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EDITORIAL

Fortieth anniversary edition

Local Population Studies was first published in the autumn of 1968. Initially it was called the Local Population Studies Magazine and Newsletter, but by the time that number 5 was published in autumn 1970 it had adopted the name by which is has been known since. The publication of LPS 81, therefore, marks the fortieth anniversary of the birth of the journal, and hence the Board have decided to devote this editorial to a celebration of this landmark. Coincidentally, this will also be the last issue of the journal to appear in the A5 format employed to date. In order to accommodate the increasing volume of material that we publish, to allow use of a more readable font and to make it easier to clearly present tables and figures, we will be increasing the size of the journal from number 82, spring 2009, forwards. To celebrate this anniversary we have commissioned short articles from two of our most distinguished historical demographers, Tony Wrigley and Richard Smith. Nigel Goose and Chris Galley have also written a short celebratory article, and together these will constitute the bulk of this editorial.

The first article included in this issue comes from Heather Falvey, who recently graduated with a PhD from the University of Warwick, and offers an extensive and detailed exploration of the ways of determining the precise population of an early modern forest region, that of Duffield in Derbyshire. In addition to the usual difficulties posed by inevitable reliance upon documents that were not drawn up with the needs of twenty-first century demographers in mind, and hence excluded a number of categories of inhabitant (as discussed by Goose and Hinde in LPS 77 and 78), forest populations pose further difficulties due to their proclivity to attract incomers as well as because sections of their dispersed populations were often omitted by the officials assigned the task of (partially) enumerating the population. Such omissions are sometimes indicated in qualitative accounts, which also provide more general information about population growth or decline and mobility, and these are used to help guide the quantitative estimates. Careful analysis of the full range of surviving quantifiable documentation produces disparate results, with the ecclesiastical returns suggesting a lower rate of population growth than do the tax assessments. The qualitative evidence, however, clearly indicates both growth and in-migration in the Duffield area, and hence provides a valuable guide as to which quantitative sources can best be relied upon.

The second article forms part of a ‘mini-series’, as Chris French builds upon his previous publications, both single and co-authored, on Kingston Upon Thames which have arisen from the local digitisation project of the area for the latter part of the nineteenth century conducted by the Centre for Local History Studies at Kingston University. While much ink has been spilled tracing
nineteenth-century migrants, far less has been written about those who did not move but stayed put for large parts, or the whole, of their lives. While persistence across two or three censuses has been examined before, usually for small communities, this study encompasses the whole of Kingston (a population of 12,370 in 1851 rising to 43,485 by 1891) and incorporates the five censuses taken between 1851 and 1891. The focus of the study is upon a fixed cohort of named residents of Kingston, born largely in the first half of the nineteenth century, who remained there for 30 or 40 years. Nominal record linkage between the censuses reveals that nearly 5 per cent of the 1851 population was still living in Kingston 40 years later, nearly 10 per cent persisted across four censuses, just under 20 per cent through three censuses and well over a third persisted in Kingston from one census to the next. In total 1,250 individuals persisted across four or five censuses, and French finds that men were more likely to remain for long periods than were women, while the lower classes demonstrated higher levels of persistence than did higher social groups. Residential mobility within Kingston tended to be over short distances, particularly within working-class housing areas, and neither occupational nor social mobility was common for persisters, particularly women.

Jon Healey, who has recently joined the LPS editorial board, provides our third article, an analysis of the impact of the mortality crisis of 1727–1730 upon Lancashire—the second worse mortality crisis to occur between 1541 and 1871 according to the calculations of Wrigley and Schofield in *The population history of England*, and one that was particularly severe in Lancashire. Apart from providing a substantial quantity of new regional data, Healey tests the validity of three assertions made by contemporaries about the social selectivity of mortality: that the relatively old were more likely to die, that the crisis was more severe in the countryside than the towns, and that its impact fell disproportionately on the poor. The crisis was not caused by famine, for there is no evidence of death from immediate hunger: raised mortality was the product of epidemic disease. This, however, coincided with serious dearth, and thus it is possible that weakened immunity or enhanced migration due to want of sustenance played a part. Healey finds that in Lancashire there were four separate peaks in burials standing out against a background of increased mortality: two in the late summer and autumn of 1727 and 1728, then two in the winter of 1728/9 and 1729/30. While in the north of the county the winter 1728/9 peak was most marked, in the south the earlier summer/autumn peaks were much more severe. The contemporary suggestion that the over-50s suffered most in Lancashire is found, tentatively, to be broadly correct, while the crisis also appears to have been more vehement in the countryside than in the towns. Finally, the evidence of both the poor law and the occupational profile of those who died suggest a clear connection between poverty and mortality.

Research in Progress is provided by Chris Galley, who takes a new look at measuring the stillbirth rate in early modern England. This is an oddly neglected topic, particularly as Tony Wrigley has argued that, nationally, a decline in the stillbirth rate in the eighteenth century allowed birth intervals to shorten and hence fertility to rise—but there has been no systematic attempt to
calculate a representative stillbirth rate from parish registers. Galley discusses the criteria for assessing whether or not stillbirths were regularly recorded in particular registers, and proceeds to collate information from previous publications and from new research to provide a sample of estimates for ten London, two Lancashire, two Yorkshire and one Essex parish, for various dates between 1578 and 1812. The data provides no evidence of levels of stillbirths as high as those suggested by Wrigley for the early modern period, which reduces the scope of any proposed eighteenth-century decline to explain changing fertility trends. Local population historians could contribute further to this discussion by examining evidence for stillbirths in their own localities, and communicating their results to Chris at c.galley@barnsely.ac.uk. Matthew Woollard provides a Research Note that focuses upon the 1801 census to show how even apparently very basic information, such as the size of the national population, can be open to various interpretations depending upon which table in the published census reports one looks at. Various estimates, both in the 1801 report and in those published subsequently, are at odds with each other, due to reallocation of military personnel, boundary changes and subsequent correction of errors of various kinds. This provides a salutary reminder that even ‘official’ sources need to be used with great care by population historians, whether at the local or national level. Finally, this issue includes our usual autumn feature, the Review of Recent Periodical Literature, provided this year by Andrew Hinde and Jon Stobart.

LPSS conferences

By the time this issue goes out the LPSS Autumn conference, ‘Is all population history local population history’, organised by Eilidh Garrett and held at the Humanities Research Institute, University of Sheffield on 15 November, will be a recent memory. A full report will appear in LPS 82 next spring. The ninth St Albans spring conference has now been organised, and will take place at the usual venue, in the Law Faculty of the University of Hertfordshire, on Saturday 18 April 2009. The theme for this year is ‘Household structures and household economies in Britain’. We can look forward to a fascinating programme which features both well-established and up-and-coming scholars, who will talk on topics that range from the seventeenth to the twentieth century, and across a wide geographical area. A flyer presenting the full programme and a booking form accompanies this issue of the journal.

Editorial matters

My thanks again go to Ken and Margaret Smith for typesetting LPS 81, and for helping to redesign the journal.

Nigel Goose
October 2008
The period since the end of the Second World War has seen striking changes in the scope and methodology of population history, and especially in relation to the period before the regular taking of censuses. Anglican parish registers provided a moderately full coverage of vital events, though recording baptisms rather than births and burials rather than deaths, so that totals of events could be estimated, but until the post-war period birth and death rates could be calculated only with very wide margins of error for lack of periodic counts of the population at risk. Thus it was possible to study short-term changes but not secular trends. It was possible to show, for example, that deaths might double in the wake of a severely deficient harvest, but it was not feasible to discover whether expectation of life was higher at the end of the seventeenth century than at its beginning. Two advances in demographic method overcame this problem and produced a rich harvest.

In Paris in the 1950s and 1960s Louis Henry developed the technique of family reconstitution. Family reconstitution, as the name implies, uses record linkage to knit together from individual records of birth (baptism), marriage, and death (burial) the life histories of all the members of a family. Family reconstitution, using the entries in parish registers for various purposes was, of course, practised widely long before Henry took an interest in it. It had been used for the study of historical demography in Scandinavia half a century before his work. But Henry gave the technique a new clarity and precision. He solved the problem of ensuring that information drawn from the reconstituted families was free from bias by specifying for how long each individual was in observation for a given risk; for how many years, for example, a child born in a given family could be treated as in observation in relation to the risk of dying. Avoiding bias in such calculations meant overcoming some taxing logical problems. But the reward was commensurate. Knowing the years at risk and the frequency with which a birth or death occurred meant that accurate demographic rates could now be calculated. Detailed and accurate estimates of a wide range of measures of fertility and mortality can be produced, and the fascinating history of changing age at marriage is revealed.

Twenty years later in Cambridge the technique of inverse projection was developed. Whereas family reconstitution depended on nominal record linkage, inverse projection, developed principally by Jim Oeppen, made use of simple totals of births and deaths to produce measures of fertility and mortality. Inverse projection paralleled family reconstitution, however, in that it produces vital rates for pre-census periods even though there is no source
available providing independent evidence of the size of the populations at risk. Family reconstitution is possible only when a parish register consistently includes sufficient detail to allow record linkage to be carried out with confidence. Inverse projection relies on counting events rather than linking them and can therefore be based on parish registers which record events with minimum detail. Since inverse projection also generates estimates of total populations, its use has made it possible to produce estimates of the population of England from the mid-sixteenth century onwards.

As a result of these two advances in method the population history of England from the mid-sixteenth to the mid-nineteenth century can now be described in comparable detail to that which is possible for the period after the taking of censuses became routine and a national system of registering births, deaths, and marriages was instituted.

In more recent decades technical advances of a different kind have produced equally notable changes, chiefly because of what might be termed the electronic revolution. Computerising family reconstitution, for example, has massively reduced the number of person-hours needed to transform individual entries in a parish register into a demographic history of the community in question. Where once it was necessary to consult registers in parish vestries, now much is available on line. Census enumerators’ books were always in principle available once 100 years had elapsed and were therefore accessible for research purposes, but where once this was a paper and pencil exercise now the entire set of such books can be consulted on line for some censuses and it is probable that all will be so available in the foreseeable future. Of equal importance are the various facilities which can be employed to organise and analyse data in electronic form. Spreadsheets and databases make it possible to achieve in hours what would in the past have taken weeks or months of work. And geographical information systems (GIS) enable information to be shown in a form which may bring to light features which were very hard to detect in conventional tables.

The impact of this revolution in population history on history more generally, and perhaps particularly on early modern history, has been profound. To describe it is beyond the scope of this short note, but it is visible in many branches and all levels of historical literature, not excluding school textbooks. It is symbolised in the founding and subsequent development of LPS. The contribution of local historians to population history in England has been notable and remains probably without parallel anywhere else. Peter Laslett claimed (and it is poetically just whether or not the words were actually spoken) that Louis Henry referred to the work of local historians in English population history as ‘le secret weapon anglais’. I have no doubt that Henry was right.
The late Michael Postan over 70 years ago, in a short but characteristically pithy essay on history and the social sciences, drew the telling contrast between general sociology and its preoccupation with ‘macro-cosmic’ subjects and antiquarian history with a preference for ‘microscopic’ approaches that were distinguished by a sort of ‘intellectual agoraphobia’, resulting in a focus on what he termed ‘small dark subjects’. Postan, of course, was highly critical of both extremes and saw the essence of historical approaches as being ‘microcosmic’, in that by focusing on the measurement of processes at a smaller scale it becomes possible to understand how larger patterns come about. It might be claimed that Local Population Studies from its inception would have gained Postan’s approval in that so much of what has been published in the journal has indeed been microcosmic in its ability to illuminate processes and practices at a parochial level and thereby better to comprehend those issues that have a significance at higher geographical levels of regional and indeed national aggregation. In fact the revolutionary approaches to the use of the parish register that occurred in the course of the 1960s form an extremely powerful instance of the issues with which Postan grappled. As a result we now know far more than we could have ever expected to do before the onset of a system of civil registration about marital fertility, marriage ages, age specific mortality, prenuptial pregnancy and a host of related issues from exploiting the registers that Thomas Cromwell brought into being in 1537. The contribution of local population historians to our knowledge of these matters is a source of envy among historical demographers working in most other countries.

One feature that is suggested by findings from studies undertaken at the level of the parish is the muted variation from place to place in some central aspects of demographic behaviour, notwithstanding some variation in others. Marital fertility appears to have been surprisingly similar from place to place, and represents a feature that has been seem as indicative of a relative ubiquity in the propensity of mothers to breastfeed well into the child’s second year of life, thereby giving rise to a strikingly regular pattern of birth intervals. Marriage age trends may also have been distinguished by wider local similarities than contrasts, and represent a trait that might have been expected to have varied more markedly geographically than has proven to be the case. Infant mortality, particularly in the last half of the first year of life, and early childhood mortality, are known to have been far more geographically varied than measures of fertility and nuptiality, reflecting environmental contrasts that almost certainly had striking implications for survival chances. Nonetheless, trends over time in infant mortality are also surprisingly consistent from place to place. Of course, it can be argued that the aforementioned generalisations might still be premature until we
have many more parish-based family reconstitutions to underwrite them. Such
cautions would be extremely wise, and only the foolhardy would not continue
to want to know far more about place to place variations in such demographic
measurements.

Notwithstanding such uncertainties it would seem clear that, unlike many parts
of continental Europe, variation from place to place in demographic parameters
of fertility and mortality are relatively muted in the English setting. This is not
the place to reflect in depth on this issue, but it remains a feature of the
demographic regime in England that persists through much of the nineteenth
century falls in marital fertility when comparisons are drawn at a broader
European level. Such geographical similarities might seem odd given that parish
and regional demographic growth rates varied enormously and suggest above
all that the demographic characteristics that most differentiated places from each
other were the propensities of individuals to migrate and the extent to which
places were net exporters or importers of people. At a national as well as local
level the role of migration was central. The worsening of mortality and lowering
of fertility over the seventeenth century, while driving down national population
growth rates and totals, were greatly exacerbated both by the redistribution of
the population increasingly into urban areas (notably London) and the relatively
high rates of emigration from England as a whole.

But for too long migration has been treated as a shadowy variable that is
recognised as having been important but not susceptible to measurement in the
manner of the more conventionally researched historical demographic
variables. If migration has figured in discussions, it has done so most
prominently in the debates about the demographic characteristics of individuals
retrievable through family reconstitution who for the most part do not display
life-time migration in comparison with those who did leave or enter parishes
after birth or marriage. However, means of capturing movement into and out of
parishes, both with reference to parish register-based analysis and through use
of a variety of other sources (and in particular through a better understanding
of the operation of the poor law and the laws of settlement) remain high
priorities for local historical research. Local population historians have indeed
made significant contributions to such issues, particularly using the enumerator
schedules of the nineteenth-century censuses, but there is much to be done,
particularly for earlier periods, if we are both to understand how the national
population stabilised at around 5 million in the seventeenth and how it
generated enormous regional variations in growth rates over the course of the
eighteenth and nineteenth centuries The study of migration, for far too long a
cinderella in the research interests of population historians, is deserving of pole
position in the research outputs of future generations of local population
historians who wish to make microcosmic contributions to their subject.

NOTE

1. M.M. Postan. ‘History and the social sciences’ published in The social sciences: their relations in
teaching (London, 1936) and being chapter 2 of M.M. Postan, Fact and relevance: essays on
LOCAL POPULATION STUDIES—FORTY YEARS ON

Nigel Goose and Chris Galley

Forty years on, growing older and older
Shorter in wind as in memory long
Feeble of foot and rheumatic of shoulder
What will it help you that once you were strong?
(Alan Bennett, Forty years on, 1968)

1968—the summer of love, student unrest and Alan Bennett’s first play—also saw the publication of the first issue of Local Population Studies. Now, forty years on, while some of us may be showing signs of age and physical decay, we believe that LPS is going from strength to strength, and as we enter our fifth decade of publication it seems appropriate to take time to reflect on the journal’s achievements, examine how it has changed and restate our aims for the future.

LPS was inspired by a summer school held at Madingley Hall in Cambridge organised by the Cambridge Group for the History of Population and Social Structure, which brought together local historians of population and social structure from across the country. The conference revealed the need for a forum which would allow contact and communication between historians working in different localities, a mechanism whereby enquiries could be answered and the techniques of historical demography explained and examined, and as a means of ensuring communication between the Cambridge Group and local population historians ‘upon whom so much depends’. In explaining how they perceived the relationship between the Cambridge Group and LPS, Peter Laslett, Tony Wrigley and Roger Schofield described it as ‘a forum for all who practice the art’ which would provide a two-way process of communication and instruction, while they also showed an early appreciation of the possible tension but essential compatibility between the large-scale and the local, encapsulated by the following:

We are very aware that by concentrating our resources on large and technical subjects we shall effectively deny ourselves the opportunity of studying in detail the links between population and local history. We believe that local studies are vital to a proper understanding of the relationship between population and social and economic history, and we look forward to learning much from the contributions of local historians.

The Cambridge Group’s two most important publications hugely benefited from this relationship, being based on the solid foundations of the work of
many local population historians, both in carrying out aggregative analyses of baptisms, burials and marriages from parish registers and in undertaking time-consuming family reconstitutions for individual parishes. Indeed, Wrigley and Schofield’s groundbreaking *The population history of England 1541–1871. A reconstruction* was dedicated ‘To the local population historians of England’.

The relationship between *LPS* and the growing community of amateur historians interested in demography continues. The editorial board of *LPS* has always included the work of both amateur and professional local population historians either as research notes, research in progress or full-blown articles. It prides itself on providing advice on local population history and it seeks to nurture amateur practitioners and help them publish their work. Its mission remains the same as in its original constitution: to promote the study of local historical demography and associated topics in social and economic history, and to facilitate the publication of the results of research in these areas. It remains a journal dedicated to the publication of population history at the local level, appropriately situated within the relevant regional and national context, with its remit broadly defined to encompass related areas of study, and a determination to continue to serve the widest possible constituency.

In order to evaluate *LPS*’s achievements it is appropriate to examine back issues of the journal, most of which are readily available, free of charge, via the Local Population Studies Society website. Over the last forty years the appearance of the journal has changed considerably. The first four numbers were entitled *Local Population Studies Magazine and Newsletter*. From number 5 the last three words were dropped, although later the Newsletter was resurrected as a separate entity. These early volumes do, however, have the feel of a newsletter about them: they were not professionally printed and the length and type of contributions varied considerably from issue to issue. Nevertheless, an examination of any of these issues reveals the wide range of topics covered. For instance, number 4 (Spring 1970) included articles on perinatal mortality in Hawkshead, Lancashire; deaths by suicide, drowning and misadventure in the same parish; marriage seasonality; population movement in seventeenth-century England; large Correspondence and Miscellany sections; reviews, and a report of local research being carried out. Number 11 (Autumn 1973) saw the arrival of *LPS*’s distinctive shiny cover and from number 38 (Spring 1987) the journal was reduced in size to A5. In recent years (number 66, Spring 2001, onwards) the journal has acquired a spine, which has allowed it to expand to 128 pages for some issues—about twice the size of many early issues. While the journal now may have adopted a more professional look, its ethos remains unaltered and its content as broad as ever. For example, number 78 (Spring 2007) contained articles on ethnicity and health, as revealed in the 1991 census and health services records; regional migration systems in Cornwall; and coroner’s inquests in early Victorian England and Wales; a report on the online historical population reports project; and a discussion of sources and methods for estimating local population sizes at fixed points in time.

Until 1996 the journal was published by the Cambridge Group for the History of Population and Social Structure, for much of that time in association with
the extra-mural department of the University of Nottingham, with Roger Schofield representing the Cambridge Group on the editorial board from the outset, and Christopher Charlton representing the University of Nottingham. From 1996–99 it was housed at the University of Essex, a move facilitated by the fact that Kevin Schürer, who was secretary to the editorial board of the journal for 13 years, had taken up an appointment there three years previously. In 1999 it moved to the University of Hertfordshire, where it has remained to the present day, under the editorship of Nigel Goose. Throughout its history LPS has published articles written by virtually all of the country’s leading historical demographers and it remains committed to publishing accessible local case studies of the highest level of scholarship. Each volume of LPS now contains three major articles together with shorter pieces such as ‘Debates’, ‘Research in Progress’, ‘Research Notes’, ‘Electronic Resources for Local Population Studies’, ‘Sources and Methods’ and alternating ‘Books Reviews’ (in the Spring issue) or an extensive ‘Annual Review of Periodical Literature’ (in the Autumn issue). LPS also publishes correspondence, although unfortunately we receive far fewer letters than previously. It also works closely with the twice-yearly Local Population Studies Society Newsletter, which publishes shorter articles and notes and provides a more informal means of communicating between members of LPSS. The distinctive editorial which allows the editor or board members to highlight topical issues remains an integral part of the journal.

A more formal analysis of the material published in LPS illustrates the breadth of topics covered by the journal and reveals how local population history has evolved over the last 40 years. Table 1 classifies each article from numbers 1–80 into four broad areas: Population Studies, Demography, Sources and Methods and Social History, with each area divided into a number of sub-categories.
This classification system proved to be far more difficult to implement than was first envisaged, for while many articles fitted neatly into the various subcategories many proved more difficult to classify. For instance, May Pickles, ‘Mid-Wharfedale, 1721–1812: economic and demographic change in a Pennine dale’, LPS 16 (1976), 12–44, examines the relationship between population change and occupational structure in a number of Yorkshire parishes, although it also encompasses and discusses a range of other issues such as nonconformity. After some thought this was placed into the population size category, but equally it could have been placed in the occupational category. Indeed, the interdisciplinary nature of many of the articles published in LPS remains an important and integral feature of the journal.

Above all Table 1 illustrates the wide range of material published in LPS. As with any relatively new area of research there has been considerable interest in discovering new types of sources and in establishing the methodological foundations of the subject. The number of articles dealing with sources and methods has remained roughly constant over time, and some have sparked considerable debate and further research. Now that local population history is more mature and a degree of consensus has emerged, a new series of pieces, ‘Sources and Methods’ (LPS 76 onwards) has attempted to provide overviews of various methodological issues, although unanimity of opinion still occasionally remains elusive. Not surprisingly, many of the early articles covered similar ground to the Cambridge Group’s major publications. Single place studies and the topics of mortality and migration have remained ever popular. By comparison fewer studies of fertility and nuptiality have been published, which is probably in part due to it being harder and technically more difficult to undertake these types of demographic analysis within the context of a small-scale study. Over the last decade there has been a noticeable shift away from mainstream population history towards what could be termed applied population studies. While this trend more or less coincided with LPS’s move away from Cambridge, it did not represent a conscious policy decision by the editorial board; rather it reflected the type of material that has been offered for publication. In part this shift was probably a consequence of the publication of The population history of England (1981) and, later, English population history from family reconstitution (1997), which represented the culmination of the Cambridge Group’s long-term project to produce national estimates for a wide range of demographic measures based on local population data. In a sense the task was complete, although—as we will suggest below—a case can be made for regarding the national measures calculated by the Cambridge Group as a new beginning rather than an end. The rise of postmodernism and the new cultural history may also have had an impact, with some scholars adopting greater scepticism towards the certainties that hard, quantitative analysis seemed to provide. Whatever the reason, some of the younger generation of local population historians have turned their attention towards topics such as poverty (especially workhouses), social structure, gender and occupations. Clearly the nature of local population studies is changing, as many of the issues raised in publications such as Peter Laslett’s The world we have lost (London, 1965) have now been addressed.
Nevertheless, large quantities of local population sources still lie as yet undisturbed in local record offices, and significant gains in our understanding of the processes of population change can still be made from undertaking small-scale, local studies.

