchangers, and that such differences are mostly statistically significant, the magnitude of these differences are, in substantive terms, rather small. Thus, the welfare implication of intergenerational exchange for adult children is limited. One interpretation of this result is that givers and low-level exchangers are able to find substitutes to non-coresident parents so far as assistance and support are concerned.

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<sup>18</sup>GHQ (General Health Questionnaire) score is a measure of overall subjective well being. It is derived from a battery of 12 questions, running from 0 (the least distressed) to 36 (the most distressed).

<sup>19</sup>In an OLS regression in which GHQ score is the dependent variable and the variables of Table 5 are controlled for, the latent class dummies are not statistically significant. Details are available on request.

Having summarised the main findings of this paper, let us consider why the overall level of intergenerational exchange in contemporary UK is lower than that reported in past research. First, it is worth repeating that the indicators used in this paper refer to *regular or frequent exchange of instrumental assistance*. Silverstein *et al.* (1997) have shown for the US that if, in addition to instrumental assistance, intergenerational solidarity (e.g. emotional closeness, similarity of opinions, geographical distance and frequency of contact) are also taken into account, then the estimated proportion of low-level exchangers would be smaller. This, they argue, suggests that there is a latent structure of intergenerational solidarity. That is, for many individuals, even if they are not actually giving or receiving instrumental assistance over a particular period, the *potential* for intergenerational exchange is still present. This seems reasonable and could well be true for the UK.<sup>20</sup> However, it should be noted that high levels of *instrumental* assistance were reported in many of the UK community studies. Thus, there remain some discrepancy in findings to be explained.

Of course, it is possible that the community studies fifty years ago and the BHPS are both unbiased record of their time. Indeed, the extended family ties in the UK might have weakened over the intervening years as a result of the social trends discussed in Section 1. Afterall, with the baby boom and low level of female labour force participation, the 1950s was demographically unusual in many ways. However, since we do not have a nationally representative study of intergenerational relationship from the 1950s, there is quite simply no reliable benchmark against which the results of the present study could be compared. The conjecture of a real historical change remains untested.

At this point, it would be instructive to take a longer view. There is strong historical evidence that in nineteenth century England (and before) adult children did not give all that much material support to their parents. Thomson (1984) acknowledges that the Poor Law statute of 1601 (and its 1834 amendment) stipulated that it was the responsibility of individuals to support relations in need. But he then notes that legal and social reality was quite different from the letters of the law. First, in the 1840s, about half of all men and women in their sixties were in fact regularly maintained by the Poor Law at the expense of the local community. For those in their seventies, the proportion was even higher. Indeed, the Poor Law pensions were much more generous than that of the post-1945 British welfare state (Thomson, 1984, pp.267–268).

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<sup>20</sup>Unfortunately, there is no information on emotional closeness or similarity of opinions in the BHPS. Thus, I cannot replicate the analysis of Silverstein *et al.* (1997) in this paper.

Secondly, the legal obligations of individuals to support their elders were limited in many ways. For example, in-laws incurred no obligation: ‘a woman’s obligation toward her parents ceased upon marriage, and her husband did not assume it for her . . . the obligation to help support the aged did not extend to grandchildren’ (Thomson, 1984, pp.268–269). Individual obligations were further circumscribed by the way in which the Poor Law was implemented. ‘The petitioner for assistance had . . . to prove actual destitution before the magistrates. Being poor in relation to a child’s immense wealth was insufficient . . . A person who was even partially self-supporting in old age could not be judged as destitute and impotent, and no liable relative could be compelled to contribute towards the maintenance of the elder’ (Thomson, 1984, pp.269–270).

