

The Great Recession and the Changing Intergenerational Distribution of Economic Stress across Income Classes in Ireland: A Comparative Perspective

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Abstract

In this paper we seek to bridge the gap between recent analysis relating to the distributional consequences of the Great Recession across the income distribution and more specific concerns relating to inter-generational outcomes. In Ireland in 2008 there was a clear age gradient in relation to economic stress. Over time the gradient became sharper with the relative position of younger groups deteriorating. The increased salience of age group differentiation in Ireland involved two components. The first related to variability in increases in stress across the age spectrum that was common across income class categories. In that respect children and the older middle age group suffered most. The second involves changes in the additional effects of poverty. While the variable impact of poverty increased the differentials between the elderly and all other groups, it reduced the degree of differentiation between the non-elderly groups. It is not possible to understand the impact of the Great Recession in Ireland by focusing only on changing relativities in relation to social class, unless one allows for the fact that the changing impact of life course stage varied across income classes and the scale of absolute increases in economic stress levels for the non-elderly groups experienced across all income classes. That the Irish pattern of change was not an inevitable outcome of the economic crisis is illustrated by the fact that in Iceland a similar starting point produced a quite different set of changes. Greece, on the other hand, provides an example of the emergence of significant age-related differentiation where the pre-recession period was characterised by their absence. Clearly policy choices not only affect life course differentiation but the extent to which operates in a uniform or variable fashion across income classes.

Keywords

Great Recession, economic stress, income class, intergenerational distribution

Economic Crisis and the Social Stratification of Risks

In this paper we seek to bridge the gap between recent analysis relating to the distributional consequences of the Great Recession across the income distribution and more specific concerns relating to inter-generational outcomes (Jenkins et al 2013, Kus 2013). Our primary focus is on the Irish case which constitutes a particularly interesting one because of the scale of the economic crisis. (Nolan et al 2014) but we seek to locate our finding in relation to Ireland in the comparative context of countries which have experienced a comparable economic upheaval.

Atkinson and Morelli (2011: 49) in a comprehensive analysis of the relationship between economic crisis and income inequality conclude that there is no hard and fast pattern and that crises differ greatly from each other in their causes and outcomes and that as far as inequality is concerned “this time may be different”. The impact of the economic crisis and austerity on inequality operates through complex channels with varying impacts. Jenkins et al.’s (2013) comparative analysis of the impact of the Great Recession showed that the initial distributional effects varied widely across countries, reflecting not only differences in the nature of the macroeconomic downturn but also in the manner in which cash transfers and direct taxes cushioned household net incomes from the full consequences of reductions in market incomes with varying consequences for economic and life stages (Jenkins et al 2013, Callan et al 2014, Savage et al 2015).

Nevertheless discussions of the impact of the Great Recession in Ireland have predominantly involved claims relating to increased inequality with a disproportionate share of the burden of austerity seen to fall on the most vulnerable groups (Social Justice Ireland 2013; TASC, 2012, 2014). These claims generally assume that outcomes in the Irish case were broadly in line with the international trend towards increased income inequality (Pikety, 2014) with consequences in terms of disparities in a range of social outcomes along the lines argued by Wilkinson and Pickett (2009). Claims relating to increased inequality and polarization have persisted notwithstanding the fact that little change has been observed in conventional income inequality indicators such as the Gini coefficient and relative income poverty lines (Nolan and Maître forthcoming). However, any assessment of the impact of the

economic crisis in Ireland needs to acknowledge the potential limitations of relative income measures in a period when real incomes and living standards declined sharply, household debt reached unprecedented levels and property values collapsed. More recent work has extended the range of outcomes to include material deprivation, economic stress and vulnerability and quality of life (Whelan and Maître, 2014, Whelan, Russell and Maître, 2016, Whelan, Nolan and Maître, 2016, Watson et al forthcoming). The salience which the polarization thesis has obtained in popular and political discourse was shown by the prominence of themes of fairness in the recent election. However, whether focusing on classes defined in terms median income or social classes based on occupation and employment status analyses involving a multidimensional perspective in relation to outcomes have found little evidence to support the view that the economic crisis in Ireland has been associated with increased polarization.

The narrative of polarization in terms of hierarchical dimensions of social stratification has gained momentum with increasing claims that, notwithstanding stability in income inequality and relative poverty measures and evidence for the substantial impact of the welfare system in reducing market inequalities (Savage et al 2015), that the burden of the recession has been borne by the most vulnerable. However, much less attention has been paid to changing patterns of differentiation across the life course. This constitutes something of a paradox since, unlike the case in relation to class differences, evidence in relation to the most widely used relative income poverty measure of 60% of median income shows that over time the elderly significantly improved their position relative to the remainder of the population. However, advocates for the elderly have argued that that income based measures fail to capture the distinctive impact of cut backs in services and supports for this group. This provides further support for a shift from a solely income based focus.

