

What is the Scale of Multiple Deprivation in the European Union?

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Abstract

The social exclusion perspective has focused attention on the processes leading to exposure to multiple disadvantage and social isolation. Despite the influence the perspective has had on both academic and policy discussions, conceptual analysis has remained imprecise and empirical evidence modest. Advocates of the social exclusion perspective have frequently criticised poverty analysis for being static and uni-dimensional. However, these are by no means necessary features of poverty analysis and in this paper we have made use of the ECHP in order to examine the extent to which persistent income poverty results in multiple deprivation and social isolation. Our analysis shows that, even if we apply a somewhat more restricted definition of multiple deprivation than that which features in the social exclusion literature, only a rather modest proportion of the persistently poor can be characterised as being exposed to such deprivation. Furthermore, while persistent poverty and multiple deprivation combine to produce extremely high levels of economic strain, there is no evidence that they interact in a significant fashion. Finally, there is very little evidence that the persistently income poor are socially isolated. In our conclusion we argue that understanding deprivation is not facilitated by focusing on a cleavage between a multiply deprived and excluded minority and a comfortable majority and develop the policy implications of this argument.

1. Introduction

The process by which people come to be exposed to multiple deprivation and a progressive rupturing of social relations has been a central concern of the social exclusion literature. Thus, Paugam (1996a) focuses on the process leading from precarity to social exclusion or as Paugam (1996b) labels it the 'spiral of precariousness'. The need to move from a static definition of poverty based solely on income to a dynamic and multi-dimensional perspective was stressed. Increasing concern with multiple disadvantage has also been reflected in the prominence that the term "social exclusion" has come to have in British policy making. Referring to speeches by the Prime Minister Tony Blair and the then Minister without Portfolio Peter Mandelson, Kleinman (1998:7) concludes the term is being employed to denote multiply deprived groups, trapped in cycles of fatalism, concentrated in the worst housing estates and at risk of transmitting their fate across generations. As he observes, one consequence of employing the term social exclusion to denote multiply deprived groups is that it defines the key social cleavage as between a comfortable majority and an excluded social isolated minority. This tendency is also stressed in Room's (1999: 171) discussion of notions of continuity and catastrophe in the social exclusion literature.¹

Attempts to grapple with the changing nature of social stratification have thus provoked increased reference to the emergence of multiple disadvantage, which is qualitatively different from that formerly associated with working-class disadvantage or with the exposure to poverty. At the same time as the shift from a unidimensional to multidimensional perspective, from static to dynamic analysis and to an emphasis on relations have become defining characteristics of the social exclusion perspective, the volume of research documenting the nature and extent of multiple disadvantage has been rather modest and has focused largely on the effects of unemployment and employment precarity on social isolation (Paugam, 1996 a & b, Paugam and Russell, 2000).

In view of this it is regrettable that much of the treatment of social exclusion overstates both the novelty of emphasising multiple disadvantage and the limitations of traditional

poverty analysis. In relation to the first issue, a variety of studies have shown the danger of assuming rather than establishing multiple disadvantage by demonstrating that a relatively weak relationship exists between income poverty and deprivation. A substantial proportion of those on low incomes not suffering deprivation. Furthermore, as Heath (1981) stresses, if we wish to document the existence of multiple deprivation, we have to go beyond the degree of association between variables for the population as a whole and demonstrate the scale of overlap at the extremes. With regard to the second issue, it is necessary to point out that panel analysis of income data has led the way in highlighting poverty dynamics and persistence and in offering an opportunity to assess the consequences of sustained exposure to poverty (Bane and Ellwood, 1984, Duncan, 1984). The availability of such data in the European Community Household Panel (ECHP) data set now offers the opportunity to connect questions relating to income poverty persistence to those relating to multiple or overlapping disadvantage and thus allow us to assess the extent to which notions of spirals of precariousness resulting in patterns of multiple disadvantage are useful or appropriate.

In this paper drawing on the first three waves of the ECHP we seek to establish the extent to which persistent poverty, multiple disadvantage and social isolation go hand in hand. In particular we will address the following questions.

- What is the extent of persistent poverty and how does it vary across country?
- How is persistent poverty related to different types of life-style deprivation?
- What is the scale of multiple deprivation experienced by the persistently poor?
- How do those exposed to persistent poverty and multiple deprivation experience their economic circumstances?
- To what extent is persistent poverty associated with social isolation?

This analysis avoids the charges frequently addressed at poverty research of being static and unidimensional and will offer an opportunity to assess the advantages and limitations of an emphasis on multiple disadvantage.