Finally, having reviewed court records of Poor Law authorities, Thomson (1984, p.273) notes that ‘nineteenth-century men who fathered bastard children, who deserted their wives or families, or who had lunatic relatives being maintained at public expense in asylums were prosecuted, fined and imprisoned with regularity and in considerable numbers . . . But there were no prosecutions for failure to maintain parents’. These evidences lead Thomson (1991, p.199) to conclude that ‘quite simply, it was “unenglish” behaviour to expect children to support parents’, and that ‘making children support parents was alien and offensive to English society’ (Thomson, 1991, p.200).<sup>21</sup>

Similarly, in a paper on how unfortunate individuals, especially the young and the old, could look to their kin for support, Laslett (1988, p.164) maintained that ‘[in England in] the late eighteenth and early nineteenth centuries . . . transfers to the poor through the collectivity were much more important than resources reaching them from kin outside their own families’. By the ‘collectivity’, Laslett (1988, p.154) meant ‘friends and neighbours, along with the church and charitable institutions, as well as the village, town or state’, i.e. non-kin. Indeed, echoing Thomson, Laslett (1988, p.166) argued that ‘effective kin relation in [pre-industrial] England did not usually go beyond a person’s immediate family. The potential value of the wider kin network as an insurance against misfortune . . . seems to have been of little or no significance’.

Reher also comes to the same conclusion. He regards the Poor Laws as epitomising a ‘structural characteristic of English society’, where ‘the ultimate responsibility for the wellbeing of the elderly fell to the collectivity’ (Reher, 1998, p.209). More generally, summarising the findings of numer-

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<sup>21</sup>See Anderson (1971, pp.177–179 esp) for further evidence and argument as to why the ‘traditional’ working class communities as described in the community studies might be a historical anomaly.

ous studies in historical demography, he argues that within Western Europe there are ‘areas where families and family ties are relatively strong, and others where they are relatively weak . . . Scandinavia, *the British Isles*, the Low Countries, much of Germany and Austria . . . [are] characterized by weak family links, and the Mediterranean region by strong family ties’ (Reher, 1998, p.203, emphasis added). This regional contrast, he further suggests, has ‘deep historical roots’, going as far back as ‘the latter part of the Middle Ages’, and the Reformation and Counter-Reformation also played their parts (Reher, 1998, pp.210–214).

What should we make of these arguments? It seems to me that if Thomson, Laslett, Reher, and other historical demographers and historians of the family were right about English society in the past, then two points would follow. First, we should be wary of simplistic linear views of history. Insofar as support for the elderly is concerned, intergenerational exchange in England did not change from strong to weak over the past half-century. Rather, they have been comparatively weak for perhaps centuries. The social processes outlined in Section 1 might have further weakened family ties in the UK, but, it must be said, from an already weak starting level.

Secondly, perhaps what needs to be explained is not so much why intergenerational exchange is so low in 2001, but why it was so high in the community studies of the 1950s and 1960s. And here a finding of this paper might provide a clue. Specifically, recall that geographical distance to parents is very strongly associated with the intergenerational exchange (see Section 3.2 and Table 6 above). As the samples of the community studies were drawn from localities where adult children and their parents lived in close proximity, they would be biased towards finding strong intergenerational ties. In other words, the community nature of these studies might have inadvertently led to sampling by the dependent variable. And we should be skeptical of the extent to which they were representative of British society at that time.<sup>22</sup>

I have suggested three reasons for the discrepancy in results: (1) the stringent nature of the indicators used in this paper, (2) real historical change over the past half-century, and (3) sampling bias of the community studies. Given the nature of the data that is available to us, it is impossible to determine which of these reasons is true. Perhaps all three apply to some degree. In any event, it seems to me that the accepted view that strong extended family ties still prevail in the UK would need to be quite seriously qualified.

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<sup>22</sup>See also Platt (1971, ch.3) for methodological critique of Young and Willmott (1957), Willmott and Young (1960) and other community studies.

## A An alternative classification procedure

An alternative, though admittedly ad hoc, classification of our respondents can be achieved by simply counting the number of items of help (‘a’ to ‘h’ of Table 1) that they exchange with their parents. Thus, in relation to both giving and receiving, each respondent has a ‘score’ that is between 0 and 8. It turns out that, as regards giving help to parents, 56 per cent of our respondents score 0, 17 per cent score 1, and 26 per cent score 2 or higher. As for receiving help, 57 per cent of our respondents score 0, 20 per cent score 1, and 23 per cent score 2 or higher. If we then take the ad hoc decision and consider 0 and 1 as low scores and 2 to 8 as high scores, we could then crosstabulate the two dichotomised variables and form a  $2 \times 2$  table. Using this classification, 61 per cent of the respondents are low on both giving and receiving, 16 per cent are high on giving but low on receiving, 13 per cent are high on receiving and low on giving, and 10 per cent are high on both giving and receiving. If we consider the last two categories as comparable to the high-level exchangers of our latent class solution, then the relative size of the latent classes determined by the two methods are remarkably similar. Further, only 8 per cent of the sample are classified differently under the two schemes. (Further details available on request.) This alternative classification has the virtue of being straightforward. But it is not based on any statistical model and it rests on rather ad hoc decisions. Nonetheless, this approach serves to validate our latent class solution.