In what follows we focus on the impact of the economic crisis on trends in age group differentiation in relation to measure of economic stress which we anticipate will be influenced not only by current disposable income but also broader command over resources, financial obligations, access to financial and social support and capacity to cope with financial pressures. Our focus on age group differentiation can be located in the context of an increasing concern with the potential emergence of

new inequalities as a consequence of individualized life-course trajectories with ‘new’ social risks ‘old’ as hierarchical stratification structures come to have a declining impact (Pintelon et al 2013). Atkinson (2016:42) argues that changing economic circumstances involving the prospect of increasing inequality between generations provides further justification for focusing on ‘individual lifetimes’. Thus in circumstances where we can no longer assume that those born later will enjoy higher lifetime incomes the issue of intergenerational justice takes on an additional salience.

The role that increased household indebtedness has played in the Great Recession provides a substantial further justification for focusing on intergenerational aspects of inequality, since children and individuals in the middle stages of the life-course are more likely to be residing in households experiencing higher levels of debt. During the pre-recession period the level of debt rose substantially across the whole of Europe. Expressed as the ratio of household financial liabilities to national gross domestic product (GDP), in some countries the debt level significantly exceeded a 100 per cent of GDP. In Ireland it reached 113 per cent in 2008, Netherlands 121 per cent and Denmark 144 per cent (Russell et al., 2011). Not only did the importance of household debt rise in the economy as a whole, but also within households’ personal financial portfolios. Household Figures from the Organisation for Economic Co-operation and Development (OECD) showed that household debt as a percentage of disposable income had risen consistently since the mid-1990s (OECD, 2006) in many European countries. In that context, the extent to which the Great Recession was associated with a changing distribution of economic stress across age groups is of particular interest.¹ However, rather than assuming that class and age group effects are independent of each other, we follow earlier critiques of the life-course perspective in drawing attention to the need to consider the manner in which lifetimes and class effects interact (Vandecasteele 2007, 2010, Whelan and Maître, 2008).

Situating our analysis in the context of related earlier and ongoing analysis of the Irish case Whelan and Maître, 2014, Whelan, Russell and Maître, 2016, Whelan, Nolan and Maître, 2016, Watson et al

¹ A parallel on-going stream of work on the Irish cases (Watson et al forthcoming) focuses on the debate relating to the changing roles of social class and social risks (Bonoli, 2005, Vandecasteele, 2007, 2010, Taylor-Gooby, 2004) where the central focus is the role of family type, including lone parenthood, and labour market precarity.

forthcoming), our objective is not to maximise variance explanation in relation to changing levels of economic stress. Rather we seek to focus specifically on the role of factors which we consider to be of particular interest, namely income class and age group and the manner in which such factors interact. We then proceed to place such effects in the comparative context of outcomes for other countries which have been similarly affected by the economic crisis. Earlier work on the Irish case has incorporated concerns with the changing impact of income class and social class (Russell et al 2013, Whelan and Maître 2014, Whelan, Russell and Maître, 2016). However, given our desire to place the Irish case in comparative context, in this case we focus on income classes because of certain data limitations in the available EU-SILC data, on which we will elaborate later, relating to our ability to satisfactorily allocate individuals to social classes.

Our current analysis is also situated in the context of earlier comparative analysis of the impact of economic crisis which identified Ireland along with Iceland and Greece as among the hardest hit countries by the Great Recession. Earlier research, employing the European Union Survey of Income and Living Conditions (EU-SILC), has shown were, like Ireland, quite distinctive in terms of the consequences of the economic crisis for declining income levels and increasing levels of material deprivation and economic stress (Whelan et al 2016).

Data and Measures

Our analysis draws on data from 2008 and 2012 waves of the EU-SILC. We exclude individuals in - households where the Household Reference Person (HRP) has never worked and where annual equivalent household income is of zero or below.² It is based on a comparison of two independent cross-sectional surveys. EU-SILC has a rotating panel element whereby one in four households exit from the survey each year so that by 2012 none of the individuals included in the 2008 survey remain in the 2012 sample.³

² The equivalised household income is constructed with the OECD equivalence scale which gives a value of 1 for the first adult, 0.66 for each additional adult and 0.33 for each additional child.

³ Significant attrition means that numbers available for panel analysis in any four year segment is significantly less than intended by the rotating design. This is particularly true in the Irish case.

The choice of years may affect conclusions. For example both Ireland and Iceland experienced boom periods before the recession and an earlier reference period would show less dramatic changes. However, given our interest in the impact of the Great Recession and the fact that income refers to that in the previous year of the survey we concluded that the most appropriate comparison was between the 2008 and 2012. In no case was a decline in incomes observed before 2007. For those counties experiencing the sharpest falls these were observed between 2007 and 2011 although the specifics varies across countries. It should be kept in mind that the pattern of income class effects observed relating to the impact of the economic crisis may be rather different from those that may be found to characterise economic recovery.