2. Data

The results presented in this paper are based on the User Data Base (UDB) containing data from Wave 1,2 and 3 of the ECHP as released for public use by Eurostat. The unit of analysis is the individual and we work with the sub-sample present in each of the waves.² Since our analysis relates to eleven countries this gives an overall sample of 131,335.³ The income measure employed is total disposable income, including transfers and after deduction of income tax and social security contributions, with the household taken as the income recipient unit. The principal accounting period for income employed in the ECHP is the previous calendar year: with the Wave 1 survey carried out in 1994, the Wave 2 in 1995 and the Wave 3 in 1996 this means the income measures relate to calendar years 1993, 1994 and 1995 respectively.⁴

Since a given level of household income will support a different standard of living depending on the size and composition of the household, we adjust for these differences using equivalence scales. The scale we employ at this point is often termed the “modified OECD” scale: where the first adult in a household is given the value 1, with this scale each additional adult is given a value of 0.5 and each child a value of 0.3.⁵ We thus calculate the number of equivalent adults in each household using this scale, and construct equivalised income by dividing household income by this number. Equivalised income of the household is then attributed to each member, assuming a common living standard within the household, and our analysis is carried out using the individual as the unit of analysis. A change in the equivalised income of a particular individual over time may thus reflect either a change in the total income coming into the household, or a change in the number of adults and children depending on it, or both. Assessing the extent of income poverty persistence involves comparing the equivalised incomes reported in 1993, 1994 and 1995. Our analysis is thus restricted to individuals residing in households that were present in all three waves.

3. The Extent of Persistent Income Poverty

In the first two columns of Table 1 we show the distribution of income poverty at 60% and 70% of median income in 1995 for individuals present in all three waves, across the eleven countries in our analysis. At the 60% line the poverty rate ranges from lows of

11% in Denmark and the Netherlands to in excess of 20% in Greece and Portugal. The other countries are found in a narrow range running from 15% to 19% with France, Germany and Belgium at the lower end of the range and Ireland, Spain and the UK at the upper end.⁶ A rather similar pattern is found for the 70% line with Denmark and the Netherlands having rates below twenty per cent while the Portuguese rate reaches 30%. All of the remaining countries are found in the range running from 22% to 28%. However, in this case Belgium, Ireland and the UK are less sharply differentiated from the Southern European countries. The distribution of poverty is broadly in line with median levels of income with the lowest rates arising in relatively prosperous countries such as Denmark and the Netherlands and the higher rates in Southern European countries.

Table 1: Income Poverty in 1995 and Persistent Income Poverty 1993-95 at 60% and 70% of Median Income by Country

	% Poor 1995		% Persistently Poor 1993-1995	
	60%	70%	60%	70%
Germany	15.5	22.6	7.1	11.5
Denmark	10.9	17.8	3.1	6.3
Netherlands	10.7	19.4	3.4	9.1
Belgium	16.2	23.8	7.6	13.8
France	15.4	24.2	6.8	12.4
U. K.	18.9	27.3	7.8	15.0
Ireland	18.0	28.5	7.5	15.8
Italy	17.0	23.8	8.9	14.1
Spain	18.2	25.1	8.7	13.8
Greece	20.8	27.8	10.5	15.3
Portugal	21.7	29.7	13.3	19.0

In columns 3 and 4 we show the percentages exposed to poverty in all three years.⁷ Across countries between one third and just over one half of those below the 60% median income line in 1993 remained poor in all three years. As a consequence the observed level of persistent poverty varies from a low of 3% in Denmark and the Netherlands to 13% in Portugal. Despite such variation the level of persistent poverty at this line falls in the narrow range running from 7% to 11%. At the 70% line the degree of persistence between 1993 and 1995 is somewhat higher than for the 60% line running as it does from a low of just over 40% percent to a high of almost two thirds. Denmark and the Netherlands again display the lowest levels of persistence but in this case the Danish rate

of 6% is significantly lower than the Dutch rate of 9%. Portugal once again has a distinctively high rate of 19%. As in the earlier case, relatively modest variation is observed across the remaining countries with the degree of poverty running from 12% to 16%. From Table 1 it can be seen that level of poverty persistence at 70% of median income is relatively close to the distribution of cross-sectional poverty in 1993 at 60% of median income, although the former rates are on average slightly higher. Given that the 60% line is the one most often preferred when analysing cross-sectional poverty, we have chosen in our subsequent analysis to focus on persistent poverty at the 70% line. However, our main substantive conclusions are not dependent on the choice of line.

4. Persistent Poverty and Life-style Deprivation

In this section we begin our analysis of the degree of association between persistent poverty and life-style deprivation. In particular, we ask whether those who were poor for three years are likely to have suffered multiple additional forms of deprivation. Deprivation here means being denied the opportunity to have or do something through an inability to obtain the goods, facilities, and opportunities to participate identified as generally appropriate in the community in question.

