

EXPLAINING POVERTY TRENDS IN IRELAND DURING THE BOOM



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The unprecedented growth rates of the Irish economy in the last decade have substantially improved living standards as measured by both national income figures and national income surveys. At the same time other figures are frequently published which show increases in poverty. This paper shows that this paradox can be explained if the characteristics of different measures are examined. Whereas rates of relative income poverty have been increasing steadily since 1994, particularly among those reliant on social welfare benefits, a measure of real income growth shows dramatic declines in the levels of poverty. Similarly, a "consistent" measure of poverty based upon a combination of relative income and a deprivation measure incorporating non-monetary variables also shows large decreases in poverty. In spite of real income gains for social welfare beneficiaries, increasing relative income poverty is the result of the worsening position of welfare recipients relative to those with earnings from employment. A number of measures should be used when measuring poverty and a tiered set of poverty targets adopted.

INTRODUCTION

One might have imagined that the unprecedented expansion of the Irish economy between 1995 and 2001 could only have positive implications for the level of poverty here. However, while the Government has been highlighting figures that do indeed show poverty declining sharply over that period, others have emphasised ones that suggest it actually increased.

It is in fact possible to tell a coherent story about developments in levels of poverty in the 1990s that encompasses these differing perspectives. This requires that we accept that there is no single perfect measure of poverty and instead use a number of different indicators that reflect different dimensions. It is precisely in conditions of unprecedented economic growth and rapid improvement in overall living standards that different indicators of poverty may appear to suggest diametrically opposed conclusions. An assessment of the consequences of economic and social change then requires a judicious combination of different types of information. This analysis uses data from

nationally-representative surveys of households carried out by the ESRI between 1994 and 2001 in a fully-harmonised way. It allows comparison of trends in poverty using different measures and examination of the factors that may be responsible for divergence in these trends.

CONCEPTUALISING AND MEASURING POVERTY

In everyday use poverty in developed countries is often seen as an inability to attain a decent or adequate standard of living. Since what is seen as adequate is likely to change over time and differ across societies, this means that the definition is essentially relative. This relative approach to the conceptualisation of poverty has been adopted officially in Ireland in the definition set out by the National Anti-Poverty Strategy in 1997:

"People are living in poverty if their income and resources (material, cultural and social) are so inadequate as to preclude them from having a standard of living which is regarded as acceptable by Irish society generally. As a result of inadequate income and resources people may be excluded and marginalised from participating in activities which are considered the norm for other people in society."^[1]

This has much in common with Townsend's influential formulation in his seminal 1970s book on poverty in Britain and with the definition adopted at EU level by the Council of Ministers in the mid-1980s.

In empirical terms the most common approach to identification of the poor has been to define a poverty line in terms of income and regard those with incomes below that line as poor. Poverty thresholds are derived as fixed proportions of mean or median income, adjusted for family size and composition. Using a range of cut-offs then helps to identify conclusions that are robust with respect to the level of the income threshold.

Income-based poverty lines can be seen as focusing wholly on the "resources" element of the definition, but they face a fundamental problem in that they may seriously mislead as to the extent of poverty and the types of household most seriously affected.^[2] This is not solely because of the difficulties in measuring income accurately in household surveys, but also because a household's command over resources is affected by much more than its current income. Long-term factors, relating most importantly to the way resources have been accumulated or eroded over time, play a crucial role in influencing the likelihood of current deprivation and exclusion. A further limitation of relative income lines is that the poverty rate can remain stable even if all incomes are dramatically

[1] National Anti-Poverty Strategy 1997, p3

[2] Callan, Nolan & Whelan 1993; Nolan & Whelan 1996

increased or decreased as long as the relativities between groups are preserved.