Economic Stress

Our key dependent variable is a measure of economic stress. It is based on a set of items that are intended to capture debt problems but also capacity to cope with financial demands. Overall we understand the outcome to capture objective factors relating to debt burdens and financial obligations while also reflecting subjective elements relating to variable ability to cope with such demands and obligations and differential reference points against which financial pressures are evaluated. The absence of a clear cut distinction between objective and subjective facets of economic stress is consistent with findings from the recent literature relating to the measurement of debt problems.⁴

While there is an agreement that debt levels have substantially increased, there has been less consensus on how over-indebtedness and its consequences should be defined and measured. Russell et al (2013: 695-697) note, a consortium of researchers appointed by the European Commission to develop a common operational definition of over-indebtedness proposed a mix of objective and subjective model indicators (Davydoff et al. 2008: pp. 55–56). They included payment commitments that push the household below the poverty threshold, structural arrears on at least one financial commitment, a burden of monthly commitment payments considered to be heavy for the household, limited payment capacity, and illiquidity.

⁴ See Russell et al (2012) for a more detailed discussion of the measurement of debt and its implications for measuring economic stress.

Drawing on the items available in EU-SILC our proposed indicator of economic stress includes items relating to structural arrears, burden of housing costs, illiquidity in terms of inability to meet with unexpected expenses and additionally includes items relating to debt experiences in the past 12 months and experiencing difficulty in making ends meet.

The full set of items is as follows

1 Households were defined as having a structural problem with arrears where they were unable to avoid arrears relating to mortgage or rent, or utility bills or hire purchase instalments (in the past 12 months). Those households experiencing such problems were given values of 1 while the remainder were scored as 0.

2. Focusing on illiquidity, Individuals in households indicating that they were unable to cope with unexpected expenses were scored 1 while all others were scored 0.

3. The indicator relating to the financial burden of total housing cost was based on the following question: “Thinking of your total housing costs including mortgage repayment or rent, insurance and service charges. To what extent are these costs a financial burden to you?” Three possible answers were offered and responses indicating a “heavy burden” or “somewhat of a burden” were scored as 1 while the remaining category was assigned a value of 0.

4. A further indicator of debt was captured by the question “Has the household had to go into debt within the last 12 months to meet ordinary living expenses such as mortgage repayments, rent, food and Christmas or back-to-school expenses?” A positive answer was scored as 1 while a negative one was assigned a value of 0.

5. The final item relating to ability to make ends meet is based on the following question. “A household may have different sources of income and more than one household member may contribute to it. “Thinking of your household’s total income is your household able to make ends meet, namely, to pay for its usual necessary expenses?” Seven possible answers were offered from

“very easily” to “great difficulty” and responses indicating “great difficulty” or “difficulty” have been given a value of 1 while the remaining categories have been scored as zero.

The average reliability of this measure across all three counties employing Cronbach’s alpha was above 0.70 in both 2008 and 2012. Overall the economic stress measure displays both satisfactory levels of reliability and extremely modest variation across countries thus limiting the extent to which our conclusions regarding cross-national variation are affected by such factors.

In creating the economic stress index, following Desai and Shah (1988), for each country each item is weighted by its prevalence weight in the total population. Less frequently experienced stresses (or deprivation) are allocated a proportionately greater weight. These weights are allowed to vary across time order to best capture the latent stress variable and material deprivation variable. The weighted items are then added and this produces a continuous variable which has then been ‘normalized’ to produce scores ranging from 0 to 1. A score of zero means that the individual is not stressed on any of the items while a score of 1 means that the individual is stressed on all items while intermediate scores reflect the pattern of stress responses and the prevalence weights at each point in time. Since the choice of thresholds for the dichotomous items making up the stress and material deprivation scales necessarily involve the exercise of judgement, the prevalence weighting procedure has the advantage of adjusting for the distributional consequences of such decisions.

Since our measure is calculated at the household level while our analysis is conducted at the individual, level our findings relate to individuals living in households experiencing variable levels of economic stress. Implicit in our approach is the assumption that household economic stress has negative, although not necessarily identical, consequences for adult household members other than those responding to the stress questions. Given the strong relationship between material deprivation and economic stress (Whelan et al 2016), this assumption is supported by the fact that studies that have compared the outcomes for deprivation measures at both household and individual level have found that there is no evidence that the burden of deprivation falls disproportionately on one rather than another member of couples (Cantillon et al 2015).

Income Class

In constructing income class categories we follow the approach based on defining intervals in terms of percentages of median household income, thus allowing the size of such classes to vary across time and counties' income rather than focusing on groups with fixed numbers such as quintiles (Atkinson and Brandolini 2013: 82).