In Table 2 *LPS* articles have been classified by region. As can be seen the vast majority of articles, 84 per cent, are concerned with England and the whole of the country is covered with little significant change being evident over time. It is likely that this pattern largely reflects the distribution of population historians, since most individuals carrying out local studies are likely, initially at least, to be interested in the place where they live or with which they have close associations. Scotland is discussed in 9 per cent of all articles, which roughly corresponds to its proportion of the UK’s population. It is therefore puzzling why so few articles have been published that deal with Wales or Ireland. While the parish register material for England is of a far superior quality to that of the rest of the UK, this does not apply to nineteenth and twentieth-century population sources. Indeed, more non-UK articles such as Philip Ogden, ‘Patterns of marriage seasonality in rural France, *LPS* 10 (1973), 53–64 and Rudolf Andorka, ‘Birth control in the eighteenth and nineteenth centuries in some Hungarian villages, *LPS* 22 (1979), 38–43, have been published than comparable studies from Wales and Ireland. Again such patterns merely reflect the amount and type of articles that are sent to us. Any high quality, relevant, local study will be published, and the board would especially welcome contributions from regions less well represented in Table 2.

To end this short analysis Table 3 classifies *LPS* articles by period. Once again the Table does not do full justice to the long-term focus of some articles, which are classified only by their starting date. It does, however, reveal that during *LPS’s* first 10 years most articles were concerned with the parish register period (1538–1837), thereby reflecting the Cambridge Group’s main research interests. However, over the last forty years there has been growing interest in the nineteenth century, no doubt in part due to the greater variety and availability of nineteenth-century sources and the ease with which this material can be accessed. By comparison the paucity of medieval sources, and the technical problems associated with their analysis, has meant that far fewer studies from this period have been published, a situation that is not likely to change. The

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Table 3  

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<td>56</td>
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<td>90</td>
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</tbody>
</table>

Note: Only the earliest date is recorded in the table—an article concerned with the period 1650–1871 would therefore be allocated to the 17th century.

The twentieth century has also remained a neglected period, but as the 100 years rule brings further census material into the public domain, we would expect more studies from this period to be submitted to the journal.

Forty years on *Local Population Studies* and local population history remains in rude health, even if the ruddy glow of callow youth has now been superseded by more subtle, autumnal tones. But while some of us on the editorial board may well be at least starting to consider wearing the bottoms of our trousers rolled, new blood continues to come through in a wide variety of garbs. For while the more technical demographic procedures may, to some degree at least, have fallen out of fashion among younger scholars, local population history and associated aspects of social and economic structure and development continue both to intrigue and to inform.

There are both theoretical and common sense reasons for this. From the theoretical perspective, while postmodernism rails against overarching grand theory and statistical certainty, it also promotes an appreciation of diversity and particularity—the very diversity and particularity that lies at the heart of local history in general, and local population studies in particular. From the common sense perspective, it is not difficult to understand why local studies remain important, for even so small a country as England presents a great diversity of different geographical, economic and social forms, some reflecting basic physical parameters, some harking back to ancient settlement, while others have been superimposed since for a variety of reasons that defy simple analysis. In so many respects, therefore, it is impossible to write about the nation as if it were a single and uniform entity, except perhaps with regard to economic policy or social administration at national level, although even here implementation was often anything but consistent. It is for this reason that the historiography of the Industrial Revolution has recently turned its face against the macro-economic approach of the econometrician, to emphasise the importance of both local and regional diversity. In the field of population history, we also hear voices raised against excessive reliance upon the national aggregates presented in the publications of the Cambridge Group referred to above, for if they provide a vital framework within which further work can proceed, they do not apply to all places at all times, and great scope remains
for further exploration at the local and regional levels. For these reasons, to which we might add the emotional attachment that we so often feel to particular places and their history, local population studies will continue to thrive and—as long as it continues to reach out to wider realities, retains an essentially comparative perspective and examines the often intricate relationship between demography, politics, economy and society—it will remain entrenched in the minds of the nation’s academics, as well as in the hearts of the local population historians of England.

NOTES

2. ‘CAMPOP and LPS’, LPS 1 (1968), 4.
3. E.A. Wrigley and R.S. Schofield, The population history of England 1541–1871. A reconstruction, (London, 1981), 490–2; E. A. Wrigley, R.S. Davies, J.E. Oeppen and R.S. Schofield, English population history from family reconstitution 1580–1837 (Cambridge, 1997), 561–2. In the Cambridge Group’s files there are: 30 family reconstitutions of English parishes; aggregate studies from 750 parishes; some 600 documents comprising community listings; and a random sample of 300 English parish registers which record by sex and occupation the ability to sign the marriage register. Most of these tabulations were undertaken by amateur population historians: see N. Goose, ‘Local Population Studies: history, demography and locality’, The Local Historian, 34, 1 (2004), 37–44.
9. For a recent statement, with both a northern and an international flavour, see B. Lancaster, D. Newton and N. Vall eds, An agenda for regional history (Newcastle upon Tyne, 2007).
Christopher French

Christopher French was until recently Reader in History at Kingston University and Director of the University’s Centre for Local History Studies. He is now an Honorary Research Fellow attached to the Centre.

Introduction

It is no easy task to measure the degree of persistence within a local community, or, in particular, to identify those individuals who remained within their local community over a number of years. The records required to carry out such an inquiry undoubtedly exist—in the form, for example, of parish registers of baptisms, marriages and burials, municipal burial registers, poll books, electoral registers and census enumerators’ books—all of which list individuals at various stages of their life. However, in order to trace the same individuals through a number of these records, it is necessary first to build a comprehensive database containing details on all of the individuals in the records chosen. The second stage is then to apply techniques of record linkage to this data in order to identify individuals who appeared more than once in the database. For any medium-sized community, such as Kingston, both tasks are extremely time-consuming and require a reasonable degree of computing competence. But once these two stages of research have been completed, the historian is in a position to build up a comprehensive picture of the local community being studied. In particular, it will be possible to subject those individuals who appeared more than once (and often many times) in the records to detailed examination. Historical analysis of persistence is important since it provides insights into such questions as the characteristics of those who stayed within a given community or locality, the extent (if any) to which these stayers experienced occupational, social and residential mobility over time, and the ways in which the persisters themselves differed from other groups of people.

Persistence can be identified at a number of different spatial and social levels: for example, persistence over time within a specific geographical area; within a given administrative area; within a specified street or address; and, more problematically, within a community; however that community might be defined. Traditionally, persistence has been measured by calculating from specified samples of data the number of individuals in a given locality who could be identified in two or three consecutive censuses. For example, studies
of persistence based on American and Canadian census data found that Boston had a persistence level of 39 per cent between 1850 and 1860; Hamilton, Ontario, 35.3 per cent (of household heads) between 1851 and 1861; and Newburyport around 40 per cent between 1850 and 1860. Similarly, in this country, Dennis found that 37.1 per cent of his Huddersfield sample persisted in the same census enumeration districts between 1851 and 1861, whilst Daunton’s analysis of local directories identified a similar degree of persistence (41.2 per cent) in Cardiff between 1884 and 1894. Further census-based studies of persistence in rural localities have tended to reach similar conclusions, with Wojciechowska noting a 38 per cent level of persistence in Brenchley (Kent) between 1851 and 1861, dropping to 31 per cent between 1861 and 1871. However, in the Wiltshire village of Berwick St James, Hinde found higher levels of persistence than those identified elsewhere, 54.6 per cent between 1851 and 1861 and 52.8 per cent between 1861 and 1871. Despite this final example, Pooley has concluded with some justification that, ‘There is thus a considerable degree of agreement between the persistence rates calculated, despite the varying sources and methods of linkage which have been used.’

This research into persistence levels also identified a number of factors relating both to the individual and to the community which helped to determine the number of movers and stayers. In Brenchley, for example, Wojciechowska found that, not surprisingly, there was a positive relationship between persistency and birthplace, that persistency increased with age, that daughters were less persistent than sons and that persistency was higher among the less skilled workers such as agricultural labourers than among professionals. Similarly, in the rural community of Berwick St James, Hinde found that ‘those who moved away from the parish were overwhelmingly young’, and that females were more likely to move away than males. This latter finding was also characteristic of the Berkhamsted region of Hertfordshire at mid-century, ‘with females showing a slightly higher propensity for migration than males’. The level of movement was also greater among the younger cohorts of the region and among the higher social classes. Age, gender and social class were clearly important influences on levels of persistency.

As in many of these earlier studies, the major sources used in this analysis of Kingston persisters are the census enumerators’ books (CEBs), but not for only two or three censuses or for sample areas but for the whole of the Kingston census area for each census year between 1851 and 1891. However, it is necessary to qualify what is meant by persistence in this, and other, studies. In the first place, looking at persistence between only two censuses is relatively straightforward, but analysis extended across five censuses needs to acknowledge the problem of truncation of the period of research at the beginning and end. Thus a person living in Kingston and recorded in the 1851 and 1861 censuses may have been living in Kingston for decades before 1851, whilst a person appearing in the 1881 and 1891 censuses might stay in Kingston and appear in subsequent censuses. But none of these individuals would be counted as persisters. The current analysis of persisters across four or five censuses, therefore, is of a particular cohort of Kingstonians born largely in
the first half of the nineteenth century. Secondly, persistence levels, and decisions taken by individuals whether to move or stay, will be influenced by both ‘communal’ and ‘individual’ factors. Communal factors include, for example, the economic and social opportunities and disadvantages of moving to or from a rural or urban environment, whilst influences on the individual include age, gender, skills, social class and life-cycle stage reached. As a result, different communities could experience different levels of persistence, especially between those experiencing rural decline compared to those experiencing rapid urban expansion. As with the research already cited, the aim of this paper is to examine the number and characteristics of those who remained within a given locality, but one which was not entirely rural or entirely urban—the evolving suburban locality of Kingston between 1851 and 1891.

Extending the analysis across four or five censuses raises a final interpretative problem compared to analyses based on only two censuses. Two-census, aggregate studies can identify the persisters (as shown above, normally at between 30 and 40 per cent of the original population), analyse their age, sex and occupational profiles, and compare these with those who moved. Such profiles will, of course, feature as part of the current analysis and the relationship between age, gender and occupation, and decisions to move or stay, will be considered. However, the Kingston persisters were a fixed cohort of named individuals who remained in the locality for four or five censuses. They were a very small percentage of the total population and, obviously, their gender profile remained the same throughout the period while their age profile increased progressively with each census. Age and gender affects the level of persistence and their impact will be analysed here, but only as part of the overall profile of the Kingston persisters.

The Kingston area and its population

Throughout the period 1851–1891, the Kingston census area included not only the borough of Kingston upon Thames (by far the largest component) but also the Improvement Commissioners’ District of Surbiton; Malden Russet; Ham; Hook; Tolworth and Chessington. The population of this area increased from 12,370 in 1851 to 43,485 in 1891, as indicated in Table 1, an increase associated with the arrival of the railways, economic change and, in particular, in-migration stimulated by middle class preferences for the attractions of a suburban life-style away from the physical and moral dangers of living in metropolitan London. Consequently, the local economy experienced a decline in agriculture and manufacturing, compensated for by a growth in dealing (especially retailing), domestic service and public service and the professions. Such shifts in economic activity were both a cause and an effect of the area’s changing social and suburban make-up. No longer dependent on agriculture and key local industries such as brewing, malting and milling, by the second half of the nineteenth century Kingston was maturing into ‘the economic focus of Surrey and its own suburbs…[were gaining] that dual function—London commuter town and regional economic centre—which it has maintained ever
since.

However, although the Kingston area was developing into a relatively prosperous suburban area by the closing decades of the nineteenth century, it also included a number of slum areas. In particular, the Back Lanes adjacent to the Thames river front and the Canbury area north of the railway line were characterised by high levels of infant mortality, overcrowded working class housing and deteriorating environmental conditions. This community of contrasts provides the context to the life-cycles of the Kingston persisters.

Methodology

As already indicated, the main building blocks for this research were the construction of the database from the Kingston CEBs for each census 1851–1891 and the application of record linkage techniques to identify the same individual in two or more censuses. At the end of the record linkage phase of the research, a significant number of valid links identifying the same person in more than one census had been established and the Kingston persisters, in particular, could be identified. For example, the data on persistence in Table 2 indicates that nearly 5 per cent of the 1851 population was still living in Kingston 40 years later; nearly 10 per cent of Kingstonians persisted through four censuses; just under 20 per cent through three censuses; and well over a third of Kingstonians persisted in Kingston between one census and the next.

The current analysis will focus on the 593 individuals identified as living in Kingston in each of the five census years between 1851 and 1891. Additionally, two other groups were also identified from the database as Kingston persisters: those who, according to their year of birth, calculated from their age, were born in Kingston after 1851 and then could be traced through the next four censuses (380 in total); and those who appeared in the four censuses 1851 to 1881 but then, according to the burial dataset, died before the 1891 census (277 in total). This produced a total of 1,250 Kingston persisters.

A number of issues need to be considered to provide context to the levels of persistency identified. In the first place, there are four main reasons why individuals are not traceable between two censuses: they are absent from their

<table>
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<th>Census year</th>
<th>Number</th>
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<tr>
<td>1851</td>
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</tr>
<tr>
<td>1861</td>
<td>17,576</td>
</tr>
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<td>1891</td>
<td>43,485</td>
</tr>
<tr>
<td>Total</td>
<td>137,297</td>
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</table>

Table 1 Number of records in the Kingston census database

Source: Census enumerators’ books for Kingston upon Thames, 1851-1891: TNA HQ 107/1603 (for 1851); TNA RG 9/455-56 (for 1861); TNA RG 10/658-62 (for 1871); TNA RG 11/832–38 (for 1881); TNA RG 12/604–18 (for 1891)
household on census night; they have moved away from the area; their details have been recorded in such a way that they have not been traced via the system of record linkage used; or they have died. Those who died and were buried in Kingston can be discovered because the census returns have been linked to the available burial records (municipal and parish) for the Kingston area, giving the following numbers: for individuals in the 1851 census only and buried before 1861, 337; the 1861 census only and buried before 1871, 320; the 1871 census only and buried before 1881, 571; the 1881 census only and buried before 1891, 763; the 1891 only census and buried before 1901, 812. Comparable numbers can be calculated for those individuals who appeared in two, three or four censuses and subsequent burial records within ten years of their last census appearance.11

Secondly, because the census returns only allow persistence to be established at ten-yearly intervals, the birth places of children of the persisters were also analysed to see to what extent, if at all, the persisters moved out of Kingston (and back again, since they appeared in the next census) between censuses as indicated by where their children were born. This was done by filtering out of the database all households with a male head aged between 20 and 40 for each census year 1861–1891, producing a total of 591 households. Such a sample would identify most of the children born to the persisters between 1851 and 1891. Analysis showed that the vast majority of children born to Kingston persisters were also born within the Kingston census area, with only 34 families moving once between censuses and one family moving twice as indicated by their children’s place of birth.

A third possible problem is that some female persisters could be missed because, as a result of marriage and a subsequent change of name, they have

### Table 2  Population persistence in Kingston upon Thames 1851–1891

<table>
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<tr>
<th>No. of censuses</th>
<th>Years</th>
<th>No.</th>
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<td>1851–1881</td>
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<td>9.6</td>
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<tr>
<td></td>
<td>1861–1891</td>
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<td></td>
<td>1871–1881</td>
<td>10,346</td>
<td>36.6</td>
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<tr>
<td></td>
<td>1881–1891</td>
<td>13,498</td>
<td>37.1</td>
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</tbody>
</table>

**Note:** These are straight links indicating, for example: (a) 4.8 per cent of the people listed as residents in Kingston upon Thames in 1851 were found in the CEBs for 1891; (b) the 1,185 individuals who could be identified in the 4 censuses 1851-1881 include the 593 individuals who lived to appear in the 1891 census as well.

**Source:** As for Table 1
not been identified as persisters. However, as the techniques of record linkage used in this project have included marriage registers, many brides have been identified following their name change. So the numbers of any female persisters which have been missed should be relatively small, although it is not possible to specify an exact number.\textsuperscript{12}

A final methodological point concerns the protocols used in allocating individuals to occupational and social class codes, since occupational and class mobility over time are important questions which can be illuminated by the experiences of those who remain within a given locality. The protocols followed for coding occupations were those established by the well-known Booth-Armstrong system which codes all occupations to a sector of the economy (for example, agriculture); a sub-sector (for example, farming); and an occupation (for example, agricultural labourer). The sectors of the local economy coded were: agriculture; mining; building; manufacturing; transport; dealing; industrial service; public service and professional; and domestic service. However, this research has gone beyond simply coding to sectors of the economy (stage 1) and has also taken into consideration the type of work undertaken (stage 2). For example, a clerk associated with a specific sector of the economy was, first of all, coded with that sector (that was how clerks were allocated in the aggregate data compiled from the CEBs up to and including 1871); and secondly coded as a commercial clerk (this was how clerks were allocated in the aggregate data compiled from the CEBs from 1881 onwards). Such double coding allows subsequent analysis to account for the change in the way in which clerks, in this example, were classified nationally after the 1871 census, and enables comparisons still to be made with other studies based on the Booth-Armstrong sector worked-in classifications. Additionally, it allows the occupational structure of Kingston to be analysed in more depth, based as it is on two sets of codes which are comparable over time and place, consistent and indicate not only economic sector in which people worked but also type of activity undertaken. In this study, the occupation codes analysed are those relating to types of work undertaken. But, given the flexibility of the database used, occupation codes reflecting sector of the economy could be readily analysed as well.

Type of work performed is also more relevant than economic sector when translating occupations into social class. Again, the protocols established by Armstrong have been followed in this analysis. All male heads of household were assigned to one of the five social classes specified in the Registrar-General’s 1951 \textit{Classification of Occupations 1950} (HMSO): Class I, professional etc occupations (for example solicitor and surgeon); Class II, intermediate occupations (for example teacher and bookkeeper); Class III, skilled occupations (for example bricklayer and plumber); Class IV, partly skilled occupations (for example agricultural labourer and brickmaker); Class V, unskilled occupations (for example labourer and hawker). Modifications were then made ‘upon consideration of individual cases’ in order to take into consideration, for example, ‘servant-employing’ and the ‘employment of others’, to judge whether a number of individuals in the dealing and
manufacturing sectors should be in Class II or Class III: initially, all individuals in these occupational groups were placed in Class III but transferred to Class II if they were employers. For example, in the Kingston census of 1881, Wilberforce Bryant recorded his occupation as ‘merchant’. Following Armstrong’s recommendation such a description would place Bryant in social class III along with ‘All those described as dealers or merchants in this, that or the other’. However, ‘on consideration of his individual case’, Bryant was found to be living in one of the most select areas of Surbiton (within the Kingston census area) and employing a total of seven live-in servants, elevating him to social class II. Indeed, as one of the proprietors of the Bryant & May Match Company, the number of people he employed qualified him for social class I. Several hundred individuals in the Kingston database were checked in this way to obtain a sharper distinction of social class between individuals with similar occupations within the traditionally large Class III.13

Finally, when considering mobility between occupations and the five classes outlined above—an important aspect of this article—it should be noted that census recording of occupations often lacked precision, especially when generic descriptions such as ‘labourer’, ‘engineer’, ‘farmer’ or ‘clerk’ were recorded. This could have implications for assessing social mobility over time. For example, a move from ‘general labourer’ to ‘agricultural labourer’ represented (according to the official schema) a move from Class V to Class IV. But the extent to which this represented genuine upward social mobility is open to question. At times, therefore, when comparisons are being drawn in the above analysis, Classes IV and V are combined, as are and Classes I and II. Class III remains a separate category.

Persisters’ profiles

The next aim of this paper is to analyse the profiles of the 1,250 persisters identified, with particular emphasis on areas of residence and residential mobility, and on occupational and social profiles and mobility. By taking the individual as the main unit of analysis, this analysis will differ from most studies using the CEBs as their core source, which tend to produce conclusions based on aggregate data. Such data will, of course, be used in the following analysis, but aggregate data will be illustrated by the experience of named individuals: ordinary men and women living and working in Kingston in the second half of the nineteenth century. To begin with, certain characteristics of the persisters will be identified, and throughout the analysis comparisons will be made with the population of Kingston as a whole.

Of the 1,250 persisters, 728 (58 per cent) were male and 522 (42 per cent) were female. For Kingston as a whole, the gender balance was rather different consisting of 48 per cent male and 52 per cent female in 1851, dropping to only 45 per cent male and rising to 55 per cent female in each of the remaining censuses of the nineteenth century. A possible explanation for this difference can be found in the rapid expansion of job opportunities for female domestic servants. Domestic service was the major employer of women in Kingston
during the nineteenth century, and the majority of female domestic servants were young, single and born outside of the Kingston area. Their migration into Kingston helped to tip the overall gender balance in favour of females. Another possible reason is that some Kingston women, having married husbands from outside of the area, moved away from Kingston with their husbands, thereby reducing the potential number of female persisters. As Pooley and Turnbull have confirmed in their national analysis of migration from the parental home, the main reasons why women left home on average earlier than men in the nineteenth century were to get married or to enter domestic service.

Analysis of place of birth information in the CEBs in more detail also indicates differences between the persisters and the local population as a whole. A large proportion of all Kingstonians were born outside of the area before settling in Kingston, whereas—not surprisingly—the majority of the persisters were also born in Kingston. Thus the proportion of the total population born in the Kingston area was a reasonably consistent 40 per cent in 1851; 36 per cent in 1861; 35 per cent in 1871; 36 per cent in 1881 and 37 per cent in 1891, whereas the percentage of the persisters born in Kingston was significantly higher at 61 per cent. As indicated, this is not unexpected given that it is persistence which is being analysed here, but it is rather surprising that as many as 489 (39 per cent) of the persisters were in fact born outside of Kingston before moving into, and staying in, Kingston. Of these, there were slightly more males (253) than females (236), but for those persisters who were also born in Kingston, there was a clear majority of males (473) over females (285). In fact, 65 per cent of all male persisters were also born in Kingston whereas this was true of only 55 per cent of all female persisters. One conclusion to be drawn from these variations—and from the fact that male persisters outnumbered female persisters—is that female Kingstonians were generally more physically mobile than male Kingstonians, a conclusion which reinforces the research of Hinde, Goose and Pooley and Turnbull already cited.

In certain respects, therefore, the characteristics of the Kingston persisters were rather different from the characteristics of the local population as a whole. The next step in the analysis is to examine the persisters in more detail as they lived through the second half of the nineteenth century and, in particular, to consider their residential and occupational mobility. It will be shown that the general profile of these persisters, with one or two exceptions, was one of a predominance of working class Kingstonians engaged in both skilled and unskilled occupations, and living in the poorer parts of the town. The better off, better educated and more ambitious professional classes, on the other hand, were more mobile and did not feature to any great extent in this list of persisters. However, within Kingston the persisters were very mobile and one question which can be considered from the linked material underpinning this analysis is the extent of residential mobility. As Pooley and Turnbull have argued: ‘The only way to create life-time residential histories is to undertake large-scale record linkage at the individual level.’ For example, of the 593 individuals appearing in each of the five censuses, 1851–1891, we have the five
streets of residence for 449 of them. Table 3 indicates the degree of residential mobility of these 449 individuals.17

It can be seen that half of the persisters had at least four different addresses over the study period, and only 20 individuals had the same address in each census. This, of course, does not include any residential movements made between census years and would indicate that Kingston was characterised by a high degree of residential mobility. However, the majority of these moves were over relatively short distances, involving moves ‘round the corner’ or moves within a few streets, most of which were in areas of poor housing. From the many examples which could be given, the ten year old William Burton lived in Acre Road in 1851, round the corner in Cowleaze Road in 1861, back in Acre road in 1871, Cowleaze Road again in 1881 and, finally, in Elm Road (less than ¼ mile away) in 1891. Similarly, residents moved frequently around the slum area of the Back Lanes. For example, the 24-year old Emma Ellis was living in Back Lane in 1851, Waterman’s Passage in 1861, Beer Lane in both 1871 and 1881, and Water Lane in 1891.18 Such frequent moves seem to have been typical of other communities in the nineteenth century, especially those which were predominantly working class. For example, in four streets in the Lower Ward in Tottenham, ‘there was a high rate of residential mobility in the study area, not only on a decennial basis, but throughout the period 1861 to 1891’.19

Possible explanations for this level of residential mobility among the Kingston persisters include the fact that before 1914 the majority of households rented their accommodation from the private housing sector and did not have security of tenure. A more demonstrable reason for residential mobility, however, was a change in family circumstances, with children, for example, leaving the parental home in order to marry and to set up (or join) another household. This is reflected in the changing household status of the persisters as they got older and moved through their lives from a state of dependency to independence. For example, in 1851 the average age of this cohort of persisters was 19.4 years and only 87 (14.7 per cent) of them were recorded as heads of household (average age 32.2 years), whereas 328 of them (average age 11.1 years) were recorded as offspring of the head. By 1891, however, 394 (66.4 per cent) of the persisters were now heads of their own household (average age 59.5 years),

<table>
<thead>
<tr>
<th>Different addresses</th>
<th>No. of Individuals</th>
<th>% of Individuals</th>
</tr>
</thead>
<tbody>
<tr>
<td>5</td>
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<td>20.9</td>
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<tr>
<td>4</td>
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<td>89</td>
<td>19.8</td>
</tr>
<tr>
<td>1</td>
<td>20</td>
<td>4.4</td>
</tr>
<tr>
<td>Total</td>
<td>449</td>
<td>100.0</td>
</tr>
</tbody>
</table>

Table 3 Residential mobility in Kingston upon Thames 1851–1891

Source: As for Table 1
and only 21 (average age 44.5 years) were recorded as offspring to the head. This progression is confirmed by the changing place within the household of those 93 persisters who experienced at least five different addresses during their lifetime, shown in Table 4. Many individual moves reflected a change in household status and family circumstances and, in many cases, in economic necessity as well.

