Research note

Estimating the Cornish from the 2001 England and Wales census: adjustment and re-analyses

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Introduction

The distinct and ‘persistent sense of difference’ experienced by the people of Cornwall, a county in the south-west of the United Kingdom, has been well documented. Cornish issues have also been discussed in this publication previously, with particular reference made to the patterns of migration and population trends.1 Indeed the frequency of official statistics which seek to measure and estimate the level of Cornish ethnic group affiliation has been rising over the past decade, with local government as well as bodies such as the National Health Service and the police including Cornish categories in monitoring surveys.2 What these instruments often lack however is a sense of rigour and wider applicability present in more academic measures, though widespread estimates of the Cornish population are extremely rare in the specialised literature. The importance of such measures should not be underestimated: the large wealth of research into ethnic group affiliation and indigenous groups in areas of deprivation has shown strong links with social exclusion factors.3 That Cornwall is an area of some disadvantage is also well documented and the consistent receipt of funding streams aimed at regeneration (whatever level of success has been noted) is indicative of a county with localised deprivation at a deep level.4

The legitimacy of the Cornish as a distinct group is (and continues to be) an object of some debate amongst those engaged with both discussions of small scale ethnicity measures as a whole, and those who campaign for more widespread and legitimised categorisation of the Cornish as an ethnic minority.5 Ethnicity as a concept and the associated literature is both

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large and complex and it is not within the scope of this note to explore the notion comprehensively; however, if politically sensitive notions of race are to be avoided it is self-ascription to a group which becomes central. The critical boundaries between inclusion and exclusion to any particular ethnicity are delineated by cultural difference rather than objective categorisation and, despite subtle methodological issues, ethnic group affiliation has been taken in this instance to mean self-identification to a particular group. Whilst not a perfect measure there have been strong arguments for such a use particularly in the Cornish context.6

The importance of an examination of the size and relative position of the Cornish as a distinct group in the region is clear and the present note describes a single phase of a three stage research project which sought to directly address these issues.

The 2001 England and Wales census

The inclusion in the 1991 England and Wales census of a variable relating to ethnicity provided another important layer of data, and was reported in LPS as a central topic seeing increased use throughout the 1990s.7 The 2001 round saw the inclusion of a coding category for the Cornish (after much campaigning) whereby individuals had the option to report a Cornish ethnic identity.8 The distinct lack of a dedicated tick box option, though methodologically understandable, meant that the treatment of the resulting 33,932 individuals reporting such an identity was cautious at best.9 That is not to argue that the census return was in any way inaccurate—it certainly was valid for those who chose a Cornish identity—but rather the true levels of affiliation were hypothesised to be much larger.

Undercounts in census returns are arguably commonplace, especially amongst ethnic groups, and have been reported frequently amongst Black and Hispanic groups in the USA.10 Additionally, the inherent bias associated with a write-in option has been well documented, with the detailed estimates of the Irish in the UK showing skewed error on more than one occasion.11 Prior to a careful examination of the relative position of the Cornish the first stage of the current research was to rigorously estimate the size of the

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8 Cornish Constitutional Convention, Devolution for one and all; governance for Cornwall in the 21st century (Truro, 2002); Office for National Statistics, Information paper: deciding which tick-boxes to add to the ethnic group question in the 2011 England and Wales Census (London, 2009).
Cornish population in the county through an adjustment and re-analysis of the 2001 England and Wales census returns.

Hypotheses and methodological considerations

The likelihood of an undercount was substantial and whilst detailed hypotheses were not generated at such an exploratory stage of the project a dramatic increase in the levels of affiliation was certainly expected. Methodologically there were substantial hurdles to overcome regarding the estimation of such a large-scale set of data. Whilst under-enumeration is not a new phenomenon and there are techniques utilised to redress the biases, the development of improvement strategies for a single variable estimation represents a methodological innovation in the social sciences.12