The economics literature is said to be “converging” (Ravallion 2010, 446) on the definition of the income limits for the middle income group as 75 and 125 % of the median. Atkinson and Brandolini (2013) note that we may either accept “the premise that middle class living standards begin when poverty ends,” as Ravallion (2010, 446) states, or instead take a more conservative approach and fix a level so as “to ensure that the lower endpoint of the middle class represents an income significantly above the poverty level,” as suggested by Horrigan and Haugen (1988: 5). Atkinson and Brandolini (2013) note that in the EU, the former criterion would bring us to identify the lower bound with the at-risk-of-poverty line, set at 60 % of the median, whereas the second criterion would rationalize the 75 % cut off as defining the “margins” of poverty as plus a quarter of the at-risk-of-poverty line. The middle class can then be said to be those “comfortably” clear of being at-risk-of-poverty. They note that the rationale for the bottom cut off implies that there exists a “lower middle class,” comprised of people whose income is in the range of 75–125% of the median and who are neither poor nor precarious. We could analogously postulate that there is an “upper middle class” between the “lower middle class” and the rich or affluent by taking the 125 % cut off, which is a quarter less than the income level that identifies the rich. The implicit “richness line” would equal 167 % of the median. This would amount to partitioning the population into five groups.

The income class variable we employ distinguishes 5 income categories as set out below

- Less than 60 % of median equivalized income—income poor
- 60–75 % of median equivalized income—precarious income class
- 75–125 % of median equivalized income—lower middle income class
- 125–166 % of median equivalized income—upper middle income class
- 167 % of median equivalized income—affluent class

We have chosen to label those between 60 and 75 % of equivalized income as the “precarious income class” because of the evidence that this group are highly likely to experience frequent transitions into and out of poverty (Jenkins 2011).

Earlier analysis of the Irish cases by Russell et al (2016) showed substantial overlap between this 5-class schema and a 7-class version of the European Socio-Economic Social Classification (ESeC) class schema in their ability to capture a hierarchical dimension of stratification. However, there was very little differentiation between the income classes in the inflow from the self-employed in agriculture and the petit-bourgeoisie. Unfortunately, given the level of aggregation at which occupations are coded in the EU-SILC data set, it is precisely in relation to the latter categories that we are unable to make the required level of differentiation. This sets strict limits to the extent to which a social class perspective can provide added value.

Exploratory analysis employing the 5-category income class schema revealed that in relation to changing life course effects and their interaction with income class the key distinctions relate to the income poor class, the precarious class and the remaining classes. For reasons of parsimony and ease of communication our subsequent analysis will focus on this threefold distinction.

The Changing Intergenerational Distribution of Economic Stress

Earlier analysis focusing on the original EU-15 (other than Luxembourg) together with Iceland and Norway identified Ireland, Iceland and Greece as the countries experiencing distinctive increases in economic stress, between 2008 and 2012 (Whelan *et al* 2016). In Table 1 we provide a brief summary of overall changes in levels for the latter countries. The level of reliability for the economic stress variable calculated across time was very similar for all three countries, with respective values of 0.767 for Ireland 0.747 for Iceland, and 0.069 0 for Greece. The proportions of variance accounted for by change over time were respectively 3.3% for Ireland, 3.7% for Iceland and 4% for Greece.

In 2008 Ireland, Iceland and Greece were characterized by similar stress levels to countries in the welfare regimes with which they are normally assigned, with mean levels respectively of 0.212, 0.130

and 0.286. However while remaining countries in their welfare regimes experienced modest changes over time stress levels in Ireland, Iceland and Greece respectively by 2012 had reached mean levels of 0.323, 0.233 and 0.403. The changes involved similar absolute increases of average magnitude of 0.110. The proportionate increases exceeded 50% and 40% respectively in Ireland and Greece and a doubling of stress levels in Iceland, although from a very low base.

Table 1 Here

In Table 2 we show the results for the regression of economic stress on age groups for Ireland, Iceland and Greece, with effects allowed to vary as between 2008 and 2012. In 2008 in Ireland a clear age group gradient was observed with the economic stress level increasing gradually from 0.119 for the elderly to 0.254 for children with significant differences being observed between the former and all of remaining age groups. Increases in stress levels over time also displayed a clear age group gradient. The smallest increase over time of 0.036 was observed for the elderly. This rose to 0.106 for the 45-64 group, to 0.120 for the 30-44 group and to 0.150 for the 18-29 category involving statistically significant changes over time in each case. By 2012 stress scores ranged from 0.155 for the elderly to 0.404 for children reflecting a sharp increase in the age gradient – a gap of 0.249 compared to one of 0.135 in 2008.

In Iceland in 2008 stress levels were substantially lower at all stages of the life course than in Ireland. As in the Irish case, there was a clear age gradient, however, in each case the contrast between the elderly and the remaining age groups was less sharp than in Ireland, although in all cases the contrast were statistically significant. Stress levels ranged from 0.073 for the elderly to 0.158 for children. Between 2008 and 2012 the pattern was accentuated, although not in a straightforward linear fashion. The smallest increase of 0.034 was observed for the elderly. However, even this effect was statistically significant. The level of change was significantly higher for all other age groups. For children it rose to 0.135 and for the remaining age groups it averaged 0.109. By 2012 stress scores

ranged from 0.293 for the children to 0.107 for elderly – a gap of 0.186 compared to the corresponding figure of 0.085 in 2008.