The use of relative income poverty measures alone can potentially be seriously misleading as to the level and causes of poverty. ESRI researchers have argued for many years that income poverty lines need to be augmented with other information, notably from non-monetary indicators of deprivation. These indicators aim to capture directly where households are experiencing enforced absence of what are generally seen as "necessities".^[3] They provide a direct measure of a household's inability to attain a living standard seen as acceptable generally in Irish society and highlighted in the definition of poverty in the National Anti-Poverty Strategy. Another useful perspective is given by examining the numbers falling below income thresholds set in some base year and then indexed to the cost of living rather than average incomes, thus representing a threshold held constant in terms of purchasing power.^[4]

TRENDS IN RELATIVE INCOME POVERTY

Conventional practice is followed in adopting the household as the income-sharing unit, treating all members of a particular household as having the same standard of living. A particular income level will then entail a different standard of living for different households, depending on the number and ages of the people they contain. An *equivalence scale* is used to adjust household income for the differences in "needs" associated with differing size and composition. The scale used assigns the first adult in a household the value 1, each additional adult a value of 0.66 and each child a value of 0.33. This allows calculation of the total number of "equivalent adults" in the household. By dividing it into the household's income, equivalised income is derived - in effect, an alternative to income per head of household members as a measure of their living standards.

Three median-based poverty thresholds set at 50%, 60% and 70% of median income are used, allowing the sensitivity of the results to be assessed. The income concept is weekly disposable household income; that is, income of all household members from all sources, after income tax and PRSI contributions are deducted.

The actual level of median income from which the poverty line is derived is examined first, as well as how this changed between 1994 and 2001. Table 1 shows that over the period from 1994 to 2001 median household income rose by over 97%. Over the same period consumer prices rose by around 22%, so mean household income rose by over

[3] Callan, Nolan and Whelan 1993; (Layte, Nolan, & Whelan 2001)

[4] It is analogous to the US official poverty line in being indexed to prices, although the latter was set initially back in the 1960s by reference to budget studies.

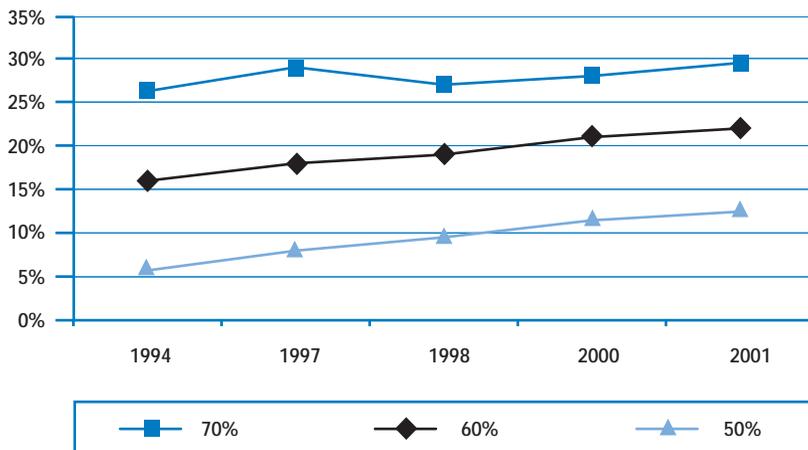
75% in real terms. This meant that whereas the 50% of median poverty threshold for an adult living alone was just over €69 in 1994, by 2001 it was €136.90. The 60% threshold rose from €83 in 1994 to €164 by 2001.

TABLE 1: MEDIAN EQUIVALISED INCOME AND RELATIVE INCOME THRESHOLDS FOR A SINGLE ADULT, IRELAND 1994-2001

	1994	1997	1998	2000	2001
Median	€138.96	€170.74	€192.99	€239.33	€273.80
50% threshold	€69.48	€85.37	€96.50	€119.67	€136.90
60% threshold	€83.38	€102.44	€115.79	€143.60	€164.28
70% threshold	€97.27	€119.52	€135.09	€167.53	€191.66

Figure 1 then shows how the percentage of persons under each of these relative income thresholds evolved over the period. It shows that there has been a marked increase between 1994 and 2001, including some increase between 2000 and 2001, in the poverty rate measured in this way. Taking the central 60% of median threshold, it can be seen for example that 16% fell below this line in 1994, but by 2001 the figure was 22%.