Whelan *et al* (forthcoming) identify 23 items in the ECHP data set which could serve as indicators of deprivation defined in this fashion. Application of factor analysis revealed that the items involved five distinct dimensions of deprivation. Cross-country analysis comparing solutions constrained to be equal across country with those allowing cross-national variation and allowing confirmed the consistency of the structure of deprivation across individual countries. The dimensions identified were as follows.

- Basic life-style deprivation - comprising items such as food and clothing, a holiday at least once a year, replacing worn-out furniture and the experience of arrears for scheduled payments.
- Secondary life-style deprivation - comprising items that are less likely to be considered essential such as a car, a phone, a colour television, a video a microwave and a dishwasher.

- Housing facilities - housing services such the availability of a bath or shower, an indoor flushing toilet and running water likely to be seen as essential.
- Housing deterioration - the existence of problems such as a leaking roof, dampness and rotting in window frames and floors.
- Environmental problems - problems relating to noise, pollution, vandalism and crime, and inadequate space and light.⁸

For our purposes we use a weighted version of this measure in which each individual item is weighted by the proportion of households possessing that item in each country. As a consequence deprivation of an item such as a video recorder will be counted as a more substantial deprivation in Denmark as compared to Greece. This would clearly be unsuitable for the purposes of comparison of absolute levels of deprivation across countries.⁹ However, our purpose in the present paper is explicitly relative. As a consequence our dependent variables are in each case constructed by taking the deviation from the national mean divided by the corresponding standard deviation. Thus we are looking at the impact of persistent poverty on individuals' *relative* positions in their own country in relation to current life-style deprivation.

In Table 2 we show the correlations across countries of these standardized scores weighting for population size.¹⁰ The highest correlation by far is between the basic and secondary dimensions where a value of 0.446 is observed. For some purposes it may make sense to think of the basic and secondary dimensions in hierarchical terms with the former involving a more extreme type of deprivation. However the correlation between the dimensions is far from perfect. Many households that are currently exposed to basic deprivation may have acquired a range of consumer durables over time. Furthermore, for some households work location or family factors may make possession of a car an essential, even at the cost of foregoing items that appear to be more essential. Similarly, for households with low levels of resources, TV and video may comprise both their main and cheapest form of entertainment. Correspondingly, households that currently have enough resources to avoid basic deprivation may continue to enjoy relatively restricted access to consumer durables. With regard to the remaining correlations what is striking is

just how low they are. The next highest correlations are between the housing deterioration and environmental problems dimensions where a correlation of 0.241 is recorded and between basic deprivation and housing deterioration where the level of association is 0.233. Leaving aside the basic-secondary relationship, the average inter-item correlation is 0.156. In evaluating these correlations we should keep in mind that the available measures are intended to tap deprivation rather than standard of living thus we do not have information on the *value* of consumer durables or housing. Even so the pattern of association is a great deal weaker than one might expect on the basis of a priori expectations arising from the extent to which multiple deprivation has come to be emphasised in the social exclusion literature. However, as we noted earlier what is crucial establishing in multiple deprivation is not just the overall pattern of association but also the extent to which deprivation overlaps at the extreme.

Table 2: Matrix of Correlations Between Life-style Deprivation Dimensions

	<i>Basic</i>	<i>Secondary</i>	<i>Housing Facilities</i>	<i>Housing Deterioratio n</i>	<i>Environment al Problems</i>
Basic					
Secondary	0.446				
Housing Facilities	0.118	0.127			
Housing Deterioration	0.233	0.167	0.137		
Environmental Problems	0.195	0.129	0.057	0.241	

In pursuing this issue, in Table 3, for each of the deprivation dimensions and for each country, we show the difference in terms of standardized scores between those persistently poor and all others. We have presented the results in this form both because of our specific theoretical interest in this group and because of the practical need to compress our results. However, the deprivation differences reported in Table 3 arise from a gradual increase in deprivation as exposure to poverty lengthens. The most striking differences between the persistently poor and the rest of the population relates to the basic deprivation of food, clothing, furniture, holidays and inability to make routine payments. On average across the eleven countries the persistently poor have basic deprivation scores that are 0.89 standardized units higher than all others.¹¹ The smallest

difference of 0.30 is found for Denmark, which not only has a very low rate of poverty persistence but also exhibits a very weak impact of such persistence. For the remaining countries the observed range of differences is extremely narrow running from a low of 0.69 to 1.08. Thus the persistently poor are clearly differentiated in terms of their exposure to basic deprivation in a fashion that is strikingly similar across nations. For nine of our eleven countries the percentage of variation explained runs from 8.7% to 14.9%. The second dimension which most clearly differentiates the persistently poor is that relating to secondary deprivation which involves the enforced absence of a range of consumer durables such as microwave, colour TV, dishwasher, video and car. In every country the persistently poor display higher levels of secondary deprivation and on average their scores are 0.72 standardized units higher than all others. Once again the weakest effect is found in Denmark where the observed difference reaches only 0.32 standardised units. The Italian difference of 0.49 is also at the lower end of the range. For the remaining countries the disadvantage suffered by the persistently poor ranges from 0.68 to 0.91 and the percentage of variance explained ranges from 4.7% to 9.9%.