In Greece in 2008, in contrast to Ireland and Iceland, there was a complete absence of age group differentiation in economic stress levels. However, over time the degree of deterioration in the situation of the elderly was significantly less sharp than for the remaining age groups, although in all cases the observed changes were statistically significant. For the elderly the increase in the stress level score was 0.026. The next lowest increase of 0.117 was associated with the 45-64 category. The average amount of change for the remaining groups was 0.156. Thus, while there was an absolute decline in the situation of the elderly, they came to enjoy a significant advantage over the remaining age groups. For example, by 2012 the gap between the elderly and children had grown from -0.009 to 0.117. In term of overall levels of economic stress, the observed values for children and the elderly went from 0.291 and 0.300 to 0.443 and 0.326

Thus in Ireland and Iceland the initial advantages enjoyed by older groups, in particular, the elderly were accentuated. Furthermore, in both cases the relative situation of children deteriorated significantly. In Greece, on the other hand, starting from a situation of minimal age group course differentiation, the relative outcomes for the older groups and, in particular the elderly, improved. However, restricting our attention to the three youngest groups, there was little change in their relative circumstances with no distinctive deterioration in the circumstances of children.

TABLE 2 HERE

Economic Stress, Age Group Differentiation and Income Class

At this point we seek to go beyond a description of the overall pattern of changes in the distribution of economic stress across age groups and consider that manner in which such effects are distributed across income classes and, in particular, the extent to which income class location moderates such effects.

In Table 3A we set out the distribution of economic stress levels across age groups and the 3-category class schema for Ireland in 2008 and 2012. In Ireland in 2008 there was a clear age group gradient in relation to stress for all income group, as indicated by the F statistic, but one that was rather sharper for the poor and precarious groups rather than the more affluent ones. The respective percentages of variance accounted for by age group differentiation were 6.3%, 9.8% and 1.9%. Among the income poor, children were clearly associated with the highest level of economic stress with a mean of 0.412 while the lowest level of 0.173 was found for the elderly with the average for the remaining groups being 0.340. The distribution for the precarious category differed only in that the values for the three youngest categories displayed less variation and were more sharply contrasted with the older groups. Finally for the higher income class category the main distinction was between the elderly with a stress level of 0.077 and the remaining categories with an average value of 0.167. Intergenerational variation and, in particular, the contrast between the elderly and the remaining age groups, was of significantly greater import for the precarious and poor income classes than for the high income classes. The respective differences are 0.185, 0.224 and 0.091. The major line of differentiation in class terms was between the income poor and precarious classes and the higher income group. In income class terms, by far the sharpest contrast was for children with the average scores for the poor and precarious classes being 0.240 higher than for the higher income class while for the elderly it was 0.088. For the intervening age groups the average difference was 0.192.

The changes between 2008 and 2012 produce an even sharper contrast than heretofore between the elderly and the rest of the population within the income poverty category with the former experiencing an increase of 0.017 while the average for the remaining categories is 0.153. The older middle age group also improved its relative position with an increase of 0.112 in comparison with an increase of 0.201 for the younger middle age group and an average of 0.155 for the two younger age groups. Among the precarious class it is again the elderly who are most insulated over time in comparison with the remainder of the population with contrasting change values of 0.023 and 0.099. However, on this occasion the largest increase was experienced by older middle aged group with an increase of 0.127. The favourable experience of the elderly was sustained for the higher income class

where a modest increase of 0.060 contrasted with that of 0.163 for children and an average increase of 0.111. However, it is notable that absolute increases in stress for children and the elderly were actually greatest in the high income category. So while the elderly continued to enjoy a relative advantage that was robust across class categories, the accentuation of that advantage did not follow a hierarchical pattern but rather was greatest in the income poor class and least in the precarious class. The fortune of the remaining age groups also varied across class categories with children experiencing the sharpest relative deterioration in their position in the higher income group, although the absolute increase was of similar magnitude among the poor, while for the younger middle aged group the sharpest deterioration occurred among the income poor and for the older middle aged group among the precarious class. By 2012 the respective average gaps between the non-elderly and elderly groups for the income poor, precarious and high income groups had increased to 0.322, 0.300 and 0.154. The respective percentages of variance accounted for by life course differentiation were 11.5%, 13.0% and 4.1% reflecting an increased importance across all income classes but maintenance of the ranking in relative explanatory power observed in 2008. In income class terms the major contrast related to the average impact of income poverty and precarity for the elderly versus the rest of the population with respective differences of 0.049 and 0.206.