FIGURE 1: PERCENTAGE OF PERSONS BELOW MEDIAN RELATIVE INCOME POVERTY LINES

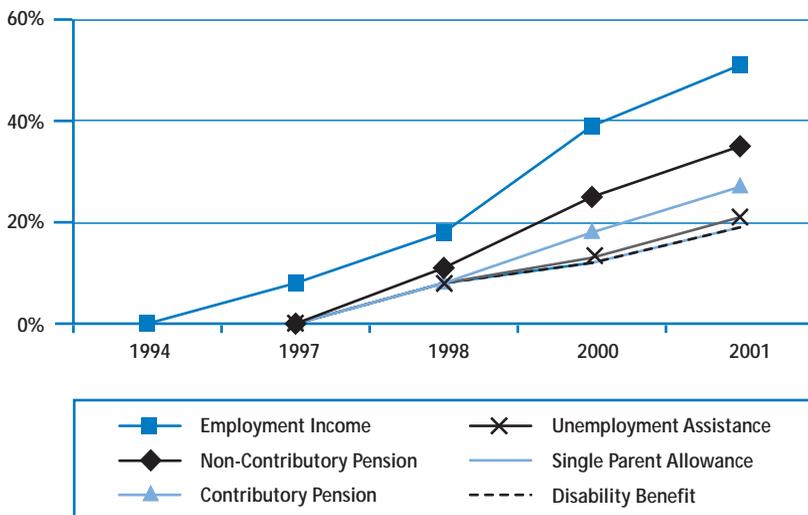


Note:
Based on Income Averaged Across Individuals Living in Ireland Surveys 1994, 1997, 1998, 2000, 2001.

The picture would be very different indeed if, instead of income thresholds linked to average income, thresholds held constant in purchasing power terms were used. Taking the 60% of median threshold in 1994 and indexing it to the CPI, the numbers falling below that threshold would have fallen from about 16% in 1994 to about 2% in 2001. This reflects the scale of real income growth throughout the distribution seen over this remarkable period.

How then did relative income poverty rise so substantially over the same period? The answer lies in the distribution of this increase in incomes and the nature of relative income lines. Falling unemployment contributed directly to improved living standards, but income gains were not confined to those in or moving into work. As Figure 2 shows, social welfare rates also increased in real terms. Unemployment Assistance, for example, rose by over 20% while pensions for the elderly rose a good deal more rapidly. However, in general, social welfare payments lagged further behind incomes from work and property and thus average income. As a result, by the end of the period those relying primarily on social welfare for their income were more likely to fall below poverty lines linked to average income, offsetting the impact of increasing numbers in employment on relative income poverty rates.

FIGURE 2: REAL GROWTH IN EMPLOYMENT AND SOCIAL WELFARE INCOMES 1994-2001



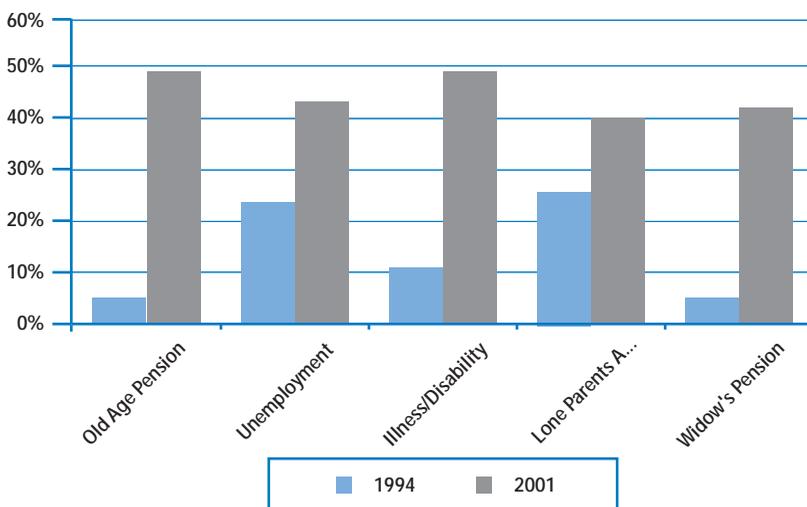
Notes

1. Disability Benefit and Single Parent Allowance increased at the same rate over this period and thus the former is 'hidden' behind the latter in the graph.
2. Social welfare figures are actual rates of payment 1994-2001; employment income is mean net income from all earnings from the LLI surveys 1994-2001.