Such moves can be illustrated by a number of case studies made possible by the linked data being analysed here. For example, 12-year old Emma Skinner was living with her parents in Cottage Grove in 1851. Ten years later she was married and living with her husband Matthew Walter and one daughter in Hope Avenue. By 1871 the family had been enlarged by two more daughters and had moved to Mill Street. In 1881, Emma Walter was a widowed head of household living with one of her daughters in Cambridge Grove Road, before, by 1891, moving in with a married daughter and her husband in Acre Road. Similarly, in 1851, four year old Robert Burton was living with his parents Robert and Mary Ann Burton in Forty Acres (Acre Road) with his two sisters and a brother. Ten years later he was living in Cowleaze Road with his sisters and his brother who was listed as head of household. By 1871, Robert Barton was lodging with Benjamin and Susannah Burggy and their daughters in London Road, but ten years later he was married and head of his own household (his wife, a niece and a lodger) in Fairfield East. Finally, by 1891 he had moved with his wife and his niece to Hardman Road, with the household being completed by two boarders and a nephew.20

Although the Kingston persisters tended to move house frequently, they exhibited less change when it came to occupations. Analysis of the occupations of the Kingston persisters indicates that their occupational profile was rather different to the occupational profile for Kingston as a whole; that the persisters tended to stay in the same occupations throughout their working lives; and that these occupations were largely manual occupations, some skilled and semi-skilled but many of an unskilled nature. Each of these three areas will be examined in the next section.
Occupational and social class profiles

In order to compare the occupational profile of the persisters with that of Kingston as a whole, the census of 1881 has been chosen on the grounds that, in 1881, 892 (690 males and 202 females) of the 1,250 persisters recorded their occupation, and this 71.3 per cent employment rate was the highest achieved by the persisters in each of the census years 1851 to 1891.21 The results of this comparison are shown in Figure 1, which also provides comparable data for England and Wales. Nationally, manufacturing, agriculture, mining and transport accounted for 55 per cent of all occupations. These sectors had far greater weight in the country as a whole than they did in the local Kingston economy, where they accounted for 23.5 per cent of the total. Within Kingston, although manufacturing was still the second largest sector of the local economy, accounting for 15.1 per cent of all occupations, domestic service, dealing, public services and the professions were the more rapidly expanding sectors of the Kingston economy in 1881—a typical situation for an emerging suburban area attracting more and more middle class incomers. In contrast with Kingstonians as a whole, the building and manufacturing (especially dress) sectors occupied a larger proportion of the persisters, 20.5

per cent and 24.6 per cent respectively. Nearly half of the persisters, therefore, worked in sectors of the local economy which were dominated by manual unskilled and skilled occupations. These included painters, plasterers, carpenters, slaters, bricklayers and plumbers from the building sector, general labourers, and dressmakers, tailors and bootmakers from the manufacturing sector. For example, among the 892 persisters recording their occupations in 1881 there were 110 unskilled labourers of various types (representing 15.9 per cent of all male persisters), but also 43 carpenters and joiners, 32 painters and decorators, 22 bricklayers, 12 plasterers, 9 plumbers, 10 tailors and clothiers, and 32 boot and shoe makers. These were male occupations, and indicate that the persisters were concentrated in occupations which provided necessary skilled manual services for the increasing number of middle and lower middle class incomers who in turn tended to work in the service and professional sectors of the economy. Similarly, among the 202 female persisters who recorded their occupation in the 1881 census, there were 46 dressmakers, milliners and seamstresses whose skills would also help to service the expanding middle class market. However, female persisters were most prominent at the lower end of the occupational ladder, for example, laundresses (57) and domestic servants (41), which between them accounted for virtually 50 per cent of all employed female persisters in 1881, a situation similar to Kingston’s female workforce as a whole which was also dominated by domestic service.

Nor did the majority of the persisters experience any significant occupational mobility. For example, of the 593 persisters who could be traced through all five censuses, 1851–1891, 145 of them recorded their occupation each time and, of these, 72 (50 per cent) remained in the same skilled, semi-skilled and unskilled occupations throughout their working lives, including those who simply moved between various labouring jobs. Similarly, of the 277 persisters who appeared in each of the four censuses, 1851–1881, and then died before the 1891 census, 113 of them recorded their occupation each time and 69 (61 per cent) of these again remained in the same job. The majority of those who did change occupations tended to do so between different labouring/unskilled types of jobs such as agricultural labourer, general labourer, gardener and carman. Female persisters, in particular, did not experience any occupational mobility, with virtually all of them staying in the same service jobs throughout their working lives.

However, for a small number of the male Kingston persisters there is evidence of intra-generational upward occupational mobility. For example, William Brown began his working life as a carpenter’s apprentice in 1851, rising to a carpenter in 1861, a carpenter and builder in 1871 and a builder employing five men in 1881. A similar path from being a skilled worker such as carpenter, bricklayer, plumber or stonemason to builder was followed by John Chester, Joseph Goulter, Adam Gilley, George Mudie, William Blackall, James Boxall, Frank Hamilton and James Wood, whilst James Goodchild progressed from an agricultural labourer in 1851, to a labourer in both 1861 and 1871, to a bricklayer in 1881 and, finally, to a builder ten years later. Opportunities in the
building industry were generated by the belated arrival of the railway at Kingston in 1863 and the rapid population growth which followed, from 17,576 in 1861 to 27,487 in 1871. Speculative builders and developers drove forward the physical expansion of the town, operating, for example, on lower Kingston Hill, where plots of land were purchased by the developers from the National Freehold Land Society, from the 1850s onwards; on the Spring Grove estate where 110 houses were built in the first ten years of the estate’s life, following the first sale of land in 1865; and on the Canbury estate, much of which was developed by the British Land Company from 1869 onwards.

A sharper perspective on the make-up of the Kingston persisters and on their occupational stability and limited degree of occupational mobility can be provided by further analysis of their class profile as indicated by their occupations. In the first place, as has been shown, although the majority of persisters remained in the same type of occupation—and therefore the same class—throughout their working lives, there is some evidence of upward social movement. By comparing the social class (as indicated by occupation) of the 166 Kingstonians recording occupations which could be translated into class in both censuses of 1851 and 1891, 99 (60 per cent) remained within the same class, 53 (32 per cent) improved their class and 14 (8 per cent) experienced a decline in their class position. Of the latter, the movement was normally from Class IV to Class V (for example from an agricultural labourer to a general labourer, or from a laundress onto parish relief) although Lewis Loveland is recorded as a schoolmaster in 1851, a tailor ten years later and a gardener in each of the next three censuses, taking him out of Class II, through Class III and into Class IV.

Upward social mobility is indicated not only by the examples of builders cited above but also by the 53 Kingston persisters who improved their class position as indicated by their changing occupations between 1851 and 1891. But for most, the movement was only marginal. For example, Thomas Wright graduated from a garden labourer to a railway smith; Henry Day from an agricultural labourer to a house painter; Reuben Jelly from an agricultural labourer to a printer’s assistant; George Young from a labourer to a greengrocer; and William Bryden from a tallow chandler’s porter to a bookseller and stationer.

The persisters’ class experience, including this rather limited degree of upward social mobility, can, finally, be illustrated by looking at the overall class profile of those persisters who recorded their occupation in each of the censuses between 1851 and 1891, and by comparing this experience with Kingston as a whole, as in Table 5. For this comparative analysis, only the class of individual households (as shown by male heads of household) has been included. It should also be noted that, from the limited evidence available, the higher social classes were more prominent in Kingston in the second half of the nineteenth century than in other towns, even similar suburban towns such as Windsor or Burgess Hill in Sussex.
Clearly, the dominant class of the Kingston persisters was Class III (rising from 39.0 per cent of all persisters in 1851 to 50.7 per cent in 1891) with only a small number of persisters being in Classes I and II. However, again there is some evidence of upward mobility, since in 1851 15.5 per cent of the persisters were in Classes I and II and 45.4 per cent in Classes IV and V, whereas by 1891, although Classes I and II had remained virtually the same at 16 per cent, Classes IV and V had experienced a decline to 31.6 per cent. Comparing this persisters’ profile with the class profile of households for Kingston as a whole highlights some interesting comparisons. In the first place, a larger proportion of Kingston households were in social classes I and II, rising from 21.5 per cent in 1851 to 27.6 per cent in 1891, indicating that at the higher end of the social scale, the increase in upward mobility was greater for Kingston as a whole than for the persisters. However, over the same period, although those Kingston households classified as Class IV and V dropped from 41.3 per cent of households to 31.8 per cent, this decline was rather less than that experienced by the persisters’ households, indicating greater mobility for the persisters at the lower end of the social scale. Finally, as for the persisters, the largest number of Kingston households were classified as Class III, but this class was less dominant in the Kingston class profile than in the persisters’ class profile, where half of the households were in Class III by 1891.

In explaining these comparisons, it is important to highlight the influence of both intra-generational mobility (life-cycle mobility experienced by individuals during their working lives) and inter-generational mobility (structural mobility brought about over one or more generations by socio-economic change). Both processes can be identified as operating in Kingston in the second half of the nineteenth century. Among the persisters, examples of life-cycle mobility have already been cited (see above, page 29) whilst Louisa Goose, whose father was

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**Table 5  Class of male heads of household 1851–1891**

<table>
<thead>
<tr>
<th>Class</th>
<th>1851</th>
<th>1861</th>
<th>1871</th>
<th>1881</th>
<th>1891</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>n</td>
<td>%</td>
<td>n</td>
<td>%</td>
<td>n</td>
</tr>
<tr>
<td>Kingston</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Class I</td>
<td>117</td>
<td>6.1</td>
<td>239</td>
<td>8.6</td>
<td>321</td>
</tr>
<tr>
<td>Class II</td>
<td>296</td>
<td>15.4</td>
<td>528</td>
<td>19.1</td>
<td>786</td>
</tr>
<tr>
<td>Class III</td>
<td>713</td>
<td>37.1</td>
<td>1,032</td>
<td>37.3</td>
<td>1,738</td>
</tr>
<tr>
<td>Class IV</td>
<td>527</td>
<td>27.4</td>
<td>694</td>
<td>24.7</td>
<td>906</td>
</tr>
<tr>
<td>Class V</td>
<td>267</td>
<td>13.9</td>
<td>282</td>
<td>10.2</td>
<td>551</td>
</tr>
<tr>
<td>Total</td>
<td>1,920</td>
<td>99.9</td>
<td>2,765</td>
<td>99.9</td>
<td>4,302</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Persister</th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Class I</td>
<td>5</td>
<td>2.7</td>
<td>6</td>
<td>2.2</td>
<td>10</td>
<td>2.7</td>
</tr>
<tr>
<td>Class II</td>
<td>24</td>
<td>12.8</td>
<td>40</td>
<td>14.6</td>
<td>50</td>
<td>13.6</td>
</tr>
<tr>
<td>Class III</td>
<td>73</td>
<td>39.0</td>
<td>118</td>
<td>43.1</td>
<td>173</td>
<td>47.0</td>
</tr>
<tr>
<td>Class IV</td>
<td>56</td>
<td>29.9</td>
<td>82</td>
<td>29.9</td>
<td>84</td>
<td>22.8</td>
</tr>
<tr>
<td>Class V</td>
<td>29</td>
<td>15.5</td>
<td>28</td>
<td>10.2</td>
<td>51</td>
<td>13.9</td>
</tr>
<tr>
<td>Total</td>
<td>187</td>
<td>99.9</td>
<td>274</td>
<td>100.0</td>
<td>368</td>
<td>100.0</td>
</tr>
</tbody>
</table>

**Source:** As for Table 1
a labourer and then a gardener, graduated from a general servant to a housekeeper and then married a veterinary surgeon ten years younger than her. More significant for the local population as a whole, however, was inter-generational mobility brought about by broader trends within the local economy and society. As more and more of the population entered the job market in the late nineteenth century, the opportunities for employment in the professions and in the service sector of the local economy (that is, those sectors associated with higher social status) were much greater than they had been in mid-century. There is also some evidence of such mobility among the persisters, as evidenced by the experience of Henry Duffell and his family. Henry Duffell’s father was a labourer and Henry himself began his working life, and his married life, in the same occupation. By the time of the 1851 census, Henry Duffell had graduated to a painter and remained in this occupation for the rest of his working life. However, his 18-year old son, Augustus, still living in the family home in 1891, worked as a solicitor’s clerk. In addition, the family also moved up the residential ladder from the slum area of Forty Acres in 1851, round the corner to Cowleaze Road by 1861, and finally to the relative respectability of Fairfield South, where the family lived for at least 30 years.

In this respect, the limited experience of the persisters was part of a general trend of upward social mobility experienced by Kingston as a whole, but with one important difference: for the persisters mobility was more significant at the lower end of the social scale whereas, for the town as whole, mobility was more noticeable at the higher end of the social scale. Typically, the persisters followed skilled or semi-skilled manual occupations, were predominantly in social class III and experienced limited life-cycle and structural socio-occupational mobility. When this did occur over a persisters’ life-cycle, it was largely confined to movement within the lower end of the social scale.

Conclusion

This article has set out to analyse certain aspects of population persistence in the growing suburban locality of Kingston in the second half of the nineteenth century, in particular the levels of persistence and the characteristics of those persisters identified. As with previous studies of persistence, the main source underpinning this research is the census enumerators’ returns, details from which were entered into a comprehensive database together with details from available marriage and burial registers. Techniques of record linkage were then applied to the data in order to identify those individuals who stayed in Kingston from one census to the next. The subsequent analysis focused on the 1,250 Kingstonians who persisted across five censuses (1851 to 1891) or four censuses (born after 1851 and appearing in the censuses of 1861–1891; or appearing in the censuses of 1851 to 1881 and dying before the 1891 census). In examining the characteristics and profiles of these persisters aggregate data (on, for example, gender, place of residence, occupations and class) have been produced which could be compared with the local population as a whole. In addition to the aggregate data, the experiences of named individuals have been incorporated into the analysis to provide greater depth, to illustrate the

32
various arguments being developed, and to demonstrate the considerable variety of life experiences that can be hidden by aggregate data and averages. This overall approach has extended that adopted by earlier studies of persistence, which tended to identify the level of persistence across only two (or occasionally three) censuses. Some of the conclusions reached in this study (for example, that men persisted more than women and that persistence was more noticeable among the lower social classes) support conclusions reached in the earlier studies. But by considering the life experiences of 1,250 individuals during the years covered by four or five censuses, this research has been able to identify, not only the persisters’ profiles, but also the extent to which the persisters experienced residential, occupational and social mobility over time.

Certain aspects of the persisters’ profiles were determined by the method by which the persisters were identified. For example, males were more numerous than females and this gender balance obviously remained the same throughout the period covered by the analysis. Similarly, the age profile got progressively older with each ten-yearly census. As the persisters aged, this in turn influenced their degree of residential mobility, as they left home, married and established their own households. The majority of these residential moves were over relatively short distances and were concentrated within Kingston’s areas of working class housing. Occupational mobility, on the other hand, was not a significant feature of the persisters’ life experiences. The majority of the Kingston male persisters worked in a variety of skilled, semi-skilled and unskilled manual occupations associated with building, manufacturing and dealing, and they remained in these same occupations for most of their working lives. Those female persisters who worked were concentrated at the lower end of the occupational ladder—in domestic service, laundry work and dressmaking. Overall, this study indicates that the persisters tended to work in areas which serviced the demand for houses, goods and services by an increasing number of relatively wealthy incomers within the local suburban economy.

Similarly, few of the persisters experienced any degree of social mobility, and when this did occur it was generally at the lower end of the social scale. Only a small minority of persisters was to be found in Classes I and II and this proportion remained the same throughout the period 1851–91. Over the same period, the percentage of persisters in Classes IV and V declined, with a consequent increase in those in Class III to 50 per cent of all persisters by 1891. It is true that a small minority of persisters experienced life-cycle mobility, whilst developments in the local economy in Kingston in the second half of the nineteenth century also provided greater opportunities for those persisters who entered the job market in the later decades of the century. But the majority remained in the same social class throughout their lives, and this was particularly the case for females. Comparison between the class profiles of the persisters with that of Kingston as a whole indicate that the town’s class profile was noticeably more weighted towards the higher social classes, again highlighting the influence of middle class incomers to Kingston attracted by a suburban life-style.
The main question not fully explored in this case-study is the extent to which the experience of the Kingston persisters was similar or different to the experience elsewhere. Further research into other local communities (urban, rural and suburban) over a 30-40 year period would enable comparisons to be drawn with the results presented here, and would also help to identify possible causes for any differences or similarities identified. For example, did urban, rural and suburban populations experience different levels of persistence? If so, what were the possible causes of this? Did persister profiles and characteristics vary from one type of community to another? Did certain occupations and classes predispose to persistence or did persistence promote a certain occupational and class profile? What is now needed are similar studies, to test the typicality or otherwise of the Kingston persisters.

Acknowledgments

The author would like to acknowledge the help he has received in carrying out the work on which this paper is based. Financial support was provided by the Nuffield Foundation (SGS/00398/C) and the British Academy (SG-30297) to enable the burial dataset to be compiled and linked to the census dataset. Peter Tilley designed the Kingston database and devised the technique of record linkage used. These techniques were implemented by himself and Juliet Warren within the Centre for Local History Studies, Kingston University. All data was inputted by a dedicated band of volunteers supervised and monitored by Annie Sullivan. Juliet Warren’s comments on earlier drafts of this paper were invaluable whilst the feedback and suggestions provided by the LPS Editorial Board greatly improved the final output. Any remaining mistakes are, of course, my own.

NOTES


2. In this study, comparisons are drawn mainly between the persisters and the population of Kingston as a whole. The number of persisters is a small percentage of the total population, making it unnecessary to exclude them from the total Kingston population.


7. Pooley, Residential mobility', p.260. For more recent research based on record linkage techniques see the special edition of History and Computing on ‘Longitudinal and cross-sectional historical
data: intersections and opportunities’ in History and Computing, 14 (2002). Although this volume is dated 2002, it contains a number of the papers presented at the North Atlantic Population Project’s IMAG Workshop, Montreal, 10–11 November 2003. One of these papers reports on research being carried out into the demographics of the Isle of Skye in the nineteenth century using a methodology that has achieved higher levels of linkage than the Kingston project. The authors conclude: ‘A relatively stable island population with lower population turnover is likely to have a higher rate of linkage, but we suspect our method has also contributed to the much lower proportions unlinked and will help us to achieve linkage rates for our urban areas which are at least as good as those in the English urban areas.’ See A. Reid, R. Davies and E. Garrett, ‘Nineteenth century Scottish demography from linked census and civil registers: a ‘sets of related individuals’ approach’, History and Computing, 14 (2002), 61–86. The quote is on page 82.


11. Of course, not all Kingstonians who died during the research period were buried locally. Some would have been buried elsewhere, either in neighbouring cemeteries in Putney or Teddington, or further afield in accordance with family traditions and customs. They would not have appeared in the local registers.

12. An added complication could be the extent to which the Kingston church marriage registers captured the majority of Kingston marriages. Some females may have married outside of Kingston or outside of the established church and such events would not be included in the Kingston database. Again, it is impossible to specify exact numbers here.


14. An analysis of domestic service in Kingston is provided in Tilley and French, “From local history towards total history”, 142–47.


16. The starting point for deciding on places of birth was the 1861 town of birth field since all of the persisters in this analysis appeared in the 1861 census. The 1861 information could then be compared with that given in three or four of the censuses of 1851, 1871, 1881 and 1891, depending on which group of persisters was being considered. In most cases, the town of birth was recorded consistently and where an individual’s town of birth was not given in the 1861 census, this could be added from the other census returns (although in two cases the town of birth was not recorded in any of the census returns). However, in 32 cases where the town of birth was given as Kingston in 1861, there was sufficient doubt in the other census returns for these 32 not to be included as being born in Kingston. For this analysis, all those born within the Kingston census area are defined as having been born in Kingston.

17. C. Pooley and J. Turnbull, Migration and mobility in Britain since the 18th century (London, 1998), 26. Analysis of residential persistence/mobility is based on the persisters who could be traced through each of the five censuses, 1851–1891. Nor do Tables 3 and 4 include those persisters who lived in the Kingston areas of Ham or Malden, who too often recorded their addresses generically as Ham, Ham Common or Malden.

18. For a map of the Back Lanes area see C. French, ‘Taking up “the challenge of micro-history”: social conditions in Kingston upon Thames in the late nineteenth and early twentieth centuries’, The Local Historian 36 (2006), 21. This paper also illustrates the short distance moves made by those who lived in another working class area of Kingston, Fairfield Place.


20. Pooley and Turnbull also provide a number of case studies to illustrate the broader question of

21. The male employment rate in 1881 was 94.8 per cent and for females the employment rate was 38.7 per cent. The national activity rate in 1881 was 43.1 per cent.


23. Comparisons with a select number of towns for individual census years (e.g. 1851 and 1871) can be made by consulting the tables in D. Mills and K. Schurer eds, *Local communities in the Victorian census enumerators’ books* (Oxford, 1996), 155. The data quoted for Windsor for 1871 indicates that 21.3 per cent of household heads were in Classes I and II; 35.5 per cent in Class III; and 43.2 per cent in Classes IV and V. The comparable percentages for Kingston were 25.8 per cent; 40.4 per cent and 33.9 per cent. Similarly, in Burgess Hill in 1881, only 18 per cent of all households were in Classes I and II; 35 per cent in Class III; and 46 per cent in Classes IV and V. The comparable percentages for Kingston were 27.3 per cent; 38.9 per cent and 33.8 per cent. The Burgess Hill data is from B. Short, ‘A very improving neighbourhood: Burgess Hill 1840–1914’ (Brighton, 1984), 37.
SEARCHING FOR THE POPULATION IN AN EARLY-MODERN FOREST

Heather Falvey

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Introduction

Early-modern improvement writers thought that most of the land within royal forests was not exploited to its full potential and argued that conversion to cultivation would render that land more productive and its inhabitants more industrious.1 During the first four decades of the seventeenth century various improvement projects were thrust upon the community at Duffield (Derbyshire), culminating in the 1630s in the disafforestation and enclosure ‘by agreement’ of Duffield Frith, a forest belonging to the Duchy of Lancaster. Not surprisingly, many of the inhabitants opposed this project, their most violent objections taking the form of a series of riots in the Frith during the early 1640s.2 When studying such riots it is necessary to explore the nature of the community concerned both before and after the enclosures were constructed in order to understand their full implications both for the legal commoners and for the remainder of the inhabitants. This exploration necessarily comprises the reconstruction not only of the local economy, including occupations, landholding, customs and common rights, but also of local demographic and social structures. This article will examine estimates of Duffield’s population during the sixteenth and seventeenth centuries.