TABLE 3A HERE

In Table 3 B we provide a comparable analysis for Iceland. While economic stress levels were considerably lower in Iceland than in Ireland in 2008, the pattern of intergenerational effects was broadly similar and statistically significant for all three income class categories. In each case the highest levels of stress were observed for the three youngest age groups and the lowest for the oldest category with the older middle age group occupying an intermediate position. However, again as in Ireland, such variation was considerably sharper in the income poor and precarious classes where the gaps between children and elderly were respectively 0.150 and 0.175 whereas for the higher income

group it fell to 0.069. As with the Irish case, viewed from an income class perspective, the main contrast is between the income poor and precarious classes and the higher income group with the contrast being of similar magnitude for the two youngest age groups with an average difference of approximately 0.150 before declining progressively to 0.142, 0.094 and 0.063 for the older age groups. In 2008 the proportion of variance accounted for in each of the three class categories was respectively 5%, 6.1% and 1.2%.

By 2012 stress levels increased for all age groups in the income poor category. However, by far the sharpest increases of 0.147 and 0.145 were observed for the older middle age and elderly groups. They were followed by children and younger middle age groups with increases of 0.117 and 0.097 respectively followed by the younger middle aged group with the most modest increase of 0.043. Stress levels increased for all age groups in the precarious income class but with a somewhat different pattern of variation than for the income poor. The sharpest increases were associated with the middle aged groups with an average of 0.106 compared to the corresponding figure of 0.087 for the three youngest age groups and one of 0.056 for the elderly. For the upper income category by far the largest increase in stress levels of 0.145 was observed for children. In contrast, the increase for the elderly was a modest 0.036. For the remaining categories the average increase was 0.114. While the explanatory power of age group differentiation declined for the income poor and remained relatively stable for the precarious class it increased for the higher income group; accounting for respectively 1.2%, 5.0% and 3.9%. As a consequence of these changes the strength of the impact of poverty across age groups changed significantly and this is an issue to which we will return in our subsequent multivariate analysis.

TABLE 3 B HERE

Once again the pattern for Greece, as set out in Table 3C, is rather different to that relating to Iceland and Ireland. In 2008 for all three income classes age group variation was negligible as indicated both

by the proportions of variance explained and the F statistics. Correspondingly income class variation within life-course stage was relatively uniform. Between 2008 and 2012 age differentiation was introduced primarily by the fact that increases in stress levels were more modest for the older age groups, and in particular the elderly, in all income classes. Thus among the income poor group for the elderly an increase of 0.023 was observed compared to an average increase of 0.171 for the remaining categories. For the precarious class the corresponding figures were 0.076 and 0.156 and for the higher income class 0.034 and 0.114.

TABLE 3 C

Multivariate Analysis of Income class to and Age Group Interaction

In this section we employ multiple regression in order to provide a more formal analysis of income class and life course and age group effects in relation to economic stress. In the former case the reference category is the higher income group and in the latter it is the elderly.

In Table 4 for all three countries we provide a more formal analysis of the changing impact of income class and age group differentiation which includes main effects, the 2-way interactions between age group, income class and year of the survey and the 3-way interactions between all three of the variables. This analysis reproduces the descriptive results set out in Tables 3A, B & C but allows us to test for statistical significance in relation to change over time.

Focusing first on Ireland, we can see that, taking as a reference point the elderly higher income group in 2008 where a stress score of 0.077 was observed, stress levels effects for all of the remaining age groups in the high income class at this point in time were significantly different from the elderly with coefficients ranging from 0.122 for the young adult group to 0.056 for the older middle age group. The impact of both poverty and precarity among the older group were highly significant with respective coefficients of 0.095 and 0.081. Focusing on the 2-way interactions between poverty and precarity and age group we can see that in 2008 all eight interactions were significant with the impact

of both factors varying significantly across age groups. For poverty the impact is significantly greater for all age groups other than the elderly with the interaction coefficients ranging from 0.143 for children to 0.053 for young adults and an average of 0.090 for the middle aged groups. For precarity the largest interaction effect was again for children with a coefficient of 0.160 and the lowest of 0.096 for the older middle age group average values 0.139 for the two other groups..

Focusing on changes over time we can see that the interaction term for year of survey of 0.063, which captures the extent of change over time for the high income elderly group, is highly significant. Thus even for the group most insulated from economic stress, the elderly in the highest income class, the mean level of stress increased from 0.077 to 0.140. However, for each of the other age groups within the high income class the increases in stress levels over time were significantly greater with the additional increment ranging from 0.102 for children to 0.041 for the older middle aged group. Over time reduction in the impact of poverty and precarity were observed for the elderly but the respective coefficients were not statistically significant. The three way interactions were positive for the remaining age categories but only in the case of the younger middle age group where the coefficient was 0.135 was the effect sufficiently large to produce a notable increase in the additional absolute impact of poverty over time. However, given that the coefficient for the elderly group was negative the differential impact of poverty as between the elderly group and all others widened. The 3-way interaction effects for precarity were also of modest magnitude. Together with the reduction in the impact of precarity for the elderly they contributed to a widening of age group differences. For precarity a reductions

In Figure 1 for Ireland in 2008 and 2012, taking the high income and elderly group as the benchmark, we set out the deviations from this group for each combination of age and income class. So our focus is on relativities at each point. ⁵

⁵ The absolute increase over time for such groups for group includes both the increase for the reference category and changes over time in age group differentials.