## B Supplementary tables

Table 8: Pairwise association of BHPS items of intergenerational exchange.

	a	b	c	d	e	f	g	h
a lift		9.11	5.95	3.79	4.58	6.57	6.66	3.75
b shopping	9.77		9.71	4.06	10.77	12.08	5.24	4.84
c cooking	5.81	11.84		3.02	9.95	7.02	4.30	4.14
d care	4.28	31.14	17.79		3.24	2.77	3.16	2.86
e washing	3.32	22.65	17.96	34.82		7.66	5.89	2.96
f personal	4.86	8.81	5.63	11.54	9.28		4.45	12.79
g decorating	4.52	5.61	3.64	5.87	5.02	4.27		3.17
h finance	2.78	3.60	3.14	4.11	3.78	6.58	3.55	

Note: Lower triangle refers to help given to parents, and upper triangle refers to help received from parents.

Table 9: Logistic regression of having given help of various kinds to parents

	lift	shopping	cooking	care	washing	personal	house	financial	any help
age	-.033**	-.005	.001	.024	.019	-.004	-.026*	-.001	-.024**
female	.419**	.724**	.989**	1.007**	1.877**	.386**	-.683**	-.214	.213*
never married	.245	.591**	.519*	1.026	.588	.107	.244	-.051	.281
div/sep/wid	.053	.403*	.328	.800*	.516*	-.116	.181	-.280	.052
Youngest child 0–4	.062	.064	.174	.408	-.056	-.105	-.293*	-.003	-.008
Youngest child 5–15	-.139	-.065	.036	.411	.079	-.101	-.026	-.094	-.139
fair health	-.130	.102	.049	-.102	.234	.171	-.016	-.018	.140
poor health	.077	.491**	.432*	.435	.207	.036	.282	.498	.054
siblings	-.183	-.513**	-.807**	-.930**	-.499*	-.446**	-.066	-.016	-.268*
Rest of England	-.046	.143	-.069	.176	.087	.018	-.016	.048	.038
Wales	.229	.613**	.314	.373	.609	.152	.352	.436	.263
Scotland	.358**	.477**	.069	.086	-.247	.108	.004	.335	.334*
Northern Ireland	.628	.722	1.240**	1.364	.920	.664	.953*	.507	.916*
distance (30–60min)	-.891**	-.444**	-.502*	-.401	-.435	-.414*	-.519**	-.337	-.858**
distance (60–120min)	-1.108**	-.908**	-.869**	-.878	-1.087**	-.753**	-.964**	.078	-1.030**
distance (>120min)	-2.570**	-1.794**	-1.426**	-2.462*	-.711*	-1.206**	-1.275**	.110	-1.792**
class III	.072	.316*	-.158	.695	.235	-.284	-.036	-.539*	-.049
class IV	.131	.436*	.001	1.233*	1.387**	-.234	.437*	.042	.143
class V	-.002	.133	-.091	.606	.842*	-.482	.488**	-.308	.139
class VI+VII	-.021	.234	-.180	1.396**	1.022**	-.647**	.384**	-.357	.033
log household income	.242**	.007	-.038	.108	-.160	-.046	-.061	.165	-.038
parent–class III	.391**	.225	.242	.144	-.220	.377*	.048	.266	.412**
parent–class IV	.282	.190	.249	-.247	-.191	.494*	-.102	.664*	.252
parent–class V	.475**	.511**	-.001	.598	.125	.601**	.027	.857**	.367*
parent–class VI+VII	.397**	.452**	-.109	.203	-.291	.776**	-.076	.474	.380**
parent’s age	.043**	.048**	.024*	.083**	.027	.037**	.042**	.016	.048**
parent separated	.077	.224	.370	-.477	.421	.558**	.028	.543*	.199
only mother	.450**	.652**	.610**	.303	.226	1.055**	.832**	.780**	.844**
only father	-.374*	-.080	.770**	-.138	.939**	.520**	-.065	.469	-.070
constant	-5.184**	-5.346**	-3.745**	-13.139**	-5.619**	-4.189**	-2.358**	-6.173**	-2.161**
$R^2$	.114	.128	.097	.193	.155	.096	.093	.043	.112