As readers of LPS are well aware, the sources that historians use when attempting to ascertain the population size of early-modern communities were not always produced originally for that end but were generated by various officials for fiscal, ecclesiastical, military or other purposes, and so require careful handling when being manipulated to estimate the population. Furthermore, although the people being recorded or assessed belonged by default to a particular local community, the definition and boundary of that community varied according to the type of record being made: ecclesiastical assessments were based on the parish; fiscal assessments might be based on the parish or township; and military assessments could be based on the manor, township or constablewick. Eligibility for inclusion depended on certain assessment criteria and therefore some inhabitants might have been omitted deliberately from a particular listing; others might have been omitted because
assessors had literally failed to locate them; others might be missing from listings because records have been damaged or lost subsequently; and yet others might be missing through evasion of assessment or enumeration.

In addition to these practical difficulties, historians must accept the possibility that throughout the centuries a sizeable, but unquantifiable, proportion of England’s population lodged in the interstices of the figures produced by tax assessors because, intentionally or otherwise, people created space for themselves in which they could escape tithe or tax obligations. Forest areas in particular presented acute problems for the institutions of local and central government. Alan Everitt has noted that ‘there was a continuous tendency for landless people to drift towards the woods and wastes and establish a toehold for themselves if they could, especially on the boundaries of parishes, townships or tythings, where jurisdictions might be ill-defined or uncertain’. With regard to Duffield in particular, analyses of many returns, whether produced for taxation, military or ecclesiastical purposes, suggest that when its people were enumerated or listed, officials entrusted with the task, whether local men or outsiders, frequently failed to record every settlement within the locality. Consequently, not only did various returns from Duffield assess inhabitants according to different criteria, but also they might include or omit different combinations of the dispersed settlements within the area. When attempting to estimate the early-modern population of Duffield, therefore, the figures calculated from such sources are at best tentative, and at worst downright misleading. But historians of local demographic change are not necessarily limited to evidence found in official listings: contemporaries were well aware of in-migration, and several sources survive from Duffield which clearly indicate that various inhabitants had definite knowledge, as well as intuitive perceptions, that the population there was increasing rapidly during the late sixteenth and early seventeenth centuries. This article will therefore argue that such qualitative sources as contemporary observations might urge us to be cautious about relying exclusively on official listings for estimates of population change. Furthermore, as well as raising questions about methodology, evasion from official listings also has implications for the possibility that there were differential growth rates between the taxable and non-taxable sectors of the population.

The geography and boundaries of Duffield

Situated in the east of Appletree Hundred, the parish of Duffield, within the deanery of Derby and diocese of Lichfield and Coventry, lay on the cusp of fertile south Derbyshire and the barren Peak District. Linking two very different landscapes and covering approximately 16,000 acres, the topography of this large parish ranged from rolling hills to riverside plains. The main settlement, situated upon flat gravelly soil on the west bank of the Derwent, lay about four miles north of Derby, on the road to Chesterfield. In the early eighteenth century, Duffield itself was described as ‘a large and very good country town and the best in this part of the hundred’; there was ‘good land on the lower parts of the Derwent and the River Ecclesburn which runs through it’. In
contrast, Belper, the next largest settlement, three miles north of Duffield on the Derwent, had ‘but bad and ancient forest land’. Hazelwood, in the south of the parish, contained ‘some good land … in a pleasant valley’, whereas to the north, Postern and Shottle comprised ‘mostly stony, indifferent land except here and there in the valley and by the rills [small brooks] thereof’.4

Lying within and astride the boundaries of the parish were several manors, the most extensive being that of Duffield itself. As part of the Duchy of Lancaster, a
steward administered the manor of Duffield on behalf of the crown, reporting initially to duchy officials based at Tutbury Castle (Staffordshire), about 12 miles away. The manor, which was sold by the duchy in 1627, was frequently referred to as ‘Duffield cum membris’. These ‘members’ were the sub-manors of Belper, Biggin, Hazelwood, Heage, Holbrook, Hulland, Idridgehay, Makeney, Southwood, Turnditch and Windley. These ‘members’ were the sub-manors of Belper, Biggin, Hazelwood, Heage, Holbrook, Hulland, Idridgehay, Makeney, Southwood, Turnditch and Windley. The villages and dispersed settlements that comprised the manor lay mostly within the medieval boundaries of the forest of Duffield Frith (see Figure 1). These boundaries changed over time but at their largest extent they measured some 30 miles. The medieval Frith had contained four wards, Belper (or Beaureper), Chevin (or Duffield), Hulland and Colebrook but the last passed into private ownership during the reign of Henry VIII. Although the Frith was also part of the duchy, the areas of the wards under forest law were managed separately from the manor. In 1633 legal forest areas of Belper, Chevin and Hulland wards covered a total of 5,005 acres. Regarding the relationship between the boundaries of the wards of the Frith and of the local parishes, Chevin and Belper wards lay wholly within the parish of Duffield, whereas the majority of Hulland ward lay physically within the boundaries of Mugginton parish, although Hulland ward itself was an extra-parochial liberty. Postern and Shottle, partly in Colebrook ward, lay in Duffield parish. This study is primarily concerned with the inhabitants of the settlements within Duffield parish, which comprised Belper, Hazelwood, Heage, Holbrook, Makeney, Postern, Shottle, Turnditch and Windley, together with the main settlement of Duffield.

Locating the population

Among the principal objectives of the study of enclosure riots has been the reconstruction of the identity, place of residence and social status of those accused of destroying property. On 16 May 1642, the Attorney General, acting on behalf of Edward Syddenham, esquire, owner of the enclosures within the Frith, accused by name 215 men and two women of entering the enclosures ‘in a violent and tumultuous way’ and of levelling the hedges and fences. The survival of muster rolls for Derbyshire, drawn up in December 1638, together with a list of the trained bands, including armed ‘private men’, drawn up sometime in 1639, might be thought a considerable advantage when trying to confirm the identity and place of settlement of those named by Syddenham only four years later. In total, some 17,300 men were named in the muster rolls and the lord lieutenant reported that in December 1638 there were some 965 trained soldiers in the county, of whom 442 were privately armed. In theory the muster roll listed the name and place of settlement all men in the county aged 16 years and over who were ‘able and fit for the wars’, apart from those already enrolled in the trained bands, the latter usually accounting for only two or three men in each township. However, in this instance, rather than providing names additional to those in the muster rolls, the lists of the trained soldiers and private men partly overlap the rolls: for some townships as many as a quarter of the men are also named in the muster and not all of these were ‘private men’.
Problems associated with locating the population of Duffield are clearly illustrated in an analysis of the contents of these two lists. Since they were drawn up less than four years before the enclosure riots took place, and since they supposedly name all able-bodied men within each community, both in the muster and the trained bands, logic dictates that the vast majority of the 215 men alleged to have been rioters in the Frith would have appeared in the 1638 muster rolls or 1639 lists of trained men, and that it would thus be possible to identify in which townships they dwelt. However, of these 215 men only 115 were named in the muster rolls for either Appletree Hundred or for the neighbouring wapentake of Wirksworth. Of the ‘missing’ 100, nine were named as ‘private’ armed men. In all, therefore, 124 could be identified in the two lists but 91 (42 per cent) could not. Furthermore, of those 91 men even the surnames of 51 of them did not occur in the lists from Appletree hundred. Given that the thrust of Syddenham’s suit against the alleged rioters was that they were all legal commoners, whose representatives had signed agreements concerning the creation of the enclosures, it is likely that the majority of them would have been local men who actively commoned in the Frith. Indeed, all but 13 of the ‘missing’ 91 could be identified as local men in other documents. Why, then, were some 42 per cent of the alleged rioters absent from the records of the muster and trained bands?

There are several possible solutions to this conundrum. Firstly, those summoned could appoint substitutes or claim exemption. Secondly, the definition of ‘able’ had become more stringent over the years, leading to fewer able-bodied men being listed. Thirdly, the petty constables for the Duffield area had failed to return complete lists for the general muster because they had omitted to visit some of the dispersed settlements. Fourthly, some men had evaded inclusion. Fifthly, the cause might be a combination of these four. Although muster rolls were not compiled for fiscal purposes, it is possible that in view of the increasing levels of taxation in the late 1630s, particularly the controversial Ship Money, and of the muster of the trained bands in early December, some inhabitants had sought to avoid future assessments for militia rates by evading inclusion in the muster rolls. Whether this actually would have enabled them to evade any subsequent taxation is another matter entirely. Even though, as Wrigley and Schofield have noted, the quality of muster rolls deteriorated after 1522, nevertheless, the absence of 91 alleged rioters from the muster rolls and lists of the trained bands is suggestive of evasion and/or omission by officials, and illustrates the problems encountered when trying to identify the inhabitants of Duffield. This article will, nevertheless, attempt to draw some tentative conclusions about the early-modern population of the area. These conclusions will also be considered in the light of research on other forest communities.

Counting the parishioners of Duffield

By the early-modern period, three chapelry at Belper, Turnditch and Heage had been formed within the parish of Duffield. In 1563 records were submitted from every diocese to the Privy Council counting the number of households in
<table>
<thead>
<tr>
<th>Parish/chapelry</th>
<th>A Households 1563</th>
<th>B Minimum &amp; maximum population 1563</th>
<th>C Compton Census 1676</th>
<th>D Change B to C %</th>
<th>E Minimum households in HT</th>
<th>F Cc:HT (min)</th>
<th>G Maximum households in HT</th>
<th>H Cc:HT (max)</th>
<th>I Population total</th>
<th>J Change B to I %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Duffield</td>
<td>353</td>
<td>1,589–1,765</td>
<td>1,800</td>
<td>13.3–2.0</td>
<td>306</td>
<td>5.88</td>
<td>358</td>
<td>5.02</td>
<td>1,800</td>
<td>13.3–2.0</td>
</tr>
<tr>
<td>Beper</td>
<td>102</td>
<td>459–510</td>
<td></td>
<td></td>
<td>118</td>
<td></td>
<td>135</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Heage</td>
<td>54</td>
<td>243–270</td>
<td></td>
<td></td>
<td>73</td>
<td></td>
<td>77</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Turnditch</td>
<td>30</td>
<td>135–150</td>
<td></td>
<td></td>
<td>55</td>
<td></td>
<td>55</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>539</td>
<td>2,426–2,695</td>
<td>1,800</td>
<td>(25.8)–(33.2)</td>
<td>552</td>
<td>3.26</td>
<td>625</td>
<td>2.88</td>
<td>2,700</td>
<td>11.3–0.2</td>
</tr>
</tbody>
</table>

Notes:
A: 1563 diocesan returns;  
B: Calculated using the multipliers 4.5 and 5.0;  
C: Unclear whether this referred to the main parish only or to the parish and its chapels;  
D: Percentage changes in population between 1563 and 1676;  
E: Minimum number of households in Hearth Tax returns of 1662M and 1664L, based on Table 2, Column F;  
F: Compton Census to Hearth ratio, based on E;  
G: Maximum number of households in Hearth Tax returns of 1662M and 1664L, based on Table 2, Column G;  
H: Compton Census to Hearth ratio, based on G;  
I: Based on ratios in columns F and H. Figure for main parish assumes that Compton census counted all inhabitants; figure for parish and chapels assumes that Compton Census counted all adults, multiplier 1.5 used;  
J: Percentage changes in population between 1563 and 1676.

Sources:
Riden, ‘Population of Derbyshire in 1563’, 63–64;  
Edwards, ‘Population in Derbyshire’, 113;  
Whiteman, Compton Census, 446;  
Goose and Hinde, ‘Estimating local population sizes’, 82, 85;  
TNA: PRO: E179/94/405, 1664 Lady Day Hearth Tax assessment, Appletree hundred;  
TNA: PRO: E179/245/8, 1662 Michaelmas Hearth Tax assessment, Appletree hundred.
each parish. These can be used to estimate the population at that time. No returns were made for extra-parochial liberties, which included Hulland ward in Duffield Frith but, according to Riden, this particular omission would not skew population estimates too much since such forest areas were thinly populated. In 1563, there were a total of 539 households in the whole of the Duffield parish, with 353 households in the town itself. Regarding a suitable population multiplier, in their national study of the 1563 returns Dyer and Palliser recommended a range of multipliers from 5.0 to 6.0. Goose and Hinde have recently suggested a range from 4.5 to 5.0. The latter range provides an estimate of somewhere between 2,426 and 2,695 for the ecclesiastical population in 1563 of Duffield and its chapelys (see Table 1).

From the diocesan returns, the parish appears to have been one of the most populous in Derbyshire at that time. Riden calculated the ratios of acres to households in all Derbyshire parishes and commented on the unusually high population density of Duffield. He suggested that the picture might have been distorted by ‘a heavy concentration of population in one community in a large and otherwise thinly populated parish’. This seems a credible explanation for the high figures because even in the sixteenth century there was a concentration of population in settlements in the corridor along the River Derwent north of Derby, which included the settlements of Duffield and Belper, the latter having a nascent nailing industry. Dyer and Palliser also commented on the high returns for Duffield and suggested that they may have been a return of communicants rather than of households. They calculated that, when expressed as a ratio of households per square mile, the figure for Duffield was two or three times that achieved in most neighbouring parishes, although they conceded that ‘this may reflect the local economy; certainly each of the chapelry returns for this parish shows the same characteristic’. Indeed, industrial activity was not confined to the larger settlements. Coalmines were situated in Chevin and Belper wards. There were also stone quarries in Chevin ward and elsewhere in the parish. Iron ore had been extracted and smelted within the Frith over a number of centuries. Although not situated within the main Derbyshire lead field, lead ore was processed within the Frith. This part of Tudor Derbyshire was indeed part of the phenomenon of ‘industries in the countryside’ that Joan Thirsk has identified. Furthermore, contemporary anecdotal evidence also suggests that during the late sixteenth century there was a large population in the Duffield area. In 1587, in a petition to the queen from ‘the inhabitantes and borderers of the Queene her Majesties Chase called Duffelde Frith’, petitioners claimed that living in and around the Frith were ‘Coppie houlders freehoulders & auncient Cottagers & houshoulders In number five hundred & nine and of their wifes, Children & families in number eightene hundred’. Although some of these people may have belonged to the adjacent parish of Mugginton, the figure of 509 householders seems to confirm that in 1563 the vicar had indeed counted householders rather than parishioners.

Since the returns of the 1603 survey of communicants within the diocese of Lichfield and Coventry have not survived, the next available ecclesiastical
records that allow population estimates of Duffield are those of the 1676 Compton Census. The figures for Duffield are: 1,795 conformists, one papist and four nonconformists, giving a total of 1,800, a suspiciously round number. The returns do not specify whether the term ‘Duffield’ encompassed simply those living in the main parish or whether it also included parishioners living within the chapelries of Belper, Heage and Turnditch. The following calculations will consider both possibilities, and in conclusion will discuss the most plausible definition of ‘Duffield’ in the context of the Compton Census.

Precisely which members of a parish we were counted in the Compton Census is difficult to determine, not least because, as Whiteman has noted, ‘nothing is known of the form in which the questions were circulated in many dioceses’. She has suggested that, in general, unless the surviving returns overtly stated or implied anything to the contrary, ‘those over 16, and of both sexes’ were reported (presumably she means ‘16 and over’). Furthermore, her detailed analysis of returns from the various dioceses has enabled her to modify this generalisation according to her findings for each diocese; however, her conclusions regarding the ecclesiastical jurisdictions that included Duffield are somewhat contradictory. Referring specifically to the diocese of Lichfield and Coventry, she calculated that only 11 per cent of parishes reported both men and women over 16, and therefore that 89 per cent reported male communicants only. However, this calculation was based on an analysis of returns relating exclusively to parishes within the archdeaconry of Coventry and not to those within the archdeaconry of Derby, which included Duffield. Regarding the latter archdeaconry, she concluded that the returns had been made ‘with considerable inconsistency’. She made no specific comments about the returns from Duffield, other than to suggest that they may include the figures for the chapelries. Given this uncertainty regarding the inclusion or exclusion of women in the Derby archdeaconry returns, before attempting to produce an estimate of the number of parishioners in Duffield based on the returns of the Compton Census, it is necessary to investigate further exactly who was enumerated there. Whiteman has suggested that by comparing the 1676 figures with evidence extracted from other sources ‘it is possible to discover, or to make a reasonable conjecture about, what part of the population was included’. Hearth Tax returns are the most obvious comparative source for this. Arkell has devised a method based on ratios, whereby the ratio produced by dividing the 1676 figure by the total number of households in the Hearth Tax indicates which category of parishioner was counted in the Compton Census. Where the boundaries of parishes and the relevant Hearth Tax enumeration districts, frequently townships, were coterminal, the application of this method is reasonably straightforward, but problems might arise where boundaries were not the same or where Hearth Tax returns were less than complete.

In 1982, using ratios based on Arkell’s method, Edwards produced a statistical analysis of the population of Derbyshire in the reign of Charles II. Regarding the figures achieved for Duffield, based on the Hearth Tax returns of Lady Day 1664 (hereafter 1664L), Edwards concluded that in 1676 the vicar there had
counted the total number of parishioners, including those residing within the chapelries, rather than the number of communicants; that is, that the Duffield returns included every man, woman and child of any age, rather than only those aged 16 and over. This particular part of his analysis raises more questions than it answers, because it suggests that in 1676 the total population of Duffield parish including its chapelries was only 1,800 and therefore that the population had nose-dived from somewhere between 2,426 and 2,695 in 1563 to a mere 1,800 in 1676, a decrease of between 25.8 and 33.2 per cent (see Table 1). According to Edwards’s reckoning, even if we allow for the possibility that inhabitants living in the chapelries had been omitted in 1676, his figures would still suggest that the population of the parish of Duffield alone had not increased significantly: 1,800 in 1676 is only 2.0 to 13.3 per cent more than the estimates for 1563 (see Table 1). Closer examination of his work, however, reveals that he made certain incorrect assumptions about the Duffield 1664L (Lady Day) returns; close scrutiny of these returns also reveals that they were defective.

In the 1664L assessment, the returns from Postern and Shottle are badly damaged, those from Belper are slightly damaged and there are none from Hazelwood, Turnditch or Windley. Edwards had assumed that the returns from Hazelwood, Turnditch and Windley had been subsumed within those from Duffield, but none of the names that occurred in those three places in the 1662M (Michaelmas) returns occurred in the 1664L Duffield returns. However, since the 1664L returns also list those inhabitants whose property was exempted from the tax, whereas those of 1662M do not, the former returns, although defective, cannot be ignored completely as the Compton Census to Hearth Tax ratio should cover all inhabitants rather than taxpayers only. In order to ascertain the number of households represented in the Duffield Hearth Tax returns for comparison with the Compton Census figure, following careful analysis, the returns 1662M have been conflated with those of 1664L (see Table 2). The results provide the minimum and maximum number of households recorded in the Hearth Tax (columns F and G) to use with the Compton Census figure to provide a ratio that should, in turn, suggest which parishioners were counted in 1676. As it is not clear whether, in 1676, the vicar of Duffield included parishioners in the three chapelries in his figure of 1,800, it is necessary to consider two sets of ratios, the first based on the assumption that the chapelries were included and the second on the assumption that they were excluded.

Assuming that the chapelries were included in the Compton Census, a range of ratios between 3.26 and 2.88 is achieved by dividing 1,800 by the minimum and maximum numbers of households assessed in the Hearth Tax within the whole parish (see Table 1). According to Arkell’s method, this range suggests that all adults in the parish were counted in the Compton Census. When calculating the total population where the returns included women, Whitman has suggested the multiplier 1.5, assuming that children under 16 constituted 33 per cent of the population. If there were 1,800 communicants of both sexes in the parish and its chapelries, this would give a total population in 1676 of
Table 2 A comparison and analysis of the Michaelmas 1662 and Lady Day 1664 Hearth Tax returns for the Duffield area

<table>
<thead>
<tr>
<th>Place</th>
<th>A Both</th>
<th>B Same surname</th>
<th>C 1662M only</th>
<th>D 1664L only</th>
<th>E Illegible in 1664L</th>
<th>F Minimum assessed</th>
<th>G Maximum assessed</th>
<th>H Min. assessed population</th>
<th>I Max. assessed population</th>
</tr>
</thead>
<tbody>
<tr>
<td>Duffield</td>
<td>56</td>
<td>3</td>
<td>12</td>
<td>61</td>
<td>2</td>
<td>132</td>
<td>134</td>
<td>568</td>
<td>576</td>
</tr>
<tr>
<td>Holbrook</td>
<td>20</td>
<td>0</td>
<td>2</td>
<td>15</td>
<td>3</td>
<td>37</td>
<td>37</td>
<td>159</td>
<td>159</td>
</tr>
<tr>
<td>Postern &amp; Shottle</td>
<td>39</td>
<td>5</td>
<td>58</td>
<td>35</td>
<td>0</td>
<td>137</td>
<td>87</td>
<td>589</td>
<td>04</td>
</tr>
<tr>
<td>Total main parish</td>
<td>115</td>
<td>8</td>
<td>72</td>
<td>111</td>
<td>52</td>
<td>306</td>
<td>358</td>
<td>316</td>
<td>1,539</td>
</tr>
<tr>
<td>Belper</td>
<td>44</td>
<td>4</td>
<td>33</td>
<td>37</td>
<td>17</td>
<td>118</td>
<td>135</td>
<td>507</td>
<td>581</td>
</tr>
<tr>
<td>Heage</td>
<td>32</td>
<td>1</td>
<td>21</td>
<td>19</td>
<td>4</td>
<td>73</td>
<td>77</td>
<td>314</td>
<td>331</td>
</tr>
<tr>
<td>Hazelwood, Windley &amp; Turnditch</td>
<td>0</td>
<td>0</td>
<td>55</td>
<td>0</td>
<td>0</td>
<td>55</td>
<td>55</td>
<td>237</td>
<td>237</td>
</tr>
<tr>
<td>Totals</td>
<td>191</td>
<td>13</td>
<td>181</td>
<td>167</td>
<td>73</td>
<td>552</td>
<td>625</td>
<td>2,374</td>
<td>2,688</td>
</tr>
</tbody>
</table>

Notes: A: Taxpayers/householders appearing in both the 1662M and 1664L assessments (1664L includes those exempted); B: Taxpayers not present in 1662M but appearing in 1664L with the same surname as someone present in 1662M but absent from 1664L (four were widows); C: Taxpayers only appearing in 1662M (and not included in column B); D: People assessed only appearing in 1664L (and not included in column B) (includes those listed as exempt); E: Names illegible in 1664L; F: Minimum total number of people assessed: A+B+C+D, assuming that all of the names illegible in 1664L appear in 1662M; G: Maximum total number of people assessed: A+B+C+D+E, assuming that none of the names illegible in 1664L names appear in 1662M; H & I: Totals calculated using mean household size of 4.3.

Sources: TNA: PRO: E179/94/405; TNA: PRO: E179/245/8.
2,700, suggesting that the population there had scarcely increased, the increase from 2,426 in 1563 being 11.3 per cent and that from 2,695 being 0.2 per cent. Alternatively, assuming that the returns excluded the chapelries, using the Hearth Tax returns for the settlements of Duffield, Holbrook, Postern and Shottle only, the range of ratios achieved is between 5.88 and 5.02. According to Arkell’s method, this range suggests that all inhabitants were counted in the Compton Census. This would mean that the population of the main parish alone had increased from between 1,589 and 1,765 in 1563 to 1,800 in 1676, an increase of 13.3 per cent at most.