Table 3: Differences in Standardized Deprivation Scores between those Persistently Income Poor 1993-95 at 70% of Median Income and all others

	<i>Basic</i>	<i>Eta²</i>	<i>Secondary</i>	<i>Eta²</i>	<i>Housing Facilities</i>	<i>Eta²</i>	<i>Housing Deterioration</i>	<i>Eta²</i>	<i>Environmental Problems</i>	<i>Eta²</i>
Germany	0.69	.049	0.68	.047	0.25	.007	0.06	.000	0.05	.000
Denmark	0.30	.006	0.32	.002	0.41	.010	0.13	.001	0.02	.000
Netherlands	1.08	.097	0.79	.053	0.12	.001	0.50	.020	0.25	.005
Belgium	0.86	.087	0.82	.079	0.56	.037	0.27	.008	0.22	.006
France	1.06	.121	0.87	.081	0.44	.021	0.41	.019	0.21	.005
UK	1.00	.127	0.68	.059	0.58	.000	0.29	.010	0.21	.005
Ireland	1.06	.149	0.86	.099	0.34	.015	0.41	.022	0.56	.043
Italy	0.95	.111	0.49	.038	0.13	.002	0.25	.010	0.27	.012
Greece	1.03	.133	0.68	.060	0.70	.063	0.44	.025	0.12	.002
Spain	0.96	.108	0.91	.099	0.30	.010	0.39	.018	0.03	.000
Portugal	0.83	.108	0.79	.097	0.72	.081	0.41	.025	-0.01	.002
Average	0.89		0.72		0.41		0.26		0.18	

The persistently poor group are thus exposed to a degree of basic and secondary deprivation that sets them apart from all others. They also display higher scores on the housing facilities dimension, which comprises items relating to basic amenities such as hot running water, bath or shower and indoor flushing toilet. However, with the exception of Greece, Portugal and Denmark the differences are a good deal smaller than in the earlier cases. The average difference across countries is 0.41 standardized units and this falls to 0.35 if we omit Greece and Portugal. Aside from these latter countries the highest percentage of variance explained is 3.7% in Belgium. The trend towards a weaker relationship with persistent poverty continues with the housing deterioration dimension, which comprises items relating to damp, rot and leaking roof. The average difference in deprivation across countries is 0.26 and the percentage of variance explained reaches 2% in only three countries. Finally for the dimension relating to environmental problems, which comprises items pertaining to noise, pollution, space, light and vandalism, except in the case of Ireland, we find no relationship to persistent poverty. The average difference across countries is 0.18 and only in the case of Ireland does persistent poverty explain more than one per cent of variance.

Thus while persistent poverty is associated with higher deprivation across the range of dimensions the magnitude of such differences varies sharply across the dimensions. Multiple but modest association does not translate into multiple overlapping disadvantages. Thus, although it is beyond the scope of this paper to provide a comprehensive analysis of the determinants of each dimension, it is clear that rather different sorts of factors are involved in determining the different types of deprivation. Many who experience basic deprivation do not experience housing deprivation and *vice versa*. As a consequence, accounts of multiple disadvantage that assume very high levels of correlation between different types of deprivation will inevitably be seriously misleading. Where correlations between types of deprivation are modest the numbers exposed to multiple deprivation are inevitably a great deal less than those affected by any particular deprivation.

Before proceeding further we provide one more illustration of this point by focusing on one of the items from the cluster of environmental disadvantages that we have identified. A great deal of recent discussion of poverty and social exclusion has concentrated attention on the spatial concentration of disadvantage in areas or neighbourhoods and the manner in which isolation from mainstream values leads to behaviour and orientations which contribute to a vicious circle of deprivation.¹² In Table 4 we focus on the relationship between persistent poverty and the probability that one considers one's area to suffer from suffers from problems relating to vandalism and crime.¹³ It is clear that, with the exception of Ireland, there is no systematic relationship between persistent poverty and vandalism or crime. Furthermore the vast majority of the persistently poor do not report such problems in their area. Given the weakness of the observed association, variation across countries in the extent to which the persistently poor experience such problems largely reflects cross-national variations in the overall level. The highest figure is observed for the UK but even here almost 70% of the persistently poor fail to report such problems. In seven of the eleven countries this figure ranges approximately between seventy and eighty percent while in the remaining four it rises to between eighty five to ninety five per cent. The odds ratio which compares the odds in being in such an area for those persistently poor compare with all others ranges between 0.50 and 1.35 for ten of the eleven countries. Thus the persistently poor experience problems of vandalism or crime on a scale that reflects societal problems rather than any specific difficulties with persistent poverty as such. This of course does not preclude the existence of 'black spots' characterised by persistent poverty and chronic neighbourhood problems relating to crime and vandalism but it does imply that only a rather small minority of those exposed to such poverty will be found in such areas.