As previously discussed the rise among key agencies to include a Cornish category in monitoring instruments meant that there was significant data referring to the population at a number of scales and across a diverse range of geographic areas within the county. A trawl of all relevant data (any containing a Cornish category) yielded 12 data-sets suitable for inclusion, consisting of local authority profiles, school based census results, hospital trust profiles and all large-scale surveys performed in the region within the last five years. Additionally data were included from all relevant recent academic studies for which the original data were available. A rigorous combination of these data into a single derived weight for application to the 2001 census data was undertaken. Data-weighting techniques are certainly not new but the use of multiple sets for the derivation of a single weight is rare.13

All relevant data was collated including virtually all the sets making direct reference to the Cornish as a distinct group. This collation then underwent a three stage quantitative analysis in order to derive rigorous weights for application. The first stage consisted of a simple aggregation of the levels of Cornish ethnic group affiliation. Secondly, and again derived from a simple aggregation, a term was introduced which accounted for the sample size, effectively giving larger weights to larger studies. In simple terms this stage was a weighted average across categories weighted according to the total numbers in the category. Thirdly, terms were introduced which estimated the range and variance of each result, taken from the physical sciences.14 While new to the social sciences, estimation based on multiple events is common in experimental designs and weighting strategies exist which combine multiple results of a single phenomenon. The weight given to each

observation is based on the precision utilised and the variance from the arithmetic mean and whilst the differences in result are often subtle the error accounted for is increased greatly compared to a simplistic aggregation.

Results

The three weights represented the most comprehensive estimation of the Cornish as a group. A simple aggregation of the data resulted in an estimate of the Cornish to be 28 per cent of the total population in the region, including sample size correction and the result altered to 29 per cent. The final and most statistically rigorous estimate including variance and range estimation resulted in slightly over 30 per cent of the total population self-identifying as Cornish. The significant impact of the result can be seen in Table 1 with a difference between the 33,932 reported in the raw data to a top estimate of 155,000 individuals.

The results (broken down in Figure 1 by administrative district for distributive illustration purposes) show the substantial size of the expected undercount. The amount of individuals willing to self-identify as Cornish in the presence of a dedicated option rather than a poorly publicised write-in selection is significantly higher than previously thought. Differing results between the individual weighting methods are to be expected, but the coherence around a quarter of the population is indicative of a more accurate estimation than has previously been achieved.

The discrepancy between the officially measured census figures and the estimations given in this note clearly has implications both methodologically, relating to the measure of small scale ethnicities, and substantively for the Cornish as a distinct group. The illumination of such small-scale and previously hidden ethnicities is one of the primary reasons for the measures of ethnic group affiliation in social surveys, but it is not the purpose of this project to recommend the inclusion of such categories in national surveys. More important are the consistent re-examination of such data and the reliable estimation of hidden groups to better understand the uniqueness of a group situation.

For the Cornish in particular the implications of a more widespread affiliation are whether such affiliation is linked in any way to differing experience of key exclusion and deprivation factors. Much has previously been written on the experience of small-scale indigenous groups in relation to others in the same area, and the central finding of the current phase is that an examination of the Cornish is both timely and sociologically


The on-going phases of research undertaken as a part of the wider project will seek to address these issues in a detailed primary examination of the group.

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Conclusions

More broadly the resulting discrepancy between official Census figures and a detailed examination of a local population call into question regional and meta-regional analyses of geographic areas relating to deprivation.\(^{18}\) The uniqueness of sub-regional areas and the populations of such geographies, especially with the levels of cultural distinctiveness reported in the Cornish case, should not be underestimated and research which seeks to explore minority ethnicity at these levels should include detailed re-examination of the secondary sources. Of course, the research presented in this note remains only a tentative exploration of a previously hidden population in official and published research. The release of the 2011 England and Wales census figures will impact significantly, though the lack once again of a tick box option only strengthens the implications reported here. The methodological limitations imposed by secondary analysis in general and the innovative collation negates the derivation of strong conclusions in this case.\(^{19}\) However, as a first stage examination of a culturally distinct and frequently discussed group in the UK such findings represent a first step in an on-going move towards a more comprehensive ethnic and local population methodology.

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