Both sets of ratios appear to suggest that the population of this parish, which was notably large in 1563, had barely increased during the following century. Indeed, the numbers of households in 1563 and in the Hearth Tax in the 1660s (columns A, E and G in Table 1) also seem to suggest that the population had not increased by much, particularly in the main parish. Since estimates for the country as a whole during the period from 1563 to 1676 suggest that the national population had increased by some 64.1 per cent, these trends in the Duffield population appear improbable. How might they be explained? Regarding the population in 1563, the possibility that all inhabitants had been counted rather than households only has already been discussed and dismissed. It seems likely, therefore, that the problem lies with the Hearth Tax figures used to calculate the ratios. Although the numbers assessed in 1662M and 1664L were carefully analysed and conflated, given the extensive nature of the parish it is possible that some of the parishioners who lived in dispersed settlements were assessed for the Hearth Tax in townships other than those considered here, particularly those parishioners living in the upland areas in the north and west of the parish.

By applying various multipliers to the figure for ‘Duffield’ in the Compton Census, alternative estimates for the population of the parish can be produced. Given the uncertainty regarding the inclusion or exclusion of women in the Derby archdeaconry returns, four sets of estimates have been calculated: the first assumes that the returns included both sexes in the parish and its chapelries; the second that they included both sexes in the main parish; the third that they included only males in the parish and chapelries; and the fourth that they included only males in the main parish (see Table 3). Taking 1,800 as the number of communicants of both sexes in ‘Duffield’, the multiplier 1.5 gives a total population in 1676 of 2,700. If this figure referred to the chapelries as well as the main parish, it suggests that the population there had scarcely increased, the increase from 2,426 in 1563 being 11.3 per cent and that from 2,695 being 0.2 per cent. Alternatively, if the returns for all communicants applied only to Duffield parish itself, the population had increased from between 1,589 and 1,765 in 1563 to 2,700 in 1676, an increase of between 53.0 and 69.9 per cent. For returns counting only males, Whiteman suggested a multiplier of 3.0, that is, double to allow for women plus 33 per cent for children under 16 years old. Therefore, if there were 1,800 male communicants, this would give a total population of 5,400 in 1676. This would suggest either that the population in the parish and its chapelries had increased
<table>
<thead>
<tr>
<th>Parish / chapelry</th>
<th>A: Population 1563</th>
<th>B: Compton Census</th>
<th>C: Change A to B %</th>
<th>D: Population if all adults in Compton Census</th>
<th>E: Change A to D %</th>
<th>F: Population if males only in Compton Census</th>
<th>G: Change A to F %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Duffield</td>
<td>1,589–1,765</td>
<td>1,800</td>
<td>13.3–2.0</td>
<td>2,700</td>
<td>69.9–63.0</td>
<td>5,400</td>
<td>239.8–205.9</td>
</tr>
<tr>
<td>Belper</td>
<td>459–510</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Heage</td>
<td>243–270</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Turnditch</td>
<td>135–150</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>2,426–2,695</td>
<td>1,800</td>
<td>(25.8)–(33.2)</td>
<td>2,700</td>
<td>11.3–0.2</td>
<td>5,400</td>
<td>122.6–100.4</td>
</tr>
</tbody>
</table>

**Notes:**
- A: Calculated using the multipliers 4.5 and 5.0;
- B: Unclear whether this referred to the main parish only or to the main parish and its chapeldies.
- C: Percentage changes in population between 1563 and 1676 based on Edwards's assumption that figure referred to all inhabitants;
- D: Population estimate assuming all adults counted in Compton Census, calculated using the multiplier 1.5;
- E: Percentage changes in population between 1563 and 1676 based on D;
- F: Population figure assuming males only counted in Compton Census, calculated using the multiplier 3.0;
- G: Percentage changes in population between 1563 and 1676 based on F.

**Sources:**
- Riden, 'Population of Derbyshire in 1563', 63-64;
- Edwards, 'Population in Derbyshire', 113;
- Whiteman, Compton Census, 446;
- Goose and Hinde, 'Estimating local population sizes', 85.
by between 100.4 and 122.6 per cent since 1563, or that the population of the main parish had increased from between 1,589 and 1,765 to some 5,400 in 1676, an increase in the range of 205.9 to 239.8 per cent. These four possible estimates for change in the ecclesiastical population of Duffield between 1563 and 1676 vary considerably, ranging from almost no change to an increase of well over 200 per cent. Which estimate seems most plausible? Given that the national population had increased by some 64.1 per cent, perhaps the most likely population estimate for ‘Duffield’ in 1676 is that which shows a percentage increase of 53.0 to 69.9 since 1563, the estimate for the total population of the main parish alone, assuming that the Compton Census return counted all adults there.

The taxable population of the townships

The survival of taxation returns from Duffield enables the production of a second set of population estimates, albeit of the taxable rather than the total population. Although multipliers have been suggested for estimating the total population from taxation records, initially this discussion will focus on the taxable population since estimates of taxable population serve as demographic indicators in their own right. Furthermore, it seems reasonable to compare trends in population estimates based on taxation returns made by township or constablewick with those estimates based on ecclesiastical returns from a parish. Thus the rate of change in the taxable population might gauge the validity of the various estimated rates of increase in the total population of the parish suggested above.

Given the problems discussed previously regarding possible omissions from various listings of some of the settlements within ‘Duffield’, before comparing any sixteenth century fiscal records with ones from the seventeenth century it is necessary to analyse several taxation assessments for Duffield to determine the most suitable returns to use. The following taxation assessments have been analysed: the second payment of the 1523 lay subsidy (assessed in 1525); the first payment of the 1543 lay subsidy; the 1662M Hearth Tax and the 1664L Hearth Tax. Hoyle has commented that the 1543 subsidy returns have largely been ignored by historians despite the fact that the low threshold for taxation on goods worth £1 effectively equates with the 1523 threshold of wages of £1 per annum. To make the most meaningful links between the sixteenth and seventeenth-century assessments, those selected must cover the same categories of taxpayers and the same settlements within Duffield. It is also necessary to determine when communities have been omitted completely and when they have been subsumed within others. The places used in the calculations are Belper, Duffield, Hazelwood, Heage, Holbrook, Makeney, Postern, Shuttle, Turnditch and Windley. The absence from the 1525 subsidy assessments of the inhabitants of Heage, site of one of the three chapels, suggests that it would be preferable to use the 1543 assessments. Moreover, even excluding those from Heage, the 1543 assessments include 32 (27 per cent) more taxpayers than those of the 1525 subsidy (see Table 4). The increase in numbers corresponds with Sheail’s findings that the 1543-1545 returns from northern counties contained
more names than the 1524–1525 returns.\textsuperscript{53} However, Hoyle has cautioned that the increase probably indicates a moderate increase in prosperity rather than in population size.\textsuperscript{54}

There is some disagreement over whether Tudor lay subsidy returns include only taxable males aged 16 and over, or represent households.\textsuperscript{55} Returns from the Duffield area for the first payment of the 1543 subsidy name 174 taxpayers, including 13 women. Eight of these women are specifically described as widows, one is denoted as ‘\textit{uxor}’ (wife), and the other four have no status ascription. The taxable goods of these women range in value from 20s to £10. Their inclusion in the returns suggests that they were heads of their household and therefore that these returns might represent taxable households in the community.\textsuperscript{56} Alternatively, within the returns are nine pairs of taxpayers with the same surname who appear next to each other in the listing, suggesting that these particular pairs dwelt in the same house and therefore that one of them was not the household head but an adult male over 16. In two pairs the men are specifically designated ‘senior’ and ‘junior’; another pair is probably a widow and son; three pairs have been assessed on goods of the same value; of the remaining three pairs, only William and Henry Smith had markedly different assessments, at £9 and 20s respectively. This scant evidence seems to suggest that adult males over 16 were being assessed at Duffield. The 1543 returns, therefore, appear to contain heads of households and males over 16. Clearly a range of multipliers is advisable to calculate the taxable population: for males aged 16 and over, the multiplier 3.2 is recommended; for households, 4.75.\textsuperscript{57} In 1543 there were 174 taxpayers, giving a total taxable population of between 556 and 828 (see Table 4).

As already noted, the most suitable Hearth Tax returns for comparing the taxable population of Duffield in the 1660s with that of 1543 are those for 1662M, because the 1664L returns are defective. Indeed, when the exempted householders are deducted from the 1664L total, there are 80 fewer taxpayers than in 1662M (see Table 4). For calculating population totals from the Hearth Tax, Arkell has suggested a mean household size of 4.3 in both rural and urban areas outside London.\textsuperscript{58} In 1662, the number of taxpayers in the Duffield area was 385, thus the taxable population was some 1,656. Superficially these figures suggest that the taxable population of Duffield more than doubled between 1543 and 1662, rising from between 556 and 828 to approximately 1,650.

Given the problems encountered by officials when assessing the dispersed settlements that comprised the community of ‘Duffield’, and given the omissions and combinations of different communities shown in Table 4, estimates of such a dramatic rise should be qualified. Slack has cautioned that local assessors of both the lay subsidy and the Hearth Tax made subjective judgements regarding qualifications for exemption, and that perceptions of who should be exempt tended to be narrower in the Hearth Tax.\textsuperscript{59} This observation suggests that in the lay subsidy, in particular, fewer people were taxed than ought to have been and therefore that the taxable population in the sixteenth century was greater than that which was actually taxed. The anecdotal evidence quoted above which stated that there were
some 509 householders in and around the Frith in 1587 seems to confirm Slack’s observation. Although some of these householders might have been assessed in other townships and others might have arrived since 1543, the considerable difference between 174 and 509 suggests that a sizeable proportion of households were not assessed for the lay subsidy. All of this indicates that any calculated increase in the taxable population by the 1660s would be greater than the actual increase and therefore that the apparent doubling of the taxable population at Duffield should be treated with caution; nevertheless, it is clear that the taxable population had increased markedly in the intervening 120 years, even if the exact increase is unclear. These findings concerning a forest population chime with Pettit’s analysis of the populations of the villages within Salcey and Whittlewood Forests. Comparing figures derived from the 1524 lay subsidy returns and 1670 Hearth Tax assessments, he found, for example, that the median number of householders in villages in those forests rose from 34 to 77.60

Table 4  The taxable population of Duffield in the lay subsidies of 1525 and 1543 and the Hearth Tax of 1662

<table>
<thead>
<tr>
<th>Place</th>
<th>Total taxpayers in 1525</th>
<th>Total taxpayers in 1543</th>
<th>Taxable population in 1543</th>
<th>Total chargeable taxpayers in 1664</th>
<th>Total taxpayers in 1662</th>
<th>Taxable population in 1662</th>
</tr>
</thead>
<tbody>
<tr>
<td>Belper</td>
<td>31</td>
<td>37</td>
<td>118–176</td>
<td>75</td>
<td>81</td>
<td>348</td>
</tr>
<tr>
<td>Duffield</td>
<td>34</td>
<td>50</td>
<td>160–238</td>
<td>72</td>
<td>71</td>
<td>305</td>
</tr>
<tr>
<td>Makeney</td>
<td>7</td>
<td>11</td>
<td>35–52</td>
<td>[with Duffield]</td>
<td>[with Duffield]</td>
<td></td>
</tr>
<tr>
<td>Hazelwood &amp; Shottle</td>
<td>40</td>
<td>128–190</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hazelwood</td>
<td>12</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Turnditch</td>
<td>9</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Windley</td>
<td>9</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hazelwood, Windley &amp; Turnditch</td>
<td>[missing]</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Heage</td>
<td>[missing]</td>
<td>24</td>
<td>77–114</td>
<td>47</td>
<td>54</td>
<td>232</td>
</tr>
<tr>
<td>Holbrook</td>
<td>16</td>
<td>10</td>
<td>32–48</td>
<td>19</td>
<td>22</td>
<td>95</td>
</tr>
<tr>
<td>Postern &amp; Shottle</td>
<td>[damaged]</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>118</td>
<td>174</td>
<td>556–828</td>
<td>c.305</td>
<td>385</td>
<td>1,656</td>
</tr>
</tbody>
</table>

Notes: Taxable population in 1543 calculated using the range of multipliers 3.2 to 4.75; Taxable population in 1662 calculated using a mean household size of 4.3.


The total population of Duffield derived from taxation returns

In their recent discussion of multipliers for estimating total population figures from early-modern taxation returns, contra Slack, Goose and Hinde have
argued that regarding the Tudor lay subsidies of 1524–1525, the numbers evading the tax, or exempted from it, might well have been considerably lower than the oft-suggested figure of 30 per cent. Nevertheless, to produce a tentative total population figure from the taxable population in 1543, allowance should be made for possible evasion and exemption. Applying to the 174 taxpayers in 1543 multipliers of 4.57 and 6.79, the former for returns listing taxable males of 16 and over and the latter for returns listing heads of households, the estimated total population of Duffield in 1543 was somewhere between 795 and 1,181. When the returns from 1662M and 1664L are conluted, the resultant minimum and maximum numbers of assessed households are 552 and 625 respectively. Using the multiplier 4.3, these figures suggest total population estimates of between 2,374 and 2,688 (see Table 2). These estimates based on fiscal sources suggest that the number of inhabitants in the settlements in and around the Frith had increased from somewhere between 795 and 1,181 in 1543 to somewhere between 2,374 and 2,688 in the 1660s, and therefore that the overall population had more than doubled. Even considering Slack’s concerns about omissions from the lay subsidy, the overall upward trend is undeniable. Furthermore, the actual number of households in the Duffield area was probably higher because some people living within the Frith may not have been listed in the Hearth Tax returns even as exempt. Apart from the possibility that such people’s houses were inadvertently omitted by tax-assessors due to their inaccessible location, squatters’ cottages might have no hearth or chimney that could be assessed, just a crude fire, the smoke from which escaped through a hole in the roof. At first glance, the estimate for the total population of Duffield in the 1660s appears to confirm the estimate for the parish’s population in 1676: the former, derived from the Hearth Tax assessments for the settlements within the Duffield area, falls between 2,374 and 2,688 and the latter, based on the returns of the Compton Census, is 2,700 when it is assumed that the vicar counted all adults. However, the earlier calculations regarding ratios demonstrated that the parish and Hearth Tax townships were not coterminous. Moreover, if the population of the main parish alone was 2,700 in 1676, this figure is virtually equal to the total population of all of the settlements in the 1660s based on the Hearth Tax returns, including exemptions.

The varying rates of change suggested by the fiscal and ecclesiastical population estimates also need to be considered. Firstly, regarding the number of parishioners, if the figure of 2,700 relates to the parish and chapelries, it suggests that the increase in the ecclesiastical population since 1563 was no more than 11.3 per cent; whereas if the figure relates to the main parish alone, it suggests an increase of between 53.0 and 69.9 per cent. Secondly, estimates for the taxable and total population based on fiscal records suggest that they may have doubled between 1543 and the 1660s. For the ecclesiastical population to have doubled from its 1563 figure of 2,695 to some 5,400 in 1676, the Compton Census figure would have to have counted only males in the parish and its chapelries (Table 2). Furthermore, the figure of 5,400 parishioners seems too high: although it has now been demonstrated that the parish, including its chapelries, covered a greater area (and included a greater
than the area covered by the Hearth Tax townships selected for this study, it is not feasible that the upland areas of the parish contained as many parishioners as the townships. Since the various multipliers that have been used were produced by historians following careful analysis of the sources in question, the evidence presented here suggests that the estimates from the fiscal and ecclesiastical returns from the Duffield area are not directly comparable, for when numerical totals appear to concur, rates of change are incompatible and vice versa. Based on the surviving fiscal and ecclesiastical evidence, perhaps the best that can be said about the population of Duffield Frith between the mid sixteenth century and the late seventeenth century is that the taxable population of the settlements had almost doubled, whereas the number of parishioners had increased by somewhere between 0.2 and 53 per cent, but possibly more.

Whilst every effort was made to include in this study each of the dispersed settlements within the Duffield area, problems associated with missing returns and elusive inhabitants have been noted. Evasion is another factor that needs to be considered: the multipliers used on fiscal records have been calculated to allow for some evasion, whereas the ecclesiastical multipliers have not. Goose has suggested a multiplier of 6.33 to allow for under-enumeration in the 1563 returns but this has not been used here because Whiteman’s multipliers for 1676 do not allow for under-recording. It is possible that some Duffield parishioners attempted to evade such enumerations because they feared that there might be implications for the payment of tithes. In the 1740s, during a dispute over tithe obligations within the parish, residents within the Frith claimed that all three wards were extra-parochial, not just Hulland ward, and that accordingly they did not owe tithes to the rector. It is possible, therefore, that the apparently slower rate of growth of the ecclesiastical population may be attributable in part to under-enumeration.

Contemporary perceptions of demographic pressure in Duffield

Early-modern writers such as John Norden, as well as historians such as Alan Everitt, have observed that forest areas, frequently situated on the boundaries of different jurisdictions, attracted landless migrants. In such areas these individuals might find it easy to evade enumeration or might be exempted legitimately from fiscal assessment by reason of their poverty and/or the low annual value of their dwelling. In demographic calculations, although multipliers that allow for the non-taxable population can be suggested, it is highly likely that this sector of the population was growing more quickly than the taxable sector. Moreover, the size, and therefore growth rate, of the non-taxable population cannot be calculated with any kind of accuracy. Anecdotal evidence supplied by contemporaries in Duffield indicates that they were conscious of a rapidly expanding population within the Frith itself.

In the late sixteenth century, Anthony Bradshaw, deputy steward of Duffield Frith, observed that it was ‘overcharged’: its commons and their readily available fuel supply were attracting more incomers than could be sustained
In 1618, it was reported that in Postern and Shottle the number of households had increased from nine in 1580 to 66 in 1618. Nearly all were so successfully engaged in ‘husbandry’ that they were selling corn on the market and maintaining ‘great families’. In 1641, Robert Smith, a Duffield weaver, identified 41 people who had made encroachments in the Frith anything up to 30 years previously. Of these encroachments, at least 28 (68 per cent) included a cottage or other dwelling. From the wording of his evidence, it is likely that the people named by Smith were the current occupiers, rather than the owners, of the properties. Finally, in the 1650 Commonwealth survey of Duffield Frith, commissioners valued 127 illegal encroachments in the Frith, of which 109 (86 per cent) included a dwelling. Some people named in this survey were substantial manorial tenants but most of these would have rented their newly erected dwellings in the waste to squatters and incomers.

This anecdotal evidence from Duffield is comparable with the findings of Buchanan Sharp in his study of riots in the west of England between 1586 and 1660. He did not attempt to quantify forest populations but used the returns of several government commissions to demonstrate that the populations within various forests had been expanding throughout the period. For example, in 1610 it was reported that there were 137 newly erected dwellings bordering on Blackmore Forest (Wiltshire) and 76 bordering on Chippenham Forest (Wiltshire). Of these, 167 had no land attached.

As at Duffield, according to official reports, these forests were attracting incomers.

Conclusion

Statistical analyses of the various early-modern ecclesiastical and fiscal returns from Duffield appear to produce contradictory results, since the former suggest a much lower rate of population increase than the latter. Indeed, the suggestion that the parish’s population might have scarcely increased seems to confirm Riden’s comment that extra-parochial forest areas, and by extension forest areas in general, were sparsely populated. Analysis of the fiscal population, however, suggests that the number of inhabitants in the Duffield area increased markedly between the 1540s and the 1660s and this is comparable with Pettit’s findings concerning forest populations in Northamptonshire. Local inhabitants and Commonwealth surveyors had noticed a large number of new dwellings in the area around Duffield and had recorded them in varying detail. These particular observations arguably provide conclusive evidence for increases in the population in the Frith during the late sixteenth and early seventeenth centuries because many of the people mentioned in them were recent incomers and squatters—the sort of people who may have been overlooked by tax assessors and ecclesiastical enumerators. Indeed, such people came into such areas precisely because they were often outside ecclesiastical and civil jurisdictions. This would suggest that although, in general, statistical evidence serves a useful purpose, it needs to be handled with care, particularly when dealing with areas comprising dispersed and remote settlements. The value of anecdotal evidence from such places is clear: although such evidence does not permit the calculation of rates of population increase, it convincingly demonstrates the significance of the arrival of incomers who might not necessarily be found in official enumerations.
NOTES

1. For example, see the views of John Manwood and John Norden reproduced in J. St John, *Observations on the Land Revenue* (London, 1787), Appendices I and II.

2. These riots, together with enclosure riots that occurred at Whittlesey (Cambridgeshire) during the 1640s, formed the subject of my PhD thesis, ‘Custom, resistance and politics: local experiences of improvement in early-modern England’ (University of Warwick, 2007).


5. For holdings in the manors, see, for example, The National Archives (hereafter TNA): PRO: DL44/1147, 23 June 1635. The location of Southwood is now unknown. Biggin and Idrichedgey were not in Duffield parish.


8. TNA: PRO: DL44/1127, September 1633.


10. TNA: PRO: SP16/405, part 2, general muster rolls for the county of Derby, December 1638; SP17/E/14, muster roll of the trained bands of Derbyshire, including private men and their arms, 1639.

11. TNA: PRO: SP16/409/1, letter from William Cavendish, earl of Devonshire, to the Council, 1 January 1639, with which is enclosed a ‘view of the forces and arms of the county of Derby’, taken in December 1638.

12. For example, analysis of the 33 men from Duffield and Belper named in the list of trained soldiers and ‘private’ armed men shows that eight of them were also named in the muster roll, including one of the soldiers.

13. It is possible to identify the two widows accused of rioting and even to locate their husbands’ wills.

14. For example, William Bludworth, one of the signatories to the enclosure agreements in 1632 and who held over 45 acres in the manor of Duffield, was accused of rioting but was not named in either roll.

15. Substitution and exemption usually applied to the militia or trained bands rather than the general muster. The most comprehensive account of the militia and of muster rolls is to be found in L. Boynton, *The Elizabethan militia, 1558–1638* (London, 1967), although the discussion of the 1638 rolls is somewhat cursory.


22. N. Goose and A. Hinde, ‘Estimating local population sizes at fixed points in time: Part II – specific sources’, *LPS*, 78 (Spring 2007), 82. Goose, based on research on the town of Cambridge
and county of Hertfordshire, also warns that these returns might under-enumerate the population by 25 per cent (ibid.).