In order to extend our analysis of the degree of overlap between persistent poverty and the range of dimensions of life-style deprivation we take the numbers continuously below 70% median income between 1993-1995 as our initial benchmark of a deprived group. Then in each country for the relevant dimensions of deprivation, we create a threshold corresponding as closely as possible to the persistent poverty threshold. For example, in the UK where 15% are persistently poor we identify the point on the basis deprivation

dimension above which 15% of respondents in the UK are found. We can then ask the extent to which the persistently poor overlap with the corresponding segment of those experiencing extreme basic deprivation. In each case the degree of consistency can potentially range from zero to one hundred per cent. We are thus creating a series of relative deprivation thresholds corresponding to the persistent poverty threshold. As we increase the number of dimensions we can get an estimate of the extent to which persistent poverty is associated with multiple life-style deprivation. It should be clear from our earlier findings that were we to conduct such an analysis employing all five dimensions of life-style deprivation the numbers falling below the threshold on multiple dimensions would approach zero rapidly.

Table 4: Vandalism or Crime in Area by Persistent Poverty by Country

	<i>Number of Times Income Poor at 70% of Median 1993-1995</i>				<i>Odds Ratio for Persistently Poor v Others</i>
	0	1	2	3	
Germany	9.7	11.4	11.6	9.4	0.91
Denmark	9.6	13.2	11.7	7.1	0.66
Netherlands	18.4	19.5	18.1	23.5	1.35
Belgium	15.9	19.2	16.6	20.0	1.26
France	22.9	20.6	23.2	26.5	1.23
UK	24.6	29.5	33.4	31.9	1.29
Ireland	12.1	17.0	19.2	29.6	2.65
Italy	17.4	19.9	24.1	24.0	1.39
Greece	4.7	4.4	3.6	3.8	0.83
Spain	20.2	18.2	21.8	20.9	1.05
Portugal	27.7	17.8	17.7	14.3	0.50

Therefore in the analysis presented in Table 5 we concentrate on a more restricted version of multiple deprivation involving basic and secondary deprivation. Denmark once again represents a deviant case with only 17% of the persistently poor being found above either of the corresponding basic or deprivation thresholds and a mere 3% being located above both thresholds. However, leaving Denmark aside for the moment, we find that in the remaining countries between 40% to 56% of persistently poor individuals are above *either* the corresponding basic *or* secondary deprivation threshold. In fact nine of the eleven countries are in the range running from 46% to 56%. However, while only half of the persistently poor are exposed to either type of deprivation, their relative risk such exposure is extremely high since for the remaining respondents the risk level ranges between 14% and 22% in nine of the eleven countries.

When, however, we focus on the numbers fulfilling *both* conditions the numbers are a good deal lower and range from 13% in Greece and Spain to the low twenties in Belgium France, the UK and Ireland. These rates are extremely high in comparison with those who are not persistently poor. In the final column of Table 5 we show the odds ratios that capture the scale of such inequalities. Denmark is once again an outlier and displays the lowest odds ratio of less than three to one. For the remaining countries, with the exception of Portugal, the level of disparity in risk reaches at least six to one. Thus persistent poverty leads to a dramatic increase in the risk of multiple life-style deprivation. However, it remains true that the vast majority of the persistently poor do not experience multiple deprivation in the sense of being found above *both* the basic and secondary deprivation thresholds. It is a more common experience for this group to be located above one or other of the thresholds. This is the case for between one in four and just above one in three of respondents outside Denmark. Thus the risk of multiple life-style deprivation is substantially higher for the persistently poor but still is only a minority experience even for that group. Since this is true where the dimensions in question are moderately correlated, it is clear that this will hold with even greater force where an extremely weak degree of association exists between variables.