THE CHANGING NATURE OF THE LOW INCOME POPULATION

The consequence of these trends has been a pronounced change in the pattern of risk and the profile of those falling below relative income thresholds over the period. Figure 3 shows the risk of falling below the 60% of median threshold for those receiving different types of social welfare benefits and this is seen to have risen sharply.

FIGURE 3: PROPORTION OF PERSONS IN RECEIPT OF SPECIFIC WELFARE BENEFITS IN HOUSEHOLDS BELOW 60% MEDIAN INCOME IN 1994 AND 2001



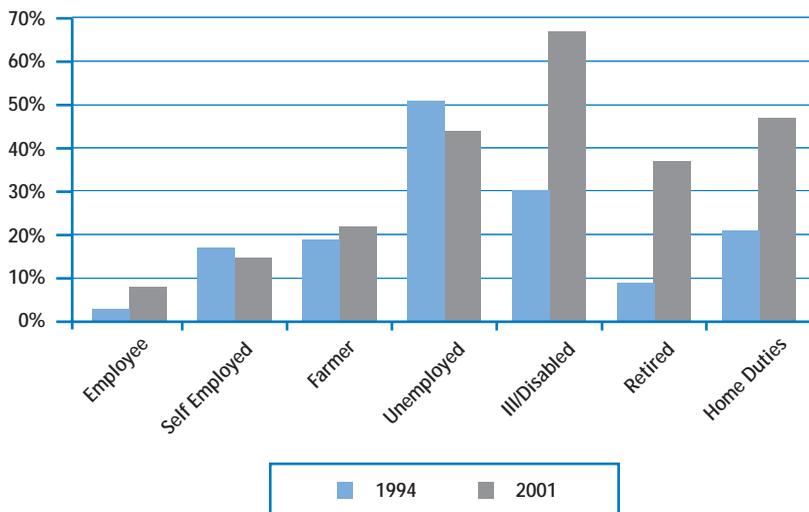
The relative income poverty rate for those in receipt of unemployment benefit/assistance or illness/disability rose from about one in four to one in two, but the increase was even more pronounced for the elderly. In 1994 around one in twenty old age pensioners were below this relative threshold, but by 2001 this had risen to one in two. So despite the increases in the purchasing power of their social welfare benefits, those relying on these payments have fallen behind in that the gap between them and the rest of the population has widened sharply.

Figure 4 shows the risk of falling below the 60% of median threshold when categorised by the labour force status of what is known as the "household reference person".^[5] In 1994 households where the reference person was ill/disabled, unemployed, or working full-time in the home had the highest risk. One of the most striking changes in the

[5] The household reference person is defined as the owner or tenant of the accommodation or, if a couple are jointly responsible, the older of the two.

pattern of risk between 1994 and 2001 was the very sharp increase for households where the reference person was ill or disabled. Although the risk faced by those in households where the reference person is retired has been increasing over time, in 2001 it was still a good deal lower than where the reference person is ill/disabled, unemployed or in home duties. Where the reference person is employed the risk of being below the relative income threshold is by far the lowest - although it did increase towards the end of the period.