25. Page ed., VCH Derbys, 2, 349–52. Derbyshire Commonwealth surveys indicate that the Duffield coalfield was by far the most important in the county at that time.
28. In 1552, the German Burkhard Cranich had erected a stamp mill for crushing lead near Duffield. It is unclear whether the lead came from Duffield or from elsewhere. (H. R. Schubert, ‘The first stamp mills in English industry’, Journal of the Iron and Steel Institute, 157 (November 1947), 343–4.)
30. TNA: PRO: DL44/305, f.5, petition of ‘the inhabitantes and borderers of Duffylde frythe’, 2 September 1587.
32. Whiteman, Compton Census, 446.
33. Whiteman, Compton Census, xxxvi.
34. Whiteman, Compton Census, xxxvi.
35. Whiteman, Compton Census, ixii and Table A on ixii.
37. Whiteman, Compton Census, 446.
40. D. G. Edwards, ‘Population in Derbyshire in the reign of King Charles II: the use of hearth tax assessments and the Compton Census’, DAJ, 102 (1982), 106–17. (Arkell had supplied Edwards with pre-publication details of his method.) In his analysis, Edwards used the hearth tax assessments that he had previously published in D. G. Edwards ed., Derbyshire hearth tax assessments 1662–70 (Derbyshire Record Society, 7, Chesterfield, 1982).
42. TNA: PRO: E179/94/405, Lady Day 1664 Hearth Tax assessment, Appletree hundred.
43. Edwards, Derbyshire hearth tax assessments, lviii, ixix; TNA: PRO: E179/245/8, Michaelmas 1662 Hearth Tax assessment, Appletree Hundred. Although it is possible that the assessments for Hazelwood, Turnditch and Windley are missing because the relevant membranes have since been lost, given the layout of the originals, it seems more likely that these settlements were omitted by the assessors for 1664L.
47. Wrigley and Schofield, The population history of England, 207, figure 7.1; 531–2, Table A3.3, have calculated that between 1563 and 1676, the total population of England grew from 3,048,188 to 5,003,488.
48. This estimate is based on the same calculations as the first ratio above.
50. TNA: PRO: E179/91/95 & 92/176 (1523 lay subsidy, second assessment, Appletree hundred, February 1523); E179/91/152 (1543 lay subsidy, first assessment, Appletree hundred, November 1543); E179/245/8 (1662M, Appletree hundred); E179/94/405 (1664L, Appletree hundred).
52. No lay subsidy returns have survived for Postern; Shottle was not assessed in 1523 but was assessed together with Hazelwood in 1543; in the Hearth Tax returns Postern and Shottle were assessed together.
64. Goose and Hinde, ‘Estimating local population sizes’, 82, 85.
65. TNA: PRO: E134/18Gez2/Mich1, &venport versus Lygon, 1742.
66. Also, Whiteman has suggested that in the interests of encouraging royal toleration, nonconformity was not necessarily fully represented in the Compton Census but the extent of nonconformity in the Duffield area is unknown: Whiteman, *Compton Census*, i-xii.
70. TNA: PRO: E317/Derb/18, Survey of Duffield Frith, 19 August 1650.
71. Between them Smith and the commissioners reported 137 recently erected dwellings. Seven people are named in both lists, but even if the other 21 occupiers identified by Smith were tenants of those named in 1650, at least 109 new dwellings had appeared since 1610.
73. In his work on the forest of Arden, following his analysis of various fiscal and ecclesiastical assessments to find population figures, V. Skipp, *Crisis and development: an ecological case study of the Forest of Arden, 1570-1674* (Cambridge, 1978), Appendix II, also arrived at apparently contradictory results.
74. Riden, ‘Population of Derbyshire in 1563’, 61. Of the 127 encroachments recorded by the Commonwealth surveyors, 44 were in Hulland ward. (TNA: PRO: E317/Derb/18).
SOCIALLY SELECTIVE MORTALITY DURING THE POPULATION CRISIS OF 1727–1730: EVIDENCE FROM LANCASHIRE

Jonathan Healey

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Introduction

In the late years of the 1720s, parts of England were hit by one of the worst demographic crises in the early modern period. According to Wrigley and Schofield, mortality was extremely high across the Midlands, much of northern England, and parts of East Anglia. In fact, their aggregate sample of parish registers suggests that, in terms of deviation from background levels of mortality, the years from 1727 to 1730 rank as the second worst crisis between 1541 and 1871, outdone only by the terrible epidemics of the 1550s. Unfortunately, however, despite their coming at a time of increasing record availability, our knowledge of this very long-lasting and violent crisis is extremely patchy. The purpose of this article is to improve on this knowledge by offering both new regional detail to the existing picture, and fresh data on the social impact of the crisis. In particular, it tests the validity of three assertions made by contemporaries about the social selectivity of mortality, namely, that the relatively old were more likely to die, that the crisis was more severe in the countryside than the towns, and that its impact fell disproportionately on the poor.

The study area

This study focuses on the ancient county of Lancashire, which was apparently one of the worst affected parts of the country. The county itself, traditionally one of England’s poorest, was in the early eighteenth century undergoing something of an economic transition as trade and industry developed in its southern reaches, although the northern hundreds of Amounderness and Lonsdale remained predominantly agricultural. Around Liverpool, itself a growing Atlantic port, metal-based industry was gaining a strong foothold and making use of an increasingly exploited local coalfield. Meanwhile, the older centre of Manchester was increasing in size and influence in tandem with local textile manufactures, which were also centred in towns such as Bolton, Bury, Rochdale, and Blackburn. Most impressively, the eighteenth century was to
see the spectacular growth of the region’s cotton industry, and there are clear signs that the use of this fibre was beginning to transform south-east Lancashire’s economic landscape well before the 1720s. In time, such developments would feed into impressive population growth, but the available evidence suggests that in 1727 this still lay largely in the future, although it seems that the population of the south-west of the county was already growing. By contrast, much of the rest of the region appears to have been at the very end of a long period of population stagnation that may have dated back as far as the reign of Charles I. In any case, the total population of the county can hardly have been much more than about 225,000 during the period in question, although this estimate can admittedly only rest on the most tentative of foundations.

There is little indication, then, that the 1720s were a time of particularly intense demographic stress. It has been suggested that in the early and middle years of the seventeenth century the region underwent a ‘Malthusian’ crisis in which population outstripped available food resources. Indeed, it has long been accepted that the 1620s in particular saw widespread starvation in the region. One hundred years later, however, such conditions appear to have eased significantly. Although the population of the county had increased by perhaps 50 per cent in the intervening years, growing industrial prosperity, improving integration with wider grain markets, and—perhaps most critically—wider commitment to welfare spending through the poor law, seem between them to have ensured such dramatic subsistence crises did not return.

‘Never so sickley a time known’: the crisis in Lancashire

The 1720s crisis was not a famine, not in any straightforward sense anyway, but high food prices evidently played some role. The harvests of 1727 and 1728, particularly the latter, seem to have been especially poor, perhaps a result of the notably hot summers in those years, and the price statistics presented by Peter Bowden suggest that the 12 months following each of these harvests saw composite grain prices in the two years respectively 25 and 33 per cent above trend. Indeed, prices were so high that 1728 and 1729 both saw national imports of wheat exceed exports, the only years in which statistics show the net flow going this way between 1697 and 1757. We can add nuance to this picture by deploying local price data, and from these it appears that after the 1727 harvest prices were highest in the south of the county, while after 1728 they were extremely high across the whole region. According to William Stout of Lancaster, corn was ‘scarce and dear’ around Manchester and Liverpool after the 1727 harvest and, although there was ‘great plenty’ further north, trading with badly affected areas caused prices to rise there too. Things then got worse after the 1728 harvest, and Stout described 1729 as ‘very dear for all provisions’, necessitating imports from Hamburg and even America. In Little Crosby further south, Nicholas Blundell’s diary and ‘Anecdote Book’ both broadly support Stout’s picture, recording that in 1727 ‘corn generally speaking proved small’. Then, in the following two years corn was very scarce in Lancashire, as well as in other parts of
England. For which reason great quantities of corn was brought into Leverpoole and I am informed from very good hands that from June the 24 1728 to May the 6th 1729 there was import into Liverpool 234562 bushels of corn, chiefly wheat and barley.\textsuperscript{18}

Finally, we can add data from farm stewards’ accounts for Lytham Hall on the Ribble Estuary, which suggest high prices for wheat, barley, oats and potatoes in 1729, though not for the previous year.\textsuperscript{19} Certainly, then, this was a crisis which took place against the very real shadow of dearth.

On the other hand, it seems over-simplistic to describe this as the ‘1727–9 harvests crisis’, as one historian has.\textsuperscript{20} Though there is unassailable evidence for high prices, it is also clear that epidemic disease played the decisive role in causing mortality. Indeed, while there is an exceptionally large body of evidence describing the forms of sickness to which people succumbed, there is—as far as I am aware—no evidence of anybody dying from immediate hunger. This is in marked contrast to the famine of 1623, when the parish register of Greystoke (Cumberland) recorded deaths from starvation, and the late 1640s, when newsbooks complained of famine mortality in the far northwest, though in the latter case extant quantitative data suggest such reports were exaggerated.\textsuperscript{21} Thus, while we should not necessarily rule out a potential connection between dearth and mortality through either weakened immunity to disease or social factors (such as increased migration aiding the distribution of disease vectors) it does seem that the term ‘harvests crisis’ is insufficient.

That the most proximate cause of mortality was disease is attested by a large volume of contemporary comment. More specifically, it appears that there were two broad sets of illnesses present. Firstly, medical journals such as those of the Yorkshire physicians Clifton Wintringham and William Hillary describe the impact of remittent and intermittent fevers, sometimes accompanied by eruptions on the skin and psychological trauma.\textsuperscript{22} In the words of Wintringham, describing the fevers that hit York in the summer of 1727:

Skin eruptions often accompanied these diseases, sometimes of a dark colour, which were usually dry, but others full of transparent serum which, hanging from a scabrous spot, tormented the sick with grievous itching... The sick who were affected at this time generally appeared somnolent and senseless, especially in paroxysms, and they were overcome by lassitude, debility and dullness of the spirits, which symptoms accompanied the approach of the putrid fever in an even greater degree. For the pulse in this was generally rapid and feeble with a dry and dark tongue; the urine was red and free from sediment...\textsuperscript{23}

These fevers were interpreted at the time as being of several different types, and it is exceptionally hard to be much more precise, but it has been suggested that typhus or something very similar was the chief culprit.\textsuperscript{24} There were also serious winter outbreaks of inflammatory diseases and ‘epidemical catarrhs’
which are usually thought to have been influenza. The outbreak of influenza in the latter months of 1729 seems to have been especially widespread, with Hillary writing of ‘an Epidemical Cough’ that ‘seiz’d almost every body, few escaping, for it was universally felt over the Kingdom’. There was also, in the later months of 1727, an epidemic ‘horse-cold’, recorded not just in Lancashire but also in Staffordshire, Shropshire, Devon and Ireland.

Evidence from Lancashire corroborates this picture, though in rather less detail. Nicholas Blundell lamented in 1727 that there was ‘[n]ever so sickley a time known in Lancashire as from May till the end of this year’. ‘Abundance died’, he wrote, from ‘an uncommon sort of a fever which eather took them off or ended in a violent ague which often lasted severall months & was scarce possible to be cuer’d’. William Stout, meanwhile, described 1728 as suffering a ‘very sickley summer’ in which ‘[t]he buryalls were double this year to what they were last year’. At the same time the parish authorities of Deane (near Bolton) felt compelled to explain, through a series of notations, why their registers contained such an extraordinary number of burials. Thus, according to an interjection for September 1727, those buried that month ‘dyed of a fever. But in some respects the disorder resembled the plague, and continued amongst us above two years.’ Subsequent entries referred to ‘agues’, ‘fevers’, and ‘pluraisies’.

Such literary evidence is extremely useful, of course, but the clearest indication of the severity of the crisis comes from burial registers. A sample of 42 registers (all extant published registers plus the unpublished registers of Manchester and Bolton-le-Moors), covering roughly half of the county’s population and representative of its major economic sub-regions, shows an exceptionally marked increase in the number of burials between August 1727 and the spring of 1730. Taking the 36–month period from August 1727 to July 1730, the number of burials was roughly 90 per cent higher than we would expect from the mean annual total for the non-crisis periods between 1720 and 1735. Assuming a population of around 225,000 and a normal death rate of 25 per 1000, this would mean that an extra 15,000 or more deaths in Lancashire alone are attributable to the epidemics. All told, this would represent the loss of an extra 6–7 per cent of the county’s population, suggesting the crisis was marginally more severe than the famine of 1623, which is reckoned to have killed 5 per cent. The course of the crisis can be traced in Figure 1, which shows marked peaks in mortality in the late summer and autumn of 1727 and 1728, as well as in the winter of 1728/9 and 1729/30.

Before moving on, it is worth highlighting one geographical nuance to these statistics. Figure 2 shows the sample divided into two sub-groups, the one covering the northern hundreds of Lonsdale, Amounderness, and Blackburn, the other representing West Derby, Leyland, and Salford in the south. It is apparent from these that the crisis took two rather different paths in the two regions. In the south, an initial peak in burials in the late summer and autumn of 1727 was followed by a similar, albeit less severe, one 12 months later. These
peaks were associated with the relapsing, remitting, and spotted fevers mentioned above, and probably thus represented the human cost of typhus or similar fevers. Finally, high mortality was recorded in both the winter of 1728/9 and 1729/30, the latter coinciding with the epidemic reported by William Hillary and many others. By contrast, in the north the mortality peak was largely confined to the winter of 1728/9, with much smaller spikes at the other times, although the whole period was characterised by generally high numbers of burials in both north and south.

These figures represent the total impact of the crisis on the Lancashire population, at least within our sample parishes. However, one of the more interesting aspects of the extant commentaries on the epidemics is the willingness of their authors to suggest a certain degree of social selectivity in mortality. The remainder of this article will use burial registers to assess whether this selectivity can be quantified, looking in particular at three claims: that mortality was especially severe among the old, that the crisis was worse in the countryside than the towns, and that the poor were disproportionately affected.

A socially selective crisis?

According to Nicholas Blundell, it was ‘generally those above 50 years old’ who died in the mortality peak of 1727.33 In the absence of details of the age of those buried in the county’s registers it is impossible to test this assertion as fully as one would like. On the other hand, data from the Staffordshire parish of Trentham, which does record age at death, suggest that the idea contains some demonstrable truth.34 In this parish between April 1722 and July 1727,
and then from August 1730 to July 1732, 44 per cent of those buried were recorded as 50 years or older, whereas the equivalent figure for the three years from August 1727 to July 1730 was 53 per cent. Moreover, the average age at death of those buried during the crisis period was 44.3 years; that for the remainder of the period was 38.0 years. The closest we can get to replicating this test in Lancashire is to infer age from the occasions in which the decedent is recorded as a ‘son’ or ‘daughter’, thus suggesting that they were a minor. What this means in real terms is unclear, though it is seems likely that it represents economic dependence on the child’s parents rather than a fixed age. Nonetheless, the quantification of such burials should give us a useful proxy for the burial of children as against adults, and this approach has been used to good effect by Appleby to argue for the presence of typhus (which tended to kill more adults than children) in Cumberland and Westmorland during the mortality crisis of 1587–1588.35 For our purposes, the burials in a sample of five large parishes, again representative of Lancashire’s economic geography (Bolton-le-Moors, Manchester, Garstang, Prescot, and Sefton), have been quantified under separate headings for ‘children’ and ‘adults’ (Figures 3 to 5).36 Of course, we have no way of knowing which burials during the crisis years resulted directly from the epidemic and which of them simply represented background mortality, and hence we might expect any marked social selectivity in the incidence of mortality to be flattened by the unavoidable incidence of non-crisis burials in our sample.

The data presented are not without ambiguity. Certainly the crisis appears to have been partially driven by an increase in the number of adults buried. There are also some particularly prominent ‘spikes’ which seem to have been driven

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**Figure 2** Indexed burials in Lancashire sample, 1720–1734

Source: 42 burial registers (see note 30).
by an increase in adult burials, such as the autumn mortality peaks in 1727 (Garstang, Prescot and Sefton, and Bolton-le-Moors) and 1728 (Bolton-le-Moors and Manchester). This seems to have been marginally less apparent during the acute crisis of the winter of 1728/9, and the increase in mortality found during the winter of 1729/30 involved a much greater increase in the number of child burials. As a general rule, though, this was an adult crisis, or at least it was adults who died in greater numbers; we cannot know how burial figures relate
to morbidity. In turn, this would support the attribution of the late summer and autumn peaks to typhus or some similar fever, epidemics of which generally did not cause high mortality among children.

There is, then, evidence of selectivity by age, if not the unambiguous support for Blundell’s statement we might have been able to achieve had Lancashire’s registers provided the same level of detail as those of Trentham. A rather more testable assertion was made by William Stout about the geographical basis of the crisis when he wrote of a ‘great mortality in the plaine country’ which was ‘much more then in the towns’. This clear statement of geographical selectivity can easily be explored thanks to the peculiar administrative topography of Stout’s home parish of Lancaster, which covers a vast area of northern Lancashire including large tracts of countryside as well as the urban centre itself. The register is diligent in its distinction between those buried from the town, and those from the rural out-townships. Thus we can use Lancaster’s register (which also records the deaths of prisoners in Lancaster castle) to quantify the monthly burial totals for urban and rural parts of this significant section of northern Lancashire, and the results from this exercise are set out in Figure 6. Again they are slightly ambiguous. The harvest year 1728/9 saw a noticeable increase in urban burials, yet the data do seem broadly to support William Stout’s assertion that it was the ‘plain country’ that was hit hardest. The increase in the numbers of burials during Lancaster’s crisis (which in this case incorporated the harvest years 1727/8 and 1728/9) was more notable in the rural townships and, as a proportion of the total, urban burials were at their lowest point between 1724/5 and 1732/3 during the two crisis years. The first 12 months of the crisis in particular saw the balance shifted decisively towards the countryside.
It is difficult to see why this should be the case, especially when typhus—a louse-borne infection that thrives in cramped conditions—is usually seen as one of the main killers. One explanation could be that malnutrition played the decisive role: since towns often had more developed political structures they were better able to instigate measures for the relief of the poor, and therefore the higher mortality in the countryside could be an indirect function of the comparatively lower purchasing power of the poor there. On the other hand, it has been shown that the north of the county, including Lancaster, was generally less hard hit by the typhus-like late summer and autumn epidemics than the south, whereas this region felt the impact of the wintertime respiratory diseases much harder. The picture is clarified by Figure 8, which charts the month-by-month course of the crisis in Lancaster Parish. In particular, this shows that while there was a small peak in August and September 1727, the main swelling of mortality during the first 12 months of the crisis came in the later winter and early spring. This is a critically important local detail, for it places the true beginning of Lancaster’s population crisis around three or four months after the onset of horse-cold in the county. The connection between the animal disease and that in humans is a plausible one, and indeed was made at the time, and if we can accept that it was a transfer of epidemic sickness from horse to humans that set off the most severe early mortality in Lancaster then it becomes much easier to see how rural areas might have been hit disproportionately hard.

The third and arguably most interesting idea is that the crisis hit the poor harder than the better off. According to Hillary, writing from Ripon, the
intermittent fevers of the autumn of 1727 were so frequent that ‘almost one third part of the poorer labouring people in most places were afflicted with it’. Meanwhile, the same author noted disease in the winter of 1727/8 being especially hard on the economically vulnerable:

Many of the labouring and poor people, who used a low diet, and were much exposed to the injuries and changes of the weather, died; many of whom probably wanted the necessary assistance of diet and medicines... Nor did any other method, which art could afford, relieve them: insomuch that many of the little country towns were almost stripped of their poor people.

By contrast, ‘very few of the richer people, who used a more generous way of living, and were not exposed to the inclemencies of the weather, were seized with any of this diseases at this time’. At York, Wintringham agreed that disease in the late 1720s was socially selective: it was the labouring classes that bore the brunt of the intermittent fevers at the end of 1727, while the ‘many pleurisies... and anginas and peripneumonias’ of the winter of 1728/9 ‘carried off many of the common people’. These statements seem to be suggesting that morbidity was more widespread amongst the poor than the better off, but there is also a hint (Hillary’s comment about diet in particular) that amongst the infected as a whole the poor may have also suffered higher levels of mortality.

Clearly the crisis had an impact on the poorer members of society, and this was most obviously manifested in high expenditure on poor relief across the county. Figure 8 shows a composite mean of poor relief expenditures (with 100
representing the whole period between 1690 and 1750) across the crisis period, indicating a very marked peak in the late 1720s. This seems to have been partly responsible for the spate of workhouse foundations in the county around 1730, with Stout recording that in Lancaster, as a response to spiralling poor rates, a house was hired to entertain the poor in, to be maintained without going a begging, and to employ such as were able to worke in some imploy; and a person to set them on to worke. Upon which, many that used to beg, finding themselves stopped from begging, fell to work, rather than to be confined to the poor house.

Of course, some of this rise was undoubtedly the result of high food prices, a link that Stout made explicitly, but there is also evidence of increased medical costs compatible with a model in which widespread sickness was a major cause of poverty. In Atherton, a township blessed with detailed surviving poor law accounts, the amount and proportion of money spent on medical care for the poor rose markedly between 1727 and 1729 (Figure 9), suggesting an independent role for widespread sickness.

The more interesting question, however, is whether this increased deprivation translated into higher levels of mortality amongst the poor and vulnerable. Again we can turn to the information contained in burial registers to explore this question in more detail. Unfortunately, only a small proportion of parish registers contain enough information about occupations to be quantified in this way. Parish clerks in the south of the county seem to have been more diligent in their recording of occupations than elsewhere and therefore we are forced to incorporate a geographical bias into our sample. There is also the basic
problem that many parishes were simply too sparsely populated to throw up any meaningful data in this way. The choice of sample parishes, then, is severely restricted. Furthermore, there are very real methodological problems in using the kind of bland occupational titles used in parish registers. Three especially serious concerns stand out. Firstly, in a society in which the division of labour was only partial, single occupational titles conceal multiple individual earning strategies. Secondly, since earning was pooled between members of a household, the use of male adult occupational titles does little justice to the contributions of women and children to the domestic economy. Thirdly, titles themselves can be difficult to interpret. A chapman, for example, was almost certainly usually a small tradesman, perhaps relatively poor, but Bolton-le-Moors parish buried two ‘Gentleman’ chapmen in the period under study. Similarly, a collier on the coalfield was likely to have been a coal miner, one in the north of the county would have worked charcoal.

With these caveats in mind, four registers have been used: Prescot, Melling-in-Halsall, Bolton-le-Moors and Hindley. Prescot and Bolton-le-Moors dominate the sample, accounting for a respective 39 and 49 per cent of the 4,870 burials counted; Melling and Hindley, meanwhile, contributed only 7 and 5 per cent respectively. Of the four, the last two were dominated by textile workers: in Hindley these were usually fustian weavers, while in Bolton they were normally simply designated ‘weaver’, but from what we know about the parish we may assume the majority were likewise employed. Melling-in-Halsall’s population appears to have been primarily engaged in agriculture, but with significant numbers also employed in small rural trades and manufacturing. Prescot provides the most complex situation, with a notably diverse occupational profile. Metalworking appears to have been more

Figure 9  Poor expenditure in Atherton, 1710–1732

Source: Atherton poor accounts: WAS, TR/Ath/C/2/2–5.
important than textiles, while mining and fuel production dwarfed both as an employer. There was also, as we would expect, a significant agricultural sector in each parish, and there were a small number of gentle, professional and mercantile occupations recorded in all except Hindley. In sum, the four parishes provide a relatively good sample of different types of economic activity, with the occupational structure of Prescot particularly diverse, the small town of Bolton (within the parish of Bolton-le-Moors) adding a significant though not overwhelming urban dimension.

The first point to take from Table 1 is that the gentle, mercantile and professional category experienced no increased mortality, suggesting at least some social differentiation in the incidence of death. On the other hand, outside this group, high mortality was general across almost all occupational groups. If, however, we calculate the relative increase in the number of burials falling into each category, then we find that there were noticeable alterations in the burial profile outside the ‘elite’ group. There seems to have been a general shift in the balance of burials down the social scale, towards the more vulnerable groups in society, taken in this case to include widows, spinsters, travellers, and paupers.\textsuperscript{51} The most marked proportional growth was amongst widows and spinsters. In the former case it is likely that this reflects the larger numbers of widows in a population increasingly fractured by widespread death, but the increase in the proportion of spinster burials suggests that social vulnerability was also a factor. In addition, there was a clear difference in the

<table>
<thead>
<tr>
<th>Occupation</th>
<th>Burials per year (non-crisis)</th>
<th>Burials per year (crisis)</th>
<th>% increase during crisis</th>
<th>Total burials</th>
</tr>
</thead>
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<tr>
<td>Gentry, mercantile, and professional</td>
<td>9.7</td>
<td>9.0</td>
<td>-8</td>
<td>130</td>
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<tr>
<td>Yeoman, farmer, and husbandman</td>
<td>38.2</td>
<td>64.7</td>
<td>+69</td>
<td>594</td>
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<tr>
<td>Metal-working</td>
<td>6.2</td>
<td>14.0</td>
<td>+70</td>
<td>134</td>
</tr>
<tr>
<td>Textiles</td>
<td>63.8</td>
<td>116.3</td>
<td>+82</td>
<td>953</td>
</tr>
<tr>
<td>Mining and fuel-related</td>
<td>12.1</td>
<td>20.7</td>
<td>+75</td>
<td>201</td>
</tr>
<tr>
<td>Other skilled and semi-skilled</td>
<td>71.7</td>
<td>111.3</td>
<td>+55</td>
<td>1,079</td>
</tr>
<tr>
<td>Total skilled and semi-skilled</td>
<td>155.9</td>
<td>262.3</td>
<td>+68</td>
<td>2,367</td>
</tr>
<tr>
<td>Unskilled labour</td>
<td>27.0</td>
<td>60.7</td>
<td>+125</td>
<td>494</td>
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<td>Widows</td>
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<td>79.0</td>
<td>+163</td>
<td>547</td>
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<tr>
<td>Spinsters</td>
<td>9.5</td>
<td>25.7</td>
<td>+170</td>
<td>185</td>
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<tr>
<td>Poor</td>
<td>0.5</td>
<td>1.0</td>
<td>+51</td>
<td>27</td>
</tr>
<tr>
<td>Other vulnerable</td>
<td>6.8</td>
<td>10.7</td>
<td>+58</td>
<td>77</td>
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<tr>
<td>Total vulnerable</td>
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<td>Unknown</td>
<td>29.4</td>
<td>53.3</td>
<td>+81</td>
<td>441</td>
</tr>
</tbody>
</table>

Table 1: Burials by occupation in Bolton-le-Moors, Hindley, Melling and Prescot, 1721–1735

Source: Bolton-le-Moors parish register (1723–1734); Hindley parish register (1721–1735); Melling-in-Halsall chapelry register (1722–1735); Prescot parish register (1721–1735).
proportional increase of burials of unskilled labourers when compared to the agriculturalist and skilled and semi-skilled labourers. In fact, the increase amongst the first group was not far short of twice as marked as the last two. Overall, then, it does seem safe to conclude that there was indeed a relationship between poverty and mortality.