TABLE 4 HERE

The bottom two curves in Figure 1 show the age group differentials for the high income group. Over time the degree of advantage enjoyed by the elderly group within this income category increased in relation to all other age groups with the magnitude of the change ranging from 0.041 for the younger middle aged group to 0.102 for children. The third and fourth curves focus on the precarious class. In 2008 within the precarious class the difference in stress levels relative to the benchmark category ranged from 0.081 for the elderly to 0.337 for children. In 2012 the relative impact of precarity for the elderly declined slightly but increased modestly for all other groups with the largest increase being of 0.064 being for the older middle aged group. The relative advantage enjoyed by the elderly in relation to all other age groups other than children increased with the magnitude of the differential ranging from 0.105 for the older middle aged group to 0.068 for the young middle aged group and young adults. The fifth and sixth curves show the outcomes of the income poor group in 2008 and 2012. In 2008 within the income poverty class disadvantage relative to the benchmark category was least for the elderly group with a coefficient of 0.095 before rising to an average of 0.265 for intermediate groups and peaking at 0.334 for children. In 2012 the relative impact for the elderly fell to 0.054. However, for all other groups it increased. The increase was most modest for the older middle aged group at 0.056, and for younger adults at 0.085. It rose to 0.105 for children and finally to 0.135 for the younger middle aged group.

FIGURE 1

Thus over time age group differentiation in relation to economic stress increased substantially. This can be thought of as involving two components. The first involves age group variability in increases in stress that is common across income class categories and in that respect children and the older middle age group suffered most. The second involves changes in the additional effects of poverty. In 2008 such additional effects involved a clear contrast between the elderly and all others. By 2012 this

contrast had been sharpened for the three youngest groups but particularly for children and the younger middle aged group.

Focusing on the results relating to Iceland in Table 4, we see that. in 2008, as in Ireland, stress levels were lowest for the two older groups but age differentiation was less sharp than in Ireland with the coefficients ranging from 0.069 to 0.038. The impact of poverty and precarity were weaker than in the Irish case and there was no significant difference between the elderly and the older middle aged group and further differentiation was more evenly distributed across the age distribution. The impact of precarity was also weaker among the three younger age groups but with the magnitude of the effects being consistently lower than in the Irish case. Over time increase in stress levels among the high income group were similar to the Irish pattern with the largest effect being observed for children and the weakest for the elderly. However, in striking contrast to the Irish case, a substantial increase in the impact of poverty was observed for the elderly as reflected in the interaction coefficient of 0.111 while for three youngest groups coefficients of -0.136, -0.167 and -0.147 reflected reductions in the impact of poverty and a striking erosion of the relative insulation from the impact of poverty previously enjoyed by the elderly.

In Figure 2, again taking the elderly high income class as the benchmark, we document the changing patterns of age group relativities in Iceland for all three income classes. The bottom two lines show age group variation relative to the high income reference category in both 2008 and 2012. In 2008 stress levels were 0.038 were higher for the older middle aged group and an average of 0.061. By 2012 the gap between the elderly and all others had risen. The gap between the elderly and the remaining age groups ranged from 0.103 for the older middle aged group to 0.178 for children. The third and fifth lines show age group variation relative to the benchmark group for the precarious income class. In 2008 the impact of precarity for elderly was 0.059 it then increased to 0.130 for the older middle aged group. It then increased relative to this group for the three youngest age groups by an average of 0.079 with only modest variation. In 2012, unlike the case for Ireland, the impact of precarity among the elderly increased slightly to 0.082. However, unlike the case for Ireland and for

Iceland in 2008, the absence of significant interactions between age group course and income class year meant that the increased impact of vulnerability was relatively uniform across age groups.

The fourth and sixth lines show the relativities for the income poor class. In 2008 for the elderly group poverty increased stress levels by relative to the benchmark category if older high income individuals 0.066. This rose to 0.134 for the older middle aged group. Additional effects averaging 0.062 were observed for the three youngest groups. In a striking contrast with the Irish case, by 2012 the impact of poverty increased sharply for the elderly to 0.178. Furthermore, the 3-way age group - income class- year of survey interactions were negative rather than positive. As a consequence within the income poverty class the advantage enjoyed by the elderly over, in particular, the three youngest age groups was substantially reduced.