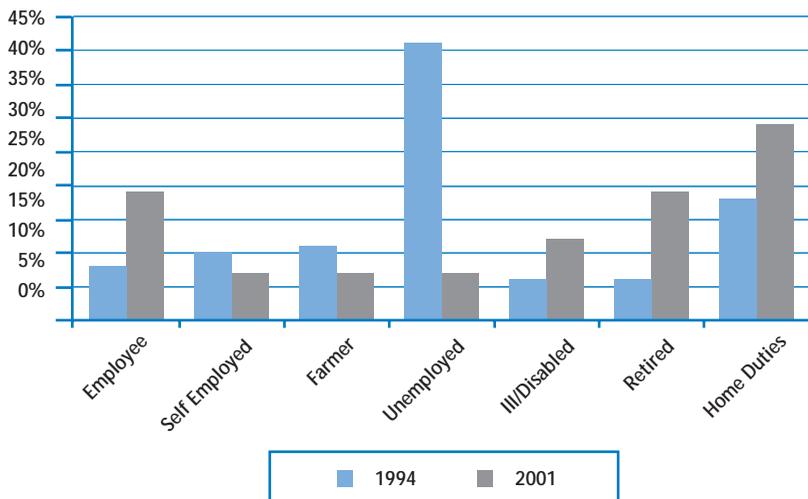
FIGURE 4: PERCENTAGE OF PERSONS BELOW 60% OF MEDIAN INCOME BY LABOUR FORCE STATUS IN 1994 AND 2001



As well as looking at the risk of relative income poverty, it is also useful to examine the changing make-up of those below the threshold. Figure 5 shows the distribution of persons below the 60% line across types of household. Despite their high level of risk, only about 12% of persons found below this threshold are in households with an ill/disabled reference person in 2001, although this is substantially higher than in 1994. By contrast, only 7% are in households with an unemployed reference person by 2001, down from over 40% in 1994. About 30% are in households where the reference person was engaged in home duties, which is close to double its 1994 level. Just below 20% are retired, three times the 1994 level. Despite their very low risk, 19% are in households where the reference person is an employee, a marked increase over time. Thus, between 1994 and 2001 there has been a dramatic transformation in the composition of those below the relative income threshold, reflecting the sharp decline in

unemployment and the failure of vulnerable groups such as the ill/disabled, the retired and those in home duties to keep pace with the advances made by those in employment.

FIGURE 5: COMPOSITION OF PERSONS BELOW 60% OF MEDIAN INCOME BY LABOUR FORCE STATUS OF HOUSEHOLD REFERENCE PERSON, LIVING IN IRELAND SURVEYS 1994 AND 2001



MEASURING POVERTY INCORPORATING NON-MONETARY MEASURES

As stated, the National Anti-Poverty Strategy defines poverty as exclusion from the life of society because of a lack of resources. This implies that those measured as poor should be experiencing various forms of what their society would regard as serious deprivation.^[6] However, previous work has shown that income on its own does not provide a satisfactory basis for capturing such exclusion. When low income versus deprivation are used to identify the most disadvantaged, they highlight groups with rather different socio-demographic profiles.^[7] This has been shown to be true across a wide range of EU countries.^[8]

The Irish case is even more complex because the very rapid growth in average incomes since 1994 poses particular problems in capturing what is generally regarded as exclusion. In such circumstances, direct measures of deprivation can be a particularly

[6] See Townsend 1979

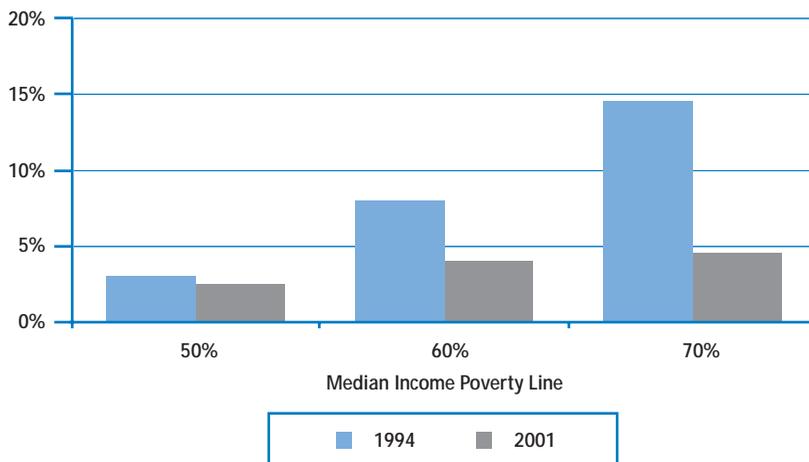
[7] See Callan, Nolan, & Whelan 1993; Nolan & Whelan 1996