Conclusion

There is much that can be said about the population crisis of 1727–1730. Given the wide survival of records, from parish registers to poor accounts to published medical tracts, it is surprising that this violent series of epidemics has not received more attention from social and medical historians. Obviously, a short article such as this can only scratch the surface of what was a major event in demographic history. What we can offer, however, is some suggestive detail about the course and impact of the crisis. Indeed, the kind of intensive local analysis presented here, and encouraged by this journal in particular, proves particularly instructive. We learn, for example, that in Lancashire there were four separate peaks in burials standing out against a background of increased mortality: two in the late summer and autumn of 1727 and 1728, then two in the winter of 1728/9 and 1729/30. This picture suggests broad similarities with that offered by other studies. Wrigley and Schofield, in particular, detected the crisis beginning suddenly in August and September of 1727, then undergoing a period of geographical extension after July 1728. A similar chronology is also evident from Goode's study of Warwickshire. It is also apparent that the crisis took a different course in the north of the county (where the winter 1728/9 peak stands out very markedly) and the south (where the earlier summer/autumn peaks were much more severe than further north). We can also say something about the social selectivity of mortality during the epidemics. It is extremely difficult to test precisely Nicholas Blundell's assertion that the over-50s suffered most in Lancashire, but corroborative data from Staffordshire, and the clear trend towards a higher volume of adult burials across the crisis years, does suggest that he was broadly correct. Similarly, evidence from the vast parish of Lancaster lends some support to William Stout's assertion that the diseases were more keenly suffered in the countryside than the towns, particularly, it seems, in the wake of the horse infection in late 1727. Finally, the evidence of both the poor law and the occupational profile of those who died suggest a real connection, as emphasised by some commentators, between poverty and mortality.

NOTES

2. In all likelihood the Civil War years saw higher mortality levels, but burial records are notoriously patchy and so have been excluded: C. Carlton, Going to the wars: the experience of the British civil wars, 1638-1653 (London, 1994), 211, 340.


9. According to figures in Phillips and Smith’s history, the population of the county stood at just over 190,000 in the 1690s, while by 1750 it was nearly at 300,000; the figure of 225,000 for 1730 would make some allowance for growth over the period: Phillips and Smith, Lancashire and Cheshire, 66–70.


22. W. Hillary, A practical essay on the small-pox. To which is added, an account of the principal variations of the weather at Ripon, and the concomitant epidemical diseases, from the year 1726, to the end of the year 1734, 2nd edn (London, 1740); C. Wintringham, Commentarius nosologicus: a treatise on the study of diseases; embracing the epidemic diseases and variations in weather in the City of York and neighbouring places through twenty consecutive Years, trans. E. Johnson (Pocklington, 1799).


25. Hillary, Practical essay, 35.

27. Blundell, Great diurnal, 230.
30. Registers consulted: Aughton; Blackley; Bolton-le-Moors; Bolton-le-Sands; Broughton-in-Furness; Childwall; Deane; Denton; Didsbury; Downham; Garstang; Goosnargh; Gorton; Hale; Halsall; Heysham; Hindley; Lancaster; Leigh; Leyland; Lytham; Manchester; Melling-in-Halsall; Middleton; Newton Heath; North Meols; Penwortham; Preston; Radcliffe; Rainford; Rivington; Sefton; Todmorden; Torver; Tunstall; Upholland; Urmston; Walton-on-the-Hill; Warton-in-Lonsdale; Whalley; Whittington.
33. Blundell, Great diurnal, 230.
34. S.W. Hutchinson ed., Trentham parish register (Stoke-on-Trent, 1906).
35. Appleby, Famine, 103-8.
38. Appleby, Famine, 103.
41. Blundell, Great diurnal, 230.
42. One nagging doubt remains, which is that Stout was referring to the sickly summer in which burials were higher in the countryside, whereas the main mortality peak discussed above occurred in the spring. Thus, Stout’s claim is apparently at variance with the parish register. This should not cause undue concern, however, as the more objective data of the parish register is fairly unambiguous. Moreover, Stout was probably writing around 15 years later and may have unwittingly conflated summer with spring: Stout, Autobiography, 17.
43. Hillary, Practical essay, 11.
44. Hillary, Practical essay, 14.
45. Winteringham, Commentarius nosologicus, 34, 38.
46. LRO, PR/2890/2/1, Accrington (New and Old) parish accounts, 1691-1800; LRO, PR/872, Alston churchwardens’, overseers’ and constables’ accounts, 1712-1817; Wigan Archive Service, Leigh (hereafter WAS), TR/Ath/C/2/1-4, Atherton overseers’ accounts, 1692-1751; LRO, PR/2592/2, Bisham town’s book, 1722-1808; Bury hamlet overseers’ accounts, 1692-1760, microfilm copy in LRO; LRO, PR/498-500, Caten township accounts, 1714-95; Manchester Archives and Local Studies, Manchester (hereafter MALS), M/10/7/2/1, Cheetham overseers’ accounts, 1693-1791; MALS, M/10/9/2/1; Chorlton-on-Medlock overseers’ accounts, 1718-1794; LRO, PR/256, Croston township accounts, 1717–1855; MALS, L82/2/1, Goodshaw overseers’ accounts, 1691–1741; LRO, PR/264-5, Halsall township accounts, 1694–1885; Cumbria Record Office, Kendal Branch (hereafter CRO (K)), WPR/83/7/3, Hawkshead overseers’ accounts, 1690-1750; WPR/83/4/2, Monk Coniston with Skelwath overseers’ accounts, 1691–1808; LRO, PR/2667, Nether Wyresdale town accounts book, 1685–1837; WAS, TR/Pe/C/1/1–37, Pennington overseers’ papers, 1699–1790; LRO, PR/3168/7/9, Tarleton overseers’ accounts, 1708–1767. In each township a mean annual disbursement figure was calculated, covering all surviving years. This was taken as 100, with each year’s disbursement total recalculated as a proportion of 100. A mean was then taken of all extant annual values to make up the composite mean for the sample as a whole in each year.
48. WAS, Tr/Ath/C/2/2-5, Atherton overseers' accounts, 1704–33.
50. Wives and children are counted under their husband/father’s occupational title.
51. To a certain extent the inclusion of widows and spinsters begs questions. Nonetheless, these groups were almost always over-represented in lists of the poor so it seems fair to count single women in this category. On the vulnerability of single women see: Healey, ‘Marginality and misfortune’, 224–34.
RESEARCH IN PROGRESS

THE STILLBIRTH RATE IN EARLY MODERN ENGLAND

Chris Galley

Over the last 40 years or so English parish registers have been extensively analysed to create a range of demographic measures relating to mortality, fertility and nuptiality. This process has enabled the major population changes to be revealed from 1538, the date when parish registers were first ordered to be kept, until 1837, when a national system of civil registration was introduced. In addition to providing simple lists of baptisms, burials and marriages occurring within the church, some parish registers, for certain periods, contain a wealth of additional details relating to age, occupation, place of residence and cause of death. A few registers even recorded stillbirths, babies who died before, during or at birth. Stillbirths are a neglected, but important, demographic phenomenon since stillbirth rates (SBRs) are linked with infant, and especially neonatal, mortality (deaths within the first 28 days), birthing processes, the mother’s health and patterns of fertility. Indeed, when Wrigley sought to account for increases in fertility during the eighteenth century he argued that, ‘there was a large fall in the stillbirth rate in England in the course of the “long” eighteenth century, and that this in turn caused the mean interval between births to shorten and thus marital fertility to rise’. Wrigley could not confirm this association empirically, but nationally SBRs would need to have been in the region of 100–125 per 1,000 birth events during the late seventeenth century in order for the resulting increase in fertility to have occurred. Curiously, given the importance of this topic, there has been no systematic attempt to calculate a representative SBR directly from parish registers. This note seeks to begin this process: it aims to draw attention to the importance of stillbirths and it presents rates derived from a range of parish registers.

A stillbirth is defined by the Office of National Statistics as, ‘a child born after the 24th week of pregnancy who did not show any sign of life at any time after being born’. Before 1 October 1992 foetal deaths before 28 completed weeks of gestation did not need to be registered, and hence prior to 1993 stillbirths by definition had to be born after the 28th week of pregnancy. This change ensured harmony with the Abortion Act of 1990 which had reduced the limit on abortions from 28 to 24 weeks. It also reflected the view that medical advances had meant that most foetuses were viable after 24 weeks.
Determining exactly what constitutes a stillbirth is not necessarily straightforward. All foetal ages must to some extent be considered approximate since they are usually based on the recalled date of the mother's last menstrual period. Likewise, there may also be some ambiguity, especially in historical populations, about what precisely constitutes 'signs of life'—in some instances infants who only survived for a very short time may have been buried as though they were stillborn. Wrigley cites examples from Spain where all live-born children dying within 24 hours of birth were registered as stillborn, while in France the practice of baptising difficult confinements in the womb (ondoyé décedés) inflated the infant mortality rate (IMR) because some of these were subsequently stillborn. Even within contemporary populations Gourbin and Masuy-Stroobant showed that when international comparisons of stillbirth and early-age IMRs are made, an awareness of the precise definitions in use within individual countries is needed.

In England and Wales stillbirths did not need to be registered until 1 July 1927, but afterwards national and local SBRs were published annually by the General Register Office. Between 1927 and 1938 the national SBR remained relatively stable, varying from 38.3 to 41.4 per 1,000 birth events, although the range within local authority areas was from c.25 to c.70. After 1938 the national rate declined steadily, reaching 22.6 in 1950, 10.8 in 1975 and 5.3 in 2000 (24+ weeks). It seems reasonable to conclude, therefore, that national SBRs below 40 were unlikely to have occurred prior to the 1920s, given some form of link between stillbirths and infant mortality, and that pre-1927 IMRs were not significantly lower than those in the 1930s. Unfortunately, this assumption cannot be verified since no single source systematically listed stillbirths prior to 1927. Estimates of the SBR can, however, be made for selected groups. For instance, some maternity hospitals differentiated live from stillbirths, while medical officer of health reports occasionally reported numbers of stillbirths. A systematic trawl through these types of sources may produce estimates of the SBR during the late nineteenth and early twentieth centuries but, with little quantitative work having been carried out, in 2005 Robert Woods used an alternative method to establish a long-run series of SBRs. By examining variations in early neonatal and maternal mortality rates during the 1930s Woods proposed a theoretical foetal-infant life table for a high mortality population and this allowed him to estimate a long-term series of SBRs using data from English population history from family reconstitution (1997). Woods' estimates of the national SBR range from 64 (1650–74) to 42 (1825–37), which are considerably lower than those suggested by either Wrigley or Hart. It therefore seems reasonable to ask, are these SBRs supported by parish register evidence?

While the recording of stillbirths, or abortives as they were sometimes called, in parish registers was not commonplace, examples are easy to discover. The following are taken from the register of St Vedast, Foster Lane, London:

Rob’te Farringtons still borne childe was buried the xxvith day of Septemebre 1591;
A stillborne child of John Chretchloes was buried in ye crosse Ile of ye Church Decem ye 18th, 1659;
A still borne childe of John Kirke was buried in the Churchyd. The 22nd
day of August 1696, out of Widow Brookes house in ye old Chaining.13
In each case stillbirths are specifically identified and, moreover, they are clearly
distinguished from unbaptised infant burials; for example,

A new borne child of Mr Bents was buried in the crosse Ile of the
Church March the 15th, 1658;
A Chrisome child of Captin John Eatons was buried in ye north Angle
of ye Chancell, Jan 5th, 1668.14

It cannot be known for certain exactly what individual parish clerks and
parents understood by the term stillbirth, but in this register it would appear to
be a relatively simple task to count the numbers of baptisms, unbaptised infant
burials and stillbirths and then calculate the SBR.

Entries from the register of All Hallows Bread Street, London, reveal additional
details. Between 1619 and 1653 the locations of most burials were indicated,
charges were given and some stillbirth burials were listed, although not in
sufficient quantity to provide a representative rate during this period. For
example,

15 Oct 1627, a still born child of Mr Edward Rudge, salter [of this p’ish.
7s 4d];
10 Aug 1633, A stillborne childe of John Pymmes, wollen drap. [of this
parish, in the church in the middle yle under the footstolle against the 9
pewe 4s];
8 Nov 1633, a still borne childe of Mr Richard Counes [in the middle
oyle against the middle grene pewe 3s 4d]. 15

Charges were similar to most child burials and stillbirths were not confined to
special burial locations. The cost of most stillbirth burials was c.4s., while adult
burials could cost as much as £1 6s. 8d., depending on location, although most
were c.10s. I have yet to discover similar evidence in other registers, but that
from All Hallows suggests that stillbirth burials were treated in a similar way
to those of the rest of the population. This evidence may also suggest a reason
why the recording of stillbirths may have been defective in this period—any
burials where no payment was made, such as pauper ones, may have been
omitted from the register.16

The accuracy of any demographic rate is dependent on the quality of
registration, but with no alternative source listing vital events during the
parish register period it is necessary to rely on internal consistency within the
source itself in order to have confidence in any resulting rate. When stillbirths
are recorded calculating the SBR is straightforward, but care needs to be taken
to ensure that stillbirths have been consistently recorded over a sufficiently
long period of time for the rates to be considered representative. Any sudden
drop in the level of recorded stillbirths will probably represent a gap in
registration since short-term variations in SBRs, about which little is known,
are unlikely to have been great. Three examples, which illustrate both the
limitations and potential of parish registers in producing reliable SBRs, will
now be considered.

Roger Schofield discovered that stillbirths were recorded in the parish register
of Hawkshead, Lancashire between 1581 and 1710. The overall SBR was 45,
although decadal rates varied between 15 (1591–1600) and 87 (1691–1900). 17
During the sixteenth century large numbers of un-named infant burials were
also recorded and Schofield argued that some of these may have been
stillbirths—if these decades are eliminated then the overall SBR (1601–1710)
becomes 52 and the lowest rate increases to 28 (1641–1650). Wrigley also used
data from this parish to suggest that high SBRs were plausible, quoting a rate
of 75 for the period 1658–1705. 18 However, in 1980 Roger Finlay reworked the
Hawkshead data. 19 He showed that the overall IMR was low and, when the
residences given for infants and abortives buried between 1690 and 1709 were
mapped, there was a tendency for those living in the more distant parts of the
parish, often more than five miles from the church, to register stillbirths rather
than infant burials. Rather than demonstrating spatial variations in SBRs,
Finlay argued that transport difficulties would have caused a greater
proportion of infants born in the outlying parts of the parish to have died
unbaptised and he concluded that a, ‘plausible explanation is that some of the
abortives were stillborn and some were liveborn’. 20 The high SBRs are therefore
a consequence of differential recording practices. If this is true then Wrigley’s
high estimate needs to be reconsidered. We are now left with two intriguing
questions: how accurate was the Hawkshead register in reporting stillbirths?;
and what is a representative SBR in Hawkshead? These questions cannot, of
course, be answered satisfactorily, part of the reason being that in any single
parish only small numbers of stillbirths were recorded: even during 1691–1700
only 27 were entered, less than three per year.

In 1971 Thomas Forbes published a study of St Boltoph without Aldgate,
London, based on memorandum books kept by clerks in that parish. 21 These
documents provide a wealth of detail about life and conditions within the
parish and they also listed stillbirth burials. Forbes reported SBRs for two
periods: 1584–1598 when the rate was 96.6; and 1609–1623 when it had
decreased to 39.8. 22 Examination of the memorandum books reveals a likely
reason for this apparent fall with Forbes quoting the following entry: a child,
‘Dyed and was buried the ixth day of May Anno 1596. Which chyld was borne
alyve the day before and for that he was not cristned he was accompted a
stillborne’. Another child was recorded as a stillbirth even though it was seven
days old. 23 In this instance it would appear that unbaptised, early neonatal,
burials were being treated the same as true stillbirths. Consequently, while
there is no way of knowing how the parish clerk defined stillbirths, it is
unlikely that the fall between the two periods is connected with changing
prenatal conditions: instead, by 1609–1623 a more rigorous definition of
stillbirth was probably being used. Again such a conclusion must remain supposition, but without the level of detail included in the memorandum books it could not have been discovered that the SBR recorded during the earlier period is unreliable.

The first two examples have demonstrated some of the difficulties associated with calculating a representative SBR; the third illustrates the potential of parish registers in this respect. The parish of Hackness is located in North Yorkshire between Scarborough and Whitby and has a register of exceptional quality. Between 1630 and 1676, when John Richardson was parish clerk, the register was kept immaculately. Richardson included descriptions of terrible storms and difficult confinements, including those of conjoined twins in the register.24 He made every effort to record all events that occurred in his parish—even recording births from Papists.25 Richardson also recorded stillbirths,

An abortive childe of Thomas Coulson buryed the 30 Novembr (1632);
William Consetts wyffe was brought in bedd of two children the xijth day of January (1656) the one was an abortive sonne born dead the other was a daughter and was Baptized the xiiijth day of the same and named Ann.26

The second entry shows that he distinguished between live and stillborn twins and there is every reason to believe that Richardson has provided us with a very accurate guide to the numbers of vital events that took place in Hackness. During the period from 1631 to 1660 (the burial register from 1661 onwards is lost) 25 stillbirths were recorded together with 465 baptisms and 13 unbaptised infant burials, which produces a SBR of 50 (25/(465+13+25)). At the same time the IMR was 146 per 1,000 live births and both rates appear plausible. Even though only relatively small numbers of events were recorded, there is every reason to believe that the SBR recorded in Hackness is as accurate as any that can be produced from a parish register.

These three short case studies have illustrated some of the challenges faced when attempting to derive accurate SBRs from single parish registers. The detail included in the first two sources show that determining whether registration is complete is by no means straightforward. They have also shown that under certain circumstances the calculated SBR may overestimate the true rate. Determining when under-registration has taken place is probably easier, since in many circumstances visual examination of the register or significant annual variations in the number of recorded stillbirths will probably induce suspicion. Again it is worth reiterating that SBRs below those recorded in the 1930s (<25) are probably implausible.

As a first step towards determining a representative SBR for early modern England, Table 1 reports rates from a variety of parishes. It brings together previously published SBRs together with new ones calculated directly from printed parish registers. The criteria for inclusion was that there was no
evidence of under-registration in the register, stillbirths had to be registered for a long period (usually over 20 years, although an exception was made in the case of St Martin-in-the-Fields, due to the large number of events recorded in each year) and there were no sudden changes in the number of stillbirths registered during the period of observation. These criteria were met first, by visual inspection of the register and, second, by an examination of the annual number of stillbirths. No statistical testing was employed and no attempt to make the sample representative was made. The new parishes selected for analysis were chosen because their registers were easily accessible or that they were already known to list stillbirths. London parishes dominate the sample and this was a consequence of Finlay’s work which resulted in other transcripts being searched. Given the disparate sources used, Table 1 reveals a low level of variation—from 29 (St Mary Somerset) to 55 (St Vedast & St Michael le Quern). Indeed, the non-London parishes show even less variation, from 42 (Terling) to 50 (Hackness), and all the rates in Table 1 fall within the range recorded in local authority areas during the 1930s. While too much should not be made of the overall rate of 45, this does appear to provide a fairly representative value for this period, with Table 1 including a range of environments from rural parishes to small towns to provincial cities and London. There is also no strong association between SBRs and infant mortality. IMRs varied from c.100 in Hawkshead to 146 in Hackness, c.270 in York and perhaps even higher in some of the London parishes. Likewise, the single late-eighteenth and early-nineteenth century rate from Balderstone suggests tantalisingly that there may have been little change in SBRs throughout the entire parish register period. Unfortunately, it is difficult to test this hypothesis since few parish registers appear to have recorded stillbirths during the eighteenth century.

While Table 1 does not contain sufficient data to allow definite conclusions to be drawn, a number of tentative ones can be proposed. First, it is worth reiterating that ascertaining the accuracy of SBRs remains difficult and there always remains the possibility that the rates included in Table 1 may suffer from either under- or over-reporting. However, the mere act of recording stillbirths—events that were not required to be entered into a parish register—suggests that these registers are generally of a very high quality. It therefore seems safe to conclude that Table 1 provides no evidence to support the view that SBRs were in the region of 100 or even higher during the early modern period; indeed, the evidence presented broadly supports Woods’ long-run series of SBRs. It also implies that between 1840 and 1940, unlike infant mortality, but similar to maternal mortality, no substantial decline in the SBR occurred. It is, of course, still possible that significant improvements in foetal health occurred during the ‘long’ eighteenth century, causing marital fertility to rise; but it was early-foetal mortality (miscarriages) rather than late-foetal mortality (stillbirths) that declined.

In order to verify the above conclusions, many more parish register estimates are needed, especially from rural or late-eighteenth and early-nineteenth-century parishes, both of which are under-represented in Table 1. Likewise, a
similar analysis employing the various available sources from the nineteenth and early twentieth centuries could confirm whether or not the general stability of SBRs was maintained until the 1920s. Although time-consuming, the process of deriving SBRs from parish registers is straightforward and a good place to start would be to search through the various series of printed parish registers that exist for many English counties.29

Acknowledgements

I am grateful to Eilidh Garrett, Nigel Goose and Bob Woods for making comments on an earlier draft of this article.