5. Economic Well-Being

In this section we wish to examine the extent to which the persistently poor, in addition to suffering higher levels of life-style deprivation, also regard their economic circumstances as being stressful. In order to do so we make use of responses to the following question from the ECHP data set. “Thinking now of your household’s total income from all sources and from all household members, would you say that your household is able to make ends meet?”.¹⁴ Respondents were offered six response categories ranging from “with great difficulty” to “very easily”. Here we focus on the percentage reporting “difficulty” or “great difficulty”. In Table 6 we show the relationship among the persistently poor between multiple deprivation and economic strain. In every case we find that persistent poverty substantially increases the risk of such strain. We should note the overall level of reported economic strain varies sharply across countries being, for example, particularly low in Germany and particularly high in Greece. The odds ratios reported in the final column of Table 6 provide a measure of association that is not sensitive to such absolute variations. The figures reported show the odds on reporting economic strain for the persistently poor who report multiple disadvantage compared with the comparable odds for the remainder of this group. However, the size of the coefficient for Greece shows the difficulty in calculating such a measure of association as the percentage reporting economic strain comes close to one hundred. Leaving Greece aside, we see the highest levels of association tend to be reported in Northern countries with relatively low overall levels of reported economic strain. Thus in the Belgium, Netherlands, Denmark and Germany the odds ranges between 9.2 and 12.1. For the remaining countries, apart from Spain, it varies between 4.5 and 8.5. Thus in every country there is a significant and substantial association among the persistently poor between multiple deprivation and economic strain. Relatively high levels of association are found in a number of countries where overall the level of economic strain is low. As a consequence cross country variation in reported economic strain among the persistently poor is substantially greater among those not experiencing deprivation than those exposed to multiple deprivation. Thus with the exception of Germany, in every case at least seventy per cent of the persistently poor who are also located above the basic and secondary thresholds report being under economic strain. However, the fact that the vast

bulk of this group experience economic strain does not necessarily imply that the impact of multiple deprivation is stronger among this group than other respondents. In fact, as is clear from column five of Table 6, the opposite is the case. With the exception of Greece, the odds ratio is consistently higher for the remaining respondents. This provides an example of a situation where the cumulative effect of a number of correlated disadvantages is rather less than one might have thought by looking at the bivariate relationships. Precisely because the persistently poor who are deprived still display relatively high levels of economic strain, the introduction of multiple disadvantage into the analysis produces a less sharp differentiation among the group than in the case of other respondents

In the final column of Table 6 we show the percentage of the persistently poor who are both multiply deprived and experiencing economic strain. Denmark and Germany have distinctively low rates of 2.3% and 7.6% respectively. For eight of the remaining countries the rate varies across the relatively narrow range of 12% to 16%. Ireland displays the highest rate at 20%. Thus while persistent income poverty is systematically associated with higher levels of multiple deprivation and economic strain. The highest level of observed overlap of the three dimensions involved only one in five of the poor while the median level is one in six.

Table 6: Economic Strain by Multiple Life-style Deprivation Among those Persistently Poor 1993-95 at 70% of Median Income:

	<i>Number of Deprivations</i>			<i>Odds ratio 2 v <2</i>		<i>% Of persistently poor who are multiply disadvantaged and experiencing economic strain</i>
	<i>0</i>	<i>1</i>	<i>2</i>			
	<i>%</i>	<i>%</i>	<i>%</i>	<i>for persistently poor</i>	<i>for other individuals</i>	
Germany	5.0	19.3	47.7	9.2	12.5	7.6
Denmark	15.2	35.7	69.2	10.1	24.1	2.3
Netherlands	17.9	58.5	83.6	10.5	28.0	12.3
Belgium	14.7	46.3	80.5	12.1	21.5	16.6
France	24.5	57.6	71.6	4.5	28.3	15.6
U. K.	16.2	44.0	72.3	6.7	14.2	14.9
Ireland	39.3	69.5	90.4	8.5	18.1	20.0
Italy	20.9	56.3	78.0	6.7	14.1	13.1
Spain	47.3	77.0	93.3	11.0	11.1	12.4
Greece	74.1	91.5	99.3	42.8	11.4	13.1
Portugal	40.6	64.3	85.8	5.7	11.1	16.5

Table 7: Exclusion from Social Relations Among those Persistently Poor 1993-95 at 70% of Median Income

	<i>Not member of club or organisation</i>		<i>Talk to neighbours less than once weekly</i>		<i>Meet people outside home less than once a week</i>	
	<i>%</i>	<i>Odds ratios for persistently poor versus others</i>	<i>%</i>	<i>Odds ratios for persistently poor versus others</i>	<i>%</i>	<i>Odds ratios for persistently poor versus others</i>
Germany	59.6	1.71	17.2	0.99	30.4	1.22
Denmark	46.1	1.31	33.1	1.19	24.5	1.37
Netherlands	67.6	1.79	35.3	1.06	19.4	1.24
Belgium	73.8	1.99	25.9	0.77	26.5	0.81
France	84.5	2.23	54.4	1.04	41.5	1.29
UK	64.2	1.73	12.8	0.69	15.6	1.06
Ireland	74.7	2.45	6.2	0.45	4.2	1.81
Italy	89.4	2.10	17.1	0.89	16.7	0.97
Greece	95.4	3.67	3.0	0.56	9.9	1.01
Spain	82.4	1.69	8.0	0.64	7.3	1.53
Portugal	92.3	3.62	7.1	0.51	29.8	1.44

Thus if multiple economic disadvantage were to be defined in terms of both the objective and subjective dimensions we have considered, in the vast majority of countries somewhere between one in nine and one in five of the persistently poor would satisfy the requirements.