FIGURE 2 HERE

Focusing on the coefficients for Greece in Table 4 we can see that in 2008 there was a complete absence of age group effects across income classes. Thus, as is clear from lines 1, 2 and 4 in Figure 3 precarity increased stress levels by 0.150 and poverty by 0.205 across age groups. By 2012 the impact of precarity among the high income rose to 0.196 while that for poverty fell to 0.198. As shown in lines 3 and 5 of Figure 3, in relation to precarity there were no significant age group variations across time with the increase in the impact of precarity being experienced in a relatively uniform fashion. In contrast, as illustrated in lines 4 and 6 of Figure 3, the set of significant 3-way interactions in column three of Table 4 reflect the fact that by 2010² the impact of poverty was significantly higher in all the non-elderly age groups with an average differential of 0.068 and relatively modest variation across groups. So while the elderly, in common with other groups, experienced a sharp increase in their absolute stress levels their position deteriorated less sharply than for other age groups.

FIGURE 3 HERE

Conclusions

In our introduction we noted that, notwithstanding the prominence which the thesis of class polarization has achieved in popular and political discourse in Ireland, recent analysis spanning outcomes relating to income poverty, material deprivation, economic stress and vulnerability provides little support for such claims instead, taking into account both absolute and relative change, a complicated picture emerges in which limited forms of polarization do not excluded significant elements of ‘middle class squeeze’. As Whelan and Maître (2014) argue what is most striking is not the changing pattern of class differentials but the absolute increase in levels of economic vulnerability and the extent to which it has become pervasive across the class spectrum and the manner in which the profile of such vulnerability has changed with deprivation and economic stress becoming more loosely associated with low income.

The overall picture in relation to changes across the life course is a good deal more straightforward.

Our peak to trough analysis shows that in Ireland in 2008 there was a clear age gradient in relation to economic stress with children occupying the least favourable and the elderly the most favourable position. Over time the gradient became sharper with the relative position of younger groups deteriorating. The overall picture was in line with the individualization hypothesis and raises further concerns relating to exacerbation of life inequalities and associated issues of intergenerational inequality. However, as our analysis has shown the changes in the distribution of economic stress across the life course cannot be understood independently of income class position.

The increased salience of age group differentiation in Ireland involved two components. The first related to variability in increase in stress across the age spectrum that was common across income class categories. In that respect children and the older middle age group suffered most. The second involves changes in the additional effects of poverty. In 2008 such effects were most evident for children and the older middle aged and over time the impact of poverty for these groups did increase. However, the increases were of greater magnitude for young adults and, in particular, the younger middle aged group. As a consequence, while the variable impact of poverty increased the differentials between the elderly and all other groups, it reduced the degree of differentiation between the non-

elderly groups. Thus the deteriorating relative situation of children was due largely to cross-class increases in stress levels rather than to increased exposure to income poverty or increased sensitivity to such poverty. So while the overall situation of children deteriorated income class differences between children were significantly attenuated. This finding is consistent with longitudinal analysis of the Growing Up in Ireland Survey which found that among families with children those who became vulnerable during the recession exhibited a significantly greater degree of socio-economic heterogeneity in comparison with the persistently vulnerable group (Watson et al 2015)

These findings are consistent with the pervasive nature of financial problems produced by the Great Recession in Ireland and the evidence from a number of studies that the Irish case provides significant evidence of middle-class squeeze alongside elements of polarization. Thus, as with the case of our earlier discussion of social class, it is not possible to understand the impact of the Great Recession in Ireland by focusing on changing relativities in relation to social class, unless one allows for the fact that the impact of life course stage varied across income classes and the scale of absolute increases in stress levels for the non-elderly groups that were experienced across all income classes.

That the Irish pattern of change was not an inevitable outcome of the economic crisis is illustrated by the fact in Iceland a similar starting point produced a quite different set of changes involving an erosion of age related differentials in the impact of precarity and poverty. Greece, on the other hand, provides an example of the emergence of significant age related differentiation where the pre-recession period was characterised by their absence. Clearly policy choices not only affect such life course differentiation but the extent to which operates in a uniform or variable fashion across income classes.

In an earlier analysis Whelan and Maître (2014: 483) noted that, while at that point unprecedented economic contraction and austerity had provoked little in the way of social disruption or conflict, a range of middle class groups including key public sector workers are likely to have been exposed to acute levels of economic stress in a manner that they are unlikely to have anticipated. They suggested that dealing with the potential political pressures arising from the increasingly pervasive nature of

economic stress and vulnerability while sustaining the social welfare arrangements that have traditionally protected the economically vulnerable presented formidable challenges in terms of maintaining social cohesion and political legitimacy.

The outcome of the recent election, we would suggest, illustrates the scale of such challenges. Responding to such challenges we would argue requires an appreciation of how widely the traumatic effects of the economic crisis has been distributed and the changing nature of economic stress and vulnerability. It is not facilitated by claims in relation to class polarization that are poorly founded and a failure to acknowledge that some groups such as the elderly significantly dependent on welfare, while also experiencing a decline in their absolute positions, have been relatively buffered from the impact of the crisis while groups such as families with children have experienced a significant deterioration in their relative positions.

Finally looking to the future it is important to keep in mind that the pattern of change associated with the recovery could prove to be substantially different that characterising the economic crisis

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