\*  $p < .05$ , \*\*  $p < .01$

Table 10: Logistic regression of having received help of various kinds from parents

	lift	shopping	cooking	care	washing	personal	house	financial	any help
age	-.042**	-.036*	-.044**	-.056**	-.035*	-.086**	-.059**	-.050**	-.051**
female	.412**	.714**	-.025	.462**	.406*	-.089	.395**	.105	.436**
never married	.436*	.297	.985**	.500	1.242**	.879**	.300	.827**	1.040**
div/sep/wid	.516**	.665**	.776**	.526*	1.162**	1.306**	.534*	.849**	.716**
Youngest child 0-4	.046	.205	.119	4.011**	.271	-.119	-.020	.593**	.936**
Youngest child 5-15	.342*	.031	-.296*	3.722**	-.402*	.427	.034	.393**	.753**
fair health	.397**	.300	.158	-.068	.297	.265	.057	.294*	.042
poor health	.438*	.950**	.396*	-.273	.838**	.355	.068	.500**	.212
siblings	-.523**	-.564**	-.370*	-.152	-.769**	-.211	-.574**	-.409*	-.507**
Rest of England	.090	.180	.018	.250*	.272	.493	.092	.025	.114
Wales	.064	.176	.431	-.183	.504	.633	.153	.240	.330
Scotland	.622**	.465*	.372*	.387*	.257	.898**	.650**	.245	.641**
Northern Ireland	.116	-.990	.541	.562	-.466	.401	.371	-1.470	-.214
distance (30-60min)	-.747**	-.828**	-.694**	-.951**	-.424	-.832*	-.462*	-.361*	-.915**
distance (60-120min)	-1.252**	-1.265**	-1.065**	-1.756**	-1.349**	-.769	-.990**	-.744**	-1.404**
distance (>120min)	-1.809**	-1.696**	-1.500**	-2.550**	-1.091**	-1.266**	-1.306**	-.539**	-1.921**
class III	.146	.024	.106	-.011	.187	.079	-.286	.243	.045
class IV	-.305	.071	-.086	-.222	-.162	.453	-.517	.117	-.263
class V	.227	.364	-.427	-.295	-.178	.616	-.339	.211	-.111
class VI+VII	.244	-.096	-.230	-.326*	-.144	.144	-.397*	.321*	-.022
log household income	-.153*	-.188*	-.046	.068	.200	-.193*	-.076	-.339**	-.167*
parent-class III	.096	.026	.061	.143	-.577**	-.534	.097	-.471**	-.110
parent-class IV	.127	.094	.250	-.142	-.023	-.012	.389*	-.262	.081
parent-class V	-.198	-.007	-.014	-.064	-.195	-.433	-.315	-.379	-.006
parent-class VI+VII	-.297	-.044	-.195	-.156	-.476*	-1.114**	-.089	-.573**	-.221
parent's age	-.030**	-.004	.002	.004	-.011	.019	-.018	.026**	.006
parent separated	-.520**	-.250	-.397*	-.606**	-.340	-.179	-.725**	-.229	-.551**
only mother	-1.220**	.047	-.024	-.127	.266	-.165	-2.053**	-.047	-.376**
only father	-.874**	-.430	-.915**	-.941**	-1.394**	-.160	-.527*	-.115	-.851**
constant	3.543**	1.260	.674	-2.659*	-2.247	.318	2.801**	1.798	3.323**
$R^2$	.150	.111	.095	.364	.113	.117	.131	.082	.179

\*  $p < .05$ , \*\*  $p < .01$

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