5. Multiple Disadvantage and Social isolation

At this point we shift our focus from economic considerations to issues of social involvement and social isolation. What evidence is there that those exposed to income poverty over a period of time become detached from social networks and participate less actively in society? The range of indicators covering such issues in the ECHP is narrower than we would ideally like. In particular, it contains relatively little information on the quality of networks. However, given the limitations of the existing literature it still offers a valuable opportunity to examine the impact of persistent poverty on important aspects of social participation. From the available information in the ECHP data base we have constructed three indicators of social isolation. These are as follows.

- Not being a member of a club or an organization.
- Talking to neighbours less than once weekly.
- Meeting people outside the home less than once a week.

Before examining the relationship of persistent poverty to these indicators, we must enter a number of caveats. In the first place the format of items two and three differed in France from the remaining countries. This gives what is almost certainly a spurious impression of significantly higher levels of social isolation. In addition, even if we leave France to one side, substantial cross-national variation can still be observed on each of the items. To take the first item, not being a member of a club or voluntary organisation is nothing exceptional in most countries. In fact only in Denmark are a majority of the persistently poor members of clubs or organisations. In all countries persistent poverty is associated with lower membership. However, the degree of association is generally modest with the value of the odds ratio varying from 1.31 in Denmark to 3.62 and 3.67 in Portugal and Greece. Persistent poverty is associated with lesser opportunities to

participate in social life particularly in the poorest countries. However, it is difficult to construe such membership as a deprivation indicator having comparable meaning across societies and it does not allow us to differentiate sharply between the persistently poor and all others.

Substantial cross-country variation is also observed for our second indicator, which is 'talking to neighbours less than once weekly'. Leaving aside France, because of the difficulties with question format mentioned earlier, this is true of one third of our respondents in the Netherlands and Denmark and one in four in Belgium but of only one in six in Germany and Italy, one in eight in the UK, and less than one in ten in Ireland and the Southern European countries. Furthermore, in eight of the eleven cases the association between persistent poverty and social isolation is negative and for the remaining three the odds is only slightly greater than one. Thus contact with neighbours seems to have a great deal more to do with cultural variations across countries than degree of exposure to poverty within them. With our final indicator "meeting people outside the home less than once a week" we observe similar cross-country variation", although a relatively high value for Portugal means that the North-South pattern is not quite as clear. The relevant percentage varies from less than 10% in Ireland, Greece and Spain compared to at least one in four in Denmark, Belgium and Germany. Furthermore, although the odds ratio is positive in nine of the eleven cases, the degree of association is generally very modest. Taken together our set of indicators suggest that, to the extent to which they tap social isolation, and it would seem sensible to assume that this may vary significantly across country, persistent poverty contributes little to such isolation. Here our conclusion is in line with Gallie and Paugam (2000:269) who conclude, on the basis of a consideration of the impact of unemployment and labour market precarity in the ECHP countries, that sociability in societies has its "own distinctive dynamics with "longer-term historical roots in very different paths of economic and cultural development".

This does not exclude the possibility that those exposed to persistent poverty may suffer disadvantage in the quality of their networks in relation to factors such as access to

employment opportunities, although this should be established rather than assumed. However, our evidence does provide a case against any type of general argument linking multiple disadvantage with social isolation and should make us wary of vicious circle type arguments in which such isolation is a key mechanism.

6. Conclusions

The social exclusion perspective has focused attention on the processes leading to exposure to multiple disadvantage and social isolation. Despite the influence the perspective has had on both academic and policy discussions, conceptual analysis has remained imprecise and empirical evidence modest. Furthermore methodological issues relating to the analysis of multiple disadvantage, which have long pedigree have largely been ignored.

Advocates of the social exclusion perspective have frequently criticised poverty analysis for being static and uni-dimensional. However, these are by no means necessary features of poverty analysis and in this paper we have made use of the ECHP in order to examine the extent to which persistent income poverty results in multiple deprivation and social isolation. Our analysis shows that somewhere between four out of ten and two-thirds of those poor in 1993 remained in poverty in the following two years. These individuals clearly constitute prime candidates for exposure to multiple disadvantage and a spiral of precariousness. However, our analysis showed that even in case of life-style deprivation, where we might expect relationships to be most straightforward, the observed pattern does not conform to one of systematic multiple disadvantage. This is perhaps most vividly illustrated by the fact that, in general, the persistently poor are not a great deal more likely than others to consider that they live in areas affected by vandalism or crime and the vast majority of the poor do not live in such areas.

