

Adding Geography back to the SAR

Many users need to know about the district-level distributions of population characteristics not captured by planned standard census outputs. For this reason, they have requested district-level coding for the SAR. Unfortunately, as noted in the latest SAR newsletter, sub-regional geographic coding had to be sacrificed in the trade-off between SAR content and respondent confidentiality.

To help compensate for this loss, it is planned to add pseudo-LAD indicators to the SAR. These pseudo-LAD indicators will allow users to quickly and easily extract statistical best estimates of unknown district-level distributions from the SAR. The resulting estimates will normally be at least as accurate as those derived using Iterative Proportional Fitting, a statistical technique commonly adopted in such circumstances.

The proposed pseudo-LAD imputation strategy will identify the set of individuals in the SAR that 'best represent' each SAR district. Specifically, when aggregated at district level, the identified set of individuals will

- (i) accurately reproduce a set of a dozen or so published district-level Census tabulations. These tables, acting as constraints on the imputation process, will involve the interactions between a dozen or so Census variables.
- (ii) provide best estimates for other unknown district-level distributions, provided that they involve interactions between table marginals used in (i).

Full details of the proposed methodology, including a statistical assessment of estimate accuracy, may be found at <http://pcwww.liv.ac.uk/~william/microdata>.

The initially proposed list of variables from which reliable district-level estimates can be derived are as follows:

Demographic	Age Sex Marital Status Household composition (adults/children)
Cultural	Ethnic Group Religion
Economic	Economic activity NS-SEC (2001 version of 'social class') Cars in household
Housing	Dwelling type Tenure Rooms in household

Please send suggestions for possible alternative/additional constraining variables to Margaret Martin, CCSR, University of Manchester, M13 9PL, or email: margaret.martin@man.ac.uk