[8] See Whelan et al, 2001; Layte et al, 2001

valuable and complementary source of information in assessing trends in poverty. A measure of poverty combining both low income and manifest deprivation was developed at the ESRI initially using results from a household survey carried out in 1987. Callan, Nolan, and Whelan (1993) and Nolan and Whelan (1996) used a range of deprivation indicators to produce different indices of deprivation. Those below relative income poverty lines and reporting what was termed "basic deprivation" were identified as experiencing generalised deprivation due to lack of resources. This "consistent" poverty measure was subsequently the basis for the global poverty reduction target adopted in the National Anti-Poverty Strategy.^[9]

Figure 6 shows the percentage of households in the sample that is deprived of one or more items on the basic deprivation index and falling under different relative income thresholds. It reveals a very different trend to that found earlier using relative income poverty lines alone: 'consistent' poverty has fallen between 1994 and 2001, with the scale of the decline being greater the higher the income poverty line used. Whereas the percentage under the 50% median income line and also experiencing basic deprivation decreased from 3.5% in 1994 to 2.9% in 2001, the proportion poor using the 60% line together with basic deprivation fell by more than 50% from 8.3% to 4.1%. Using the 70% line the fall was greater still - from almost 15% to under 5%.

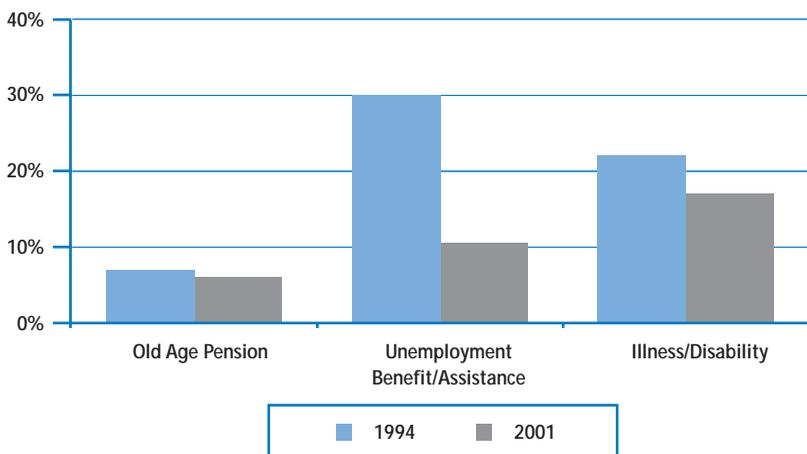
FIGURE 6: PERCENTAGE OF PERSONS BELOW PROPORTIONS OF MEDIAN INCOME AND EXPERIENCING BASIC DEPRIVATION IN 1994 AND 2001 LIVING IN IRELANDS SURVEYS



[9] An in-depth discussion of the construction of the basic deprivation index and the consistent poverty measure and their evolution over time can be found in Whelan et al. 2003.

Figure 7 shows that when the consistent poverty measure is used, the trend in poverty risk is generally downward even for those depending on social welfare. This is most obvious in the case of those receiving unemployment benefits or assistance, where the proportion below the combined line fell from one in three in 1994 to one in ten in 2001. For those in receipt of widow's pensions a sharp reduction from 14% to 4% was observed. Similarly a halving of the rate for lone parents from 36% to 18% was observed. However, for those in receipt of old-age pension or illness/disability-related payments the reductions were much more modest.

FIGURE 7: PROPORTION OF PERSONS IN RECEIPT OF SPECIFIC WELFARE BENEFITS IN HOUSEHOLDS BELOW 70% MEDIAN INCOME AND EXPERIENCING BASIC DEPRIVATION



These declines in the consistent poverty measure reflect the general increase in living standards that have been observed across all groups and which have been translated into lower rates of generalised deprivation. Unlike the relative income measure, it does not reflect the changing relativities in levels of income and so quite divergent trends between the two measures are seen.