The impact of persistent poverty across life-style is variable and for a number of dimensions extremely modest. If we restrict attention to the two dimensions with which persistent poverty is most closely associated, the following conclusions emerge. In the vast majority of countries between one in eight and just over one in five of the

persistently poor experience both types of deprivation and between one in ten and one five also report suffering from economic strain. Furthermore, a substantial majority of those who are both persistently poor and multiply deprived experience such strain. However, this is not because multiply disadvantage has a more negative impact among the persistently poor than among others. Thus even by applying a somewhat more restricted definition of multiple deprivation than that which features in the social exclusion literature only a rather modest proportion of the persistently poor fulfill the requirements. Furthermore we find no evidence that such deprivation has distinctive consequences for the persistently poor.

Extending the analysis to incorporate housing and environmental dimensions would reduce the numbers of multiply deprived among the persistently poor to negligible levels. When we focus on social exclusion we are led to similar conclusions. To the extent to which the indicators we have employed capture social isolation, it appears to be influenced a good deal more by cross-national cultural variations than by persistent income poverty. Pictures of those exposed to continuous poverty as social isolated appear to be seriously misleading. This does exclude the possibility that they suffer additional disadvantages related to the quality of their social networks but this something rather different from social isolation or a rupturing of social networks. These findings may seem less surprising when we note the recent observation by Portes (2000:5) that the problem in poor inner city areas in the United states “is not that people do not know each other or help each other, but the resources to do so are so meagre and the social ties so insulated as to yield meagre returns”.

The analysis reported in this paper and in Whelan *et al* (2001) shows that persistent poverty is systematically related to a number of dimensions of deprivation although this varies across dimensions. By moving beyond current income we are able to make significant progress in resolving some of the issues associated with the fact that the relationship between current income and deprivation often appears to be remarkably low. However, that fact that persistent poverty exerts multiple influence does necessarily result in extremes of multiple disadvantage on any substantial scale. The relationships we

observe are probabilistic and, as is true in the social sciences as a whole, even what we consider to be strong relationships often involve modest levels of correlation. It is clear that a great many factors other than persistent income poverty play a role in determining deprivation and these factors will vary across dimensions.

Understanding deprivation cannot simply involve a focus on a cleavage between a multiply deprived and excluded minority and a comfortable majority. A more accurate picture is likely to be that painted by Heath (1981) who sees “deprivation as a vicissitude (sometimes transitory) which strikes broadly and unpredictably across the working class (and indeed white collar groups) in response to the vagaries of economic and social policy and life-circumstances”. A focus on multiple disadvantage tends to direct attention to the manner in which ‘problem’ groups emerge, the emergence of alternative value systems, the spatial concentration of poverty and the need for interventions to break the vicious circle of poverty. In that context the big expensive issues policies relating to the disadvantages experienced by broad class and status groups in relation to access to education, employment and the operation of the taxation and welfare transfer system come to receive less attention.

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¹ More recent British attempts to conceptualise social exclusion in terms of notions of relativity, multidimensionality, agency, dynamics and multi-layer effects offer a more sophisticated perspective (Atkinson, 1998; Hills, 1999)

² The weighting variables employed for the longitudinal analysis is, as recommended by Eurostat, the 1996 base weight.

³ For the purposes of the present analysis we have excluded Luxembourg because it must frequently be treated as an exceptional case.

⁴ For discussions of the quality of the ECHP data set see Eurostat (1999) and Watson and Healy (1999).

⁵ The level of measured income inequality can vary depending on the choice of equivalence scale (see e.g. Coulter, Cowell, *et al.* 1992 555).

⁶ The only significant deviation from this pattern produced by focusing on 50% rather than 60% of median income relates to Ireland which has the sixth lowest poverty rate based on the latter and the third lowest based on the former.

⁷ In this paper we shall not attempt to provide an account of the determinants of poverty persistence but instead focus on its consequences. Further discussion of the former can be found in Whelan *et al* (2001).

⁸ Scales constructed using a simple summation of items produce reliability coefficients, using Cronbach's alpha, of 0.81 for the basic dimension, 0.71 for the secondary and housing services dimension, 0.63 for the housing deterioration dimension and 0.47 for the environmental dimension. Thus overall the levels of reliability are satisfactory although the value for the environmental dimension suggest that that area would benefit from further attempts at scale development

⁹ For such an analysis see Layte *et al* (forthcoming).

¹⁰ These correlations have been calculated using the grossing weight which takes population size into account

¹¹ This average is simply the mean of the individual country values.

¹² For recent discussions of this literature see Friedrichs (1998), Kleinman (1998) and Nolan and Whelan (2000).

¹³ The response to this question is given by the household reference person.

¹⁴ The reference person in the household responds to the household questionnaire.