CONCLUSIONS

This paper set out to unravel the apparent paradox that emerges from the use of different measures of poverty to describe trends in Ireland during the economic boom. Measures based purely on relative income poverty thresholds show poverty increasing, whereas the "consistent" poverty measure developed at the ESRI and used in the

National Anti-Poverty Strategy shows a sharp decline. The indicator adopted thus determines the result obtained, but the central point is that taken together they do in fact reflect a coherent set of underlying trends. The upward trend seen when using relative income measures reflects the fact that, although all groups have seen substantial real increases in income since 1994, increases for those dependent on social welfare payments have not kept pace with gains made by those in employment and self-employment. At the same time, real increases in income and living standards have been reflected in declines in measures incorporating non-monetary deprivation indicators such as the "consistent" poverty measure. These diverging trends represent different aspects of the complex realities associated with this unprecedented period of economic and social change.

The moral of the story is not that relative income poverty lines should simply be abandoned. If over the medium to long-term the proportion falling below such thresholds increases, the ability of significant numbers to participate fully in Irish society is put at risk. Purely relative measures thus complement the "consistent" poverty measure, which seeks to directly capture exclusion due to lack of resources at present. The specific indicators used to do so need to be adapted to reflect changing perceptions and expectations; and Whelan, Layte et al (2003) have argued that the set used to date need to be amended looking forward.

Instead of relying on a single indicator, ESRI researchers have been suggesting for some time that a tiered set of indicators with allied targets should be adopted. First, priority should be given to ensuring that those on low incomes see their real incomes rise; and their deprivation levels decline using a specific set of indicators. Secondly, using a set of deprivation indicators which changes over time to capture what are regarded as necessities, one should also aim for a decline in the combined income/deprivation measure. Thirdly, the proportion of the population falling below relative income poverty lines should also be declining.

It is worth mentioning that precisely this type of approach - informed by the Irish experience - has recently been adopted by the British government to monitor progress towards the high-profile, political commitment to eradicating child poverty there. At EU level, a multidimensional set of indicators has been adopted to allow progress in combating social exclusion to be monitored. While the numbers below relative income thresholds are prominent (and are referred to as the "at risk of poverty" rate), they are complemented by a battery of other indicators. Poverty and its evolution is too complex a phenomenon to be captured by a single measure, as Irish experience during the recent economic boom amply demonstrates.

REFERENCES

- Callan, T., Nolan, B., & Whelan, C. T. 1993, "Resources, Deprivation and the Measurement of Poverty", *Journal of Social Policy*, vol. 22, no. 2, pp.141-172.
- Layte, R., Maître, B., Nolan, B., & Whelan, C. T. 2001, "Explaining Deprivation in the European Union", *Acta Sociologica*, vol. 44, no. 2, pp.105-122.
- Layte, R., Nolan, B., & Whelan, C. T. 2001, "Reassessing Income and Deprivation Approaches to the Measurement of Poverty in the Republic of Ireland", *The Economic and Social Review*, vol. 32, no. 3, pp.239-261.
- Nolan, B., & Whelan, C. T. 1996, *Resources, Deprivation and Poverty*.
- Townsend, P. 1979, *Poverty in the United Kingdom* Penguin, Harmondsworth.
- Whelan, C. T., Layte, R., Maitre, B., Gannon, B., Nolan, B., Watson, D., & Williams, J. 2003, *Monitoring Poverty Trends in Ireland: Results from the 2001 Living in Ireland Survey*, Economic and Social Research Institute, Dublin, 51.
- Whelan, C. T., Layte, R., Maître, B., & Nolan, B. 2001, "Income, Deprivation and Economic Strain: An Analysis of the European Community Household Panel", *European Sociological Review*, vol. 17, no. 4, pp.357-372.