Table 1 Parish register stillbirth rates

<table>
<thead>
<tr>
<th>Parish</th>
<th>County</th>
<th>Date</th>
<th>Births</th>
<th>Stillbirths</th>
<th>SBR</th>
</tr>
</thead>
<tbody>
<tr>
<td>All Hallows Bread St a</td>
<td>London</td>
<td>1671–1700</td>
<td>301</td>
<td>17</td>
<td>53</td>
</tr>
<tr>
<td>St Botolph Bishopgate b</td>
<td>London</td>
<td>1617–1650</td>
<td>2,101</td>
<td>112</td>
<td>51</td>
</tr>
<tr>
<td>St Dunstan in the East b</td>
<td>London</td>
<td>1605–1653</td>
<td>3,103</td>
<td>103</td>
<td>32</td>
</tr>
<tr>
<td>St Helen’s Bishopgate c</td>
<td>London</td>
<td>1595–1680</td>
<td>1,521</td>
<td>76</td>
<td>48</td>
</tr>
<tr>
<td>St Martin-in-the-Fields d</td>
<td>London</td>
<td>1620–1636</td>
<td>5,142</td>
<td>275</td>
<td>51</td>
</tr>
<tr>
<td>St Mary Somerset b</td>
<td>London</td>
<td>1605–1653</td>
<td>2,079</td>
<td>62</td>
<td>29</td>
</tr>
<tr>
<td>St Michael Cornhill b</td>
<td>London</td>
<td>1580–1650</td>
<td>2,281</td>
<td>75</td>
<td>32</td>
</tr>
<tr>
<td>St Mildred &amp; St Margaret Moses e</td>
<td>London</td>
<td>1670–1700</td>
<td>509</td>
<td>23</td>
<td>43</td>
</tr>
<tr>
<td>St Peter Cornhill h</td>
<td>London</td>
<td>1580–1650</td>
<td>1,769</td>
<td>88</td>
<td>47</td>
</tr>
<tr>
<td>St Vedast &amp; St Michael le Quern f</td>
<td>London</td>
<td>1578–1700</td>
<td>3,755</td>
<td>219</td>
<td>55</td>
</tr>
<tr>
<td>Balderstone g</td>
<td>Lancs</td>
<td>1787–1812</td>
<td>949</td>
<td>47</td>
<td>47</td>
</tr>
<tr>
<td>Hackness h</td>
<td>Yorks</td>
<td>1631–1660</td>
<td>478</td>
<td>25</td>
<td>50</td>
</tr>
<tr>
<td>Hawkshead i</td>
<td>Lancs</td>
<td>1581–1710</td>
<td>4,606</td>
<td>218</td>
<td>45</td>
</tr>
<tr>
<td>Tealing f</td>
<td>Essex</td>
<td>1601–1665</td>
<td>1,309</td>
<td>58</td>
<td>42</td>
</tr>
<tr>
<td>York (four parishes) h</td>
<td>Yorks</td>
<td>1614–1700</td>
<td>4,624</td>
<td>220</td>
<td>45</td>
</tr>
<tr>
<td>Overall</td>
<td></td>
<td></td>
<td>34,507</td>
<td>1,618</td>
<td>45</td>
</tr>
</tbody>
</table>

Sources:  
a) Bruce Bannerman, ‘All Hallows’;  
b) Finlay, Population and metropolis, 37;  
c) W. Bruce Bannerman ed., ‘The registers of St Helen’s, Bishopgate, London’, Publications of the Harleian Society—Registers, 31(1904);  
e) W. Bruce Bannerman ed., ‘The registers of St Mildred Bread Street and St Margaret Moses, Friday Street, London’, Publications of the Harleian Society—Registers, 42 (1912);  
f) Littledale ‘St Vedast’;  
g) Lancashire Online Parish Clerk Project (http://www.lan-opc.org.uk), accessed on 2 April 2008;  
h) Johnson and Hart, ‘Hawkness’;  
i) Schofield, ‘Perinatal mortality’, 13;  
k) C. Galley, The demography of early modern towns (Liverpool, 1998), 85.
NOTES


16. More informal burials may also have occurred as a means of avoiding these charges. Registration in All Hallows Bread Street appears more reliable during the period 1671–1700, see Table 1. Some of the SBIRs reported for London parishes by R. Finlay, *Population and metropolis* (Cambridge, 1981) are also clear underestimates.


20. Finlay, ‘Distance to church’, 35. Wrigley, ‘Marital fertility’ does not cite Finlay’s *LPS* paper.


29. With a view to undertaking further research on this topic the author would be grateful if any reader with knowledge of parish register stillbirths, or other similar information, contact him at c.galley@barnsley.ac.uk or at Barnsley College, Eastgate, Barnsley, S70 2YW.
RESEARCH NOTE

THE CAUSES AND EFFECTS OF ERROR CORRECTION IN THE POPULATION TOTALS OF THE 1801 CENSUS OF ENGLAND AND WALES

Matthew Woollard

A few months ago I was asked what was the official population of England and Wales in 1801. My first reaction to this question was one of irritation. Surely it would be straightforward to find the answer by looking at one of the volumes of the 1801 census? So, I examined the first Abstract of the 1801 census where I found the information presented in Table 1.1

The information presented in Table 1 is spread over a few pages of this Abstract and it has been arranged here in a different format to provide comparisons with data presented later in this article. The notes and comments in the Abstract make it clear that these figures do not represent the complete population of England and Wales as some of the local returns were not available for inclusion at the time of publication of this Abstract. The census had been taken on 10 March 1801 and these counts only include returns received by Rickman before 26 June.

In December 1801 Rickman presented updated figures in the so-called Enumeration Returns which are shown (again, reformatted) in Table 2.2 The publication of these updated figures shows that John Rickman had not received a substantial number of returns by late June. It also demonstrates the importance of understanding the publication sequence of census returns; taken alone, it would be quite easy to be misled by the figures in the Abstract and in Table 1. Officially, the population of England and Wales in 1801 without the military (and prisoners in hulks) was 8,872,980. However, to say that the population of England and Wales with these military and prisoners added was 9,343,378 would be jumping the gun, as the figures for the military and prisoners include Scotland as well as England and Wales.3

Nevertheless, with this caveat, that should have been the end of the story, but for an entirely different reason I had on my desk a print-out of a table from a page in the General Report from the 1931 census that gave the population at each census date from 1801 to 1931.4 According to this table, the population of England and Wales for 1801 was 8,892,536, which is very different from the
8,934,578 given in the Enumeration Returns for 1801, and also different from the 8,872,980 recorded in the same returns if one excludes the army and navy and convicts aboard hulks. With these exclusions there remains a discrepancy of some 19,556 people. Where did this discrepancy come from? My first step in this enquiry was to attempt to find the figures reported for 1801 in the 1931 census by country and divided by sex. However, this level of breakdown is not available in the 1931 census report, so I examined the returns in the 1851 Population Tables. Table 3 gives the breakdown of population in 1801, as published in the first volume of the Population Tables for 1851. This gives the same total figure as in the 1931 General Report, and it shows that the discrepancy is evenly split between the sexes: 9,622 males and 9,934 females.

At this point I concluded that the “final” figures published in December 1801 were still based on totals with some local returns not reaching Rickman. However, in both the Comparative statements for the 1811 and 1821 censuses, the figures for England, Wales and ‘Army, Navy’ are identical to those presented in Table 2 above, though in these volumes the heading ‘Army, Navy, &c.’ sums to the total of the figures reported in the 1801 Enumeration Returns for Army, Navy as well as convicts on board hulks.5

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Table 1  Preliminary results for the population of England and Wales, 1801

<table>
<thead>
<tr>
<th></th>
<th>Males</th>
<th>Females</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>England</td>
<td>3,580,844</td>
<td>3,911,640</td>
<td>7,492,484</td>
</tr>
<tr>
<td>Wales</td>
<td>120,712</td>
<td>136,177</td>
<td>256,889</td>
</tr>
<tr>
<td>Army and navy, etc.</td>
<td>469,188</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>4,170,477</td>
<td>4,046,817</td>
<td>8,217,516</td>
</tr>
</tbody>
</table>

Source: Census of Great Britain, 1801, Abstract, presented to the House of Commons, of the answers and returns made to the Population Act of 41st Geo. III &c. BPP 1801 VI (140), 4, 6.

Table 2  Population of England and Wales, 1801, according to 1801 Enumeration Returns.

<table>
<thead>
<tr>
<th></th>
<th>Males</th>
<th>Females</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>England</td>
<td>3,987,935</td>
<td>4,343,499</td>
<td>8,331,434</td>
</tr>
<tr>
<td>Wales</td>
<td>257,178</td>
<td>284,368</td>
<td>541,546</td>
</tr>
<tr>
<td>Army and navy, etc.</td>
<td>469,188</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>4,715,711</td>
<td>4,627,867</td>
<td>9,343,578</td>
</tr>
</tbody>
</table>

Note: At the publication of this report there were still some returns missing for Scotland.

It transpires that the reformulation of the population figures actually took place around 1850. Two separate processes occurred which impinge on our understanding of the pre-1841 population totals as reported in subsequent census reports. First, military personnel were reallocated geographically and, second, parish, hundredal and county population counts were examined, assessed and corrected.

Military allocation changes

In the first volume of *Population Tables* for 1851, under the heading of ‘persons absent from Great Britain, and their usual places of abode’ we learn that ‘[i]n the censuses of 1801 to 1831 the army, navy, and seamen ashore, as well as those abroad, were not enumerated in Great Britain; but the whole of the number, including the part of the army stationed in Ireland, as well as the part of the army and navy abroad, belonging properly to Ireland, was added to the population of Great Britain. The result was an evident overstatement of the male population of this portion of the United Kingdom.’

To rectify this misallocation of military personnel, the Census Office decided to calculate the proportion of these people by their location in 1851 and allocate them across the British Isles (and further afield) for the earlier census years (with the exception of 1811 where different circumstances applied). The *Population Tables* report notes that with these adjustments ‘...we obtain a near approximation to the population of Great Britain at each decennial step of its progress through the half century.’

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<table>
<thead>
<tr>
<th></th>
<th>Males</th>
<th>Females</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wales</td>
<td>257,248</td>
<td>284,429</td>
<td>541,677</td>
</tr>
<tr>
<td>Total</td>
<td>4,254,735</td>
<td>4,637,801</td>
<td>8,892,536</td>
</tr>
</tbody>
</table>

for the purposes of calculating the decennial increases of population at each
decade from 1801 to 1851, as 9,156,171. Deducting from this figure the
reallocated army personnel returns us to a ‘civilian’ population of 8,892,536,
with the same difference of 19,556 compared to the original 1801
Enumeration Abstract. A close examination of the population tables in the first volume of the
1851 Population Tables allows us to construct plausible reasons for the difference
in totals. This is discussed in the following section.

Error correction and administrative boundary changes

One of the aims in the 1851 census was to construct a series of county-level
tables which showed the parish populations broken down by sex for this
census and the preceding five censuses. We can speculate that at the Census
Office the earlier volumes of the census were dusted down and brought out to
build these tables, and in this process some errors and omissions were found.
The correction of these errors altered the base line population of England and
Wales, increasing it by exactly 19,556. Most, but not all, of these errors are
documented in footnotes, and can be categorised by type (see Table 5). The first
type covers duplicate entries for which deductions to the total population were
made. For example, the parish of Willenhall, Warwickshire (total population
126) was recorded twice, once in Kirkby Division and once as part of the City
of Coventry (and spelled Winnall). Similarly, the population of Ishcoyd
Hamlet in Glamorgan was returned twice. These duplicate returns were most
likely caused by clerical error during the organisation of the statistics for
printing, and not double counting. The net reduction of the population of
England and Wales for duplicate entries is 3,451.

The second form of correction relates to arithmetical errors made in the 1801
report. County totals in the Enumeration Abstract were cast up from the many
different sub-divisions of the counties; if an error had been made in the
arithmetical in calculating a subtotal these were carried forward into county
totals. A dozen or so such errors were corrected, and account for a net increase
in the population of 765.

Third, missing returns were added, either on the basis of estimates or based on
the reported population in other census years. For example, Bradeston parish
in Norfolk made no return in 1801, so the census commissioners decided that

<table>
<thead>
<tr>
<th>Table 4</th>
<th>Original 1801 population figures with estimated reallocated military personnel.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Males</td>
</tr>
<tr>
<td>England</td>
<td>3,987,935</td>
</tr>
<tr>
<td>Wales</td>
<td>257,178</td>
</tr>
<tr>
<td>Total</td>
<td>4,245,113</td>
</tr>
</tbody>
</table>

Sources: Population figures: see Table 2; Army personnel: Census of Great Britain, 1851, Population tables, I. Number of the inhabitants in 1801, 1811, 1821, 1831, 1841 and 1851. Vol. I BPP 1852-53 LXXXV (1831), xxiii.
the population would be the same as in 1811. Some of the other missing returns were estimated based (presumably) on the trends of other local parishes. In Brackenfield Township, Derbyshire, a 7.33 per cent increase was estimated whereas in Wollaston, Shropshire, a 4.00 per cent increase was estimated. Examination of a number of such alterations does not lead to a clear overall understanding of the Census Office’s strategy to correct these figures. Additions for missing returns accounted for a total of 23,373 people.

Fourth, corrections were made in the totals of some places where the returns looked defective. For example, in the 1801 *Enumeration Abstract* the return for Stoke Poges, Buckinghamshire, gave a total population of 288. In the following census Stoke Poges was returned with a population of 838. The numbers of inhabited houses were reported as 138 and 157 respectively. This discrepancy was spotted during the construction of the tables in 1851, and the population of Stoke Poges in 1801 was altered to 741, based on the assumption ‘that the number of people to each house was the same as in 1811.’ Another example is Chittlehampton, Devon, the population of which was reported in the 1801 *Enumeration Abstract* as 3,003. In 1851 the census commissioners commented ‘A manifestly excessive return...was made for Chittlehampton...: the number of males returned [1,406] is assumed to have been the total population, and the proportion of each sex has been estimated’. A similar adjustment was made in Catherington, Hampshire, where the 1801 population was given in the 1801 *Enumeration Abstract* as 1,199 (comprised of 829 males and 370 females) but in the *Population Tables* for 1851 as 559 (comprised of 289 males and 270 females). The first correction seems to be simply a transposition error, but the second is probably a typographical error. However, the *Population Tables* for 1851 only notes that ‘an erroneous return was made for Catherington in this year [1801]; the numbers are now given by estimation’. There are other examples of typographical errors that were not corrected until 1851, for instance, in the parish of Sellack, Herefordshire, the number of women was originally reported as 343 but adjusted in the *Population Tables* for 1851 to 143 as it was ‘a supposed clerical error, or misprint’. These corrections for erroneous returns account for a net increase of 226 people.

Similar discrepancies have been observed which were not corrected, for example, in Ebony, Kent, where the population was reported as 351 in 1801, 139 in 1811 and 151 in 1821; in Gressingham, Norfolk, where the staggering decline in population from 1,224 in 1801 to 706 in 1811 was simply attributed to the large number of people in the workhouse; and in Betchingley, Surrey where the population in 1801 of 1,344 (528 males and 816 females) fell to 1,116 in 1811 (575 males and 541 females). It is possible that 816 was a misprint for 516, which would present a more plausible sex ratio. A similar instance was found in Wolstanton, Staffordshire, where the reported male population between 1801 and 1811 jumped from 2,035 to 3,470 (an increase of over 70 per cent) while the reported female population increased less steeply by roughly 33 per cent, from 2,644 to 3,523. The *Population Tables* for 1851 makes no mention of these or many other identified oddities, which might have deserved further attention.
The national net increase of 19,556 (between 8,892,536 and 8,872,980) can almost be entirely explained by the corrections noted above. A breakdown by type of alteration and sex is presented in Table 5.

Table 5 shows an additional type of alteration not yet discussed. This is described here under the heading ‘additional removal’. Two forms of ‘removal’ occurred in the recasting of the 1801 population totals, causing population to be ‘moved’ from one county’s totals to another. The first type was the recording of places in the wrong county in 1801. For example, the hamlets of Bitterscote, Bonehill, Comberford, Coton and Moor, Fazeley, Hopwas and Syerscote had been reported in the 1801 *Enumeration Abstract* in Warwickshire while they were all part of Staffordshire. A total of 1,370 people were ‘transferred’ from the county totals of Warwickshire to Staffordshire. In these cases the total net national population change should be zero, since each ‘transfer’ should be balanced between the counties in question. In the case above, the Warwickshire total was reduced by 1,370 and the Staffordshire total increased by the same figure. However, there is one case—again between Warwickshire and Staffordshire—where the 1851 *Population Tables* only comments on one side of this process. A total of 1,357 people were removed from the totals of Warwickshire, but there is no evidence that they have been added to the totals of Staffordshire; hence the anomaly listed in Table 5.

The second form of alteration to the published figures for the population of 1801 in the 1851 census report was caused not by error, but by new legislation. The Boundary Act of 2 & 3 Will. IV c.64 (1832) brought detached parts of counties into the electoral jurisdiction of the county by which it was surrounded. Under the Act 7 & 8 Vict. c.61 (1844) all detached parts of a county (in England and Wales) were annexed for all purposes to the county to which it had been annexed by the Boundary Act. As an extreme example, 10,977 people in parishes considered to be in Durham in 1801 were transferred to Northumberland. The Municipal Corporations Act (5 & 6 Will. IV, c.76) of 1835 abolished the Liberty of St Peter of York affecting the reported populations of both the East and West Ridings of Yorkshire. These county-level corrections have no influence on the total population of England and Wales in 1801 but they can cause discrepancies between the populations recorded for counties. So, the recorded population of Durham in the 1801 census is 10,977 greater

<table>
<thead>
<tr>
<th>Type of change</th>
<th>Males</th>
<th>Females</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Duplicate returns</td>
<td>-1,754</td>
<td>-1,697</td>
<td>-3,451</td>
</tr>
<tr>
<td>Arithmetical errors</td>
<td>288</td>
<td>477</td>
<td>765</td>
</tr>
<tr>
<td>Missing returns</td>
<td>11,489</td>
<td>11,884</td>
<td>23,373</td>
</tr>
<tr>
<td>Erroneous returns</td>
<td>222</td>
<td>4</td>
<td>226</td>
</tr>
<tr>
<td>Additional removal</td>
<td>-623</td>
<td>-734</td>
<td>-1,357</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>9,622</td>
<td>9,934</td>
<td>19,556</td>
</tr>
</tbody>
</table>
than the figure relating to 1801 published in the 1851 Population Tables. Similarly, Northumberland exhibits a decrease of 10,977 people. The population of virtually every county is affected by alterations of this nature.

This discussion leads to a clear conclusion. The rapid collection and tabulation of figures of population statistics in the early-nineteenth century led to a small number of errors in the published reports, some of which are only detectable with local knowledge and others by careful examination of the later reports. It is important to note that this article could equally have dealt with 1811, 1821 or 1831, as the 1851 Population Tables shows similar alterations to those which have been discussed here. All population figures reported in the census need to be used with care; using population counts in the census reports without a knowledge of their provenance and construction can be misleading. Errors and corrections are usually noted within footnotes, but not always in the appropriate section, and sometimes they can only be discovered by a process of calculation and elimination. For example a comparison of the county population figures for Westmorland in both the 1801 and 1851 reports shows a net reduction of 812 people, but there are no footnotes or comments in the Population Tables of 1851 on these alterations. By checking the individual ward level populations in the 1801 Enumeration Abstract elicits one large and two small discrepancies. First, an arithmetical error in Kendal Ward led to an additional 890 females and 10 males in the totals; second, a similar error led to a shortfall of 100 in the population of East Ward and third, the population of Appleby Gaol is given in both the total for East Ward and as a separate ‘entry’ in the county summary table, leading to a total of 10 men and 2 women being deducted from the total. These three errors were corrected in the 1851 census, but there was no reference to these changes, so patient recalculation from the 1801 Enumeration Abstract was necessary to discover the location of these errors.

Finally, it is worth remembering that the censuses which took place before self-enumeration was introduced in 1841 are prone to a number of collection-related errors. The most obvious problems occur where no enumeration takes place. The process of checking in the construction of the 1851 Population Tables identified at least 53 places where no returns had been made in 1801. These 53 places can be compared with the 264 across the whole of Great Britain which Rickman, in the Comparative account (of 1831), suggested had ‘defaulted’ in 1801.23 He estimated the combined population of these places at 73,000. Since Rickman did not list the 264 places, a very careful examination of the missing returns shown in the 1831 Comparative account would be necessary to identify them and discover which related to England and Wales and which to Scotland. This analysis is beyond the scope of this short article, but a partial examination of the English counties gives the impression that the population of most of these ‘missing’ places was recorded within other returns.24

For an undertaking of the size of the 1801 census, with limited resources, manual calculation and a complete lack of infrastructure these omissions should be considered minor. Similarly the 16 identified arithmetical errors, which probably occurred during the preparation of the Abstract, are, on a
national scale, relatively unimportant, but they may be more troublesome on a local scale. The historian of Kendal Ward in Westmorland might be surprised by what on the face of things looks like the relatively slow increase in population between 1801 and 1811 (caused by the inflation of the population in 1801 by 900 people in the totals), but should hopefully discover the discrepancy. Numerical information by its very nature looks accurate but population statistics can suffer from inaccuracies from a number of sources, including omission, double counting and arithmetical error, as discussed here. Population returns may also suffer from the effects of both under-enumeration and over-enumeration, which are harder to trace. Finally the reallocation of population, caused either by changes in administrative geography or by special cases like the military, can also pose interpretative problems.

The official population of England and Wales in 1801 as now reported by the Office of National Statistics is 8,892,536 (excluding the military at home and abroad, which is estimated at 263,635 giving a total of 9,156,171, as shown in Table 6). As discussed above, this figure does not represent a precise head count, rather a figure that has been manipulated by the addition of estimates and the removal of duplicate returns from the returns published in December 1801. And, while the ‘manipulation’ of national population returns is present and visible here, one should not forget that it is not impossible that these practices may have occurred at all stages of the population enumeration process, and remain discreetly hidden.

### Notes

1. Census of Great Britain, 1801, *Abstract, presented to the House of Commons, of the answers and returns made to the Population Act of 41st Geo. III &c. BPP 1801 VI (140), 4, 6. The reports examined in this article are all reproduced on the histpop website (http://www.histpop.org).
3. This is shown in Rickman’s *Observations on the results of the Population Act*, 3, a document usually bound with the *Enumeration Abstract* (see note 2), where the same figures are presented along with the population of Scotland.
5. Census of Great Britain, 1811, Comparative statement of the population of the several counties of Great Britain, in the years 1801 and 1811 BPP 1812 X (12), 1; Census of Great Britain, 1821, Comparative statement of the population of the several counties of Great Britain, in the years 1801; 1811 and 1821 BPP 1822 XCI (8), 3.


8. The italics added to the word belonging in the previous sentence is important because these figures do not apply to the numbers of army, navy and merchant service actually in these places at the time of the census. The number of army, navy and merchant service at home (i.e., actually present in England and Wales) in 1801 was ‘estimated’ at 131,818 (as reported in Office of Population Censuses and Surveys, Census 1881, Historical tables, 1801-1881, England and Wales (London, 1982), I) which is exactly 50 per cent of the total shown in Table 4 of this article.

9. It is worth making a further point regarding the recalculations of the military and prisoners in hulks. The starting point was the figure of 470,598 which is the reported total of both those under the heading: ‘Army, Navy, etc.’ and ‘Convicts on board the hulks’ in the 1801 Enumeration Report rather than just those ‘Army, Navy, etc.’ The assumption that the population board hulks were distributed across the British Isles in the same proportion as the military is clearly unwarranted, and may demand further examination.


12. Census of Great Britain, 1851, Population tables. I. Number of the inhabitants in 1801, 1811, 1821, 1831, 1841 and 1851. Vol. II BPP 1852-53 LXXXVI (1632), 67 [Division XII]. (Arabic page numbers are repeated across each Division in the two volumes of this report, so to distinguish between them I shall indicate the division.)


23. Census of Great Britain, 1831, Comparative account of the population of Great Britain in the years 1801, 1811, 1821 and 1831 BPP 1831 XVII (348), 5.

24. As an example that was picked up in 1851, Icomb in Gloucestershire did not report a population in 1801, while the 1831 Comparative Abstract (Census of Great Britain, 1831, Comparative account of the population of Great Britain in the years, 104) reports its population in 1811, 1821 and 1831. In 1851 it is shown ‘bracketed’ with the parish of Church Icomb which had in 1801 been reported as in Worcestershire. (Census of Great Britain, 1851, Population tables. I. Vol. I, 26. [Division VI]). It was assumed for the 1851 Population tables that in 1801 the hamlet of Icomb (Gloucecs) was reported with the parish of Church Icomb (Worcs). However, close examination suggests that other unremarked upon alterations were made: in neither the 1801 Enumeration Abstract (Census of Great Britain, 1801, Abstract of the answers and returns … Enumeration. Part I. England and Wales. Part II. Scotland, 132) and the 1831 Comparative account (Census of Great Britain, 1831, Comparative account of the population of Great Britain in the years, 109) is a figure is given for the 1801 population of the parish of Abbey-Dore, Hereford, which would suggest it was one of Rickman’s 264 places. However, the 1851 Population tables (Census of Great Britain, 1851, Population tables, I. Vol. I, 34. [Division VII]) reports a population for 1801 as though no alterations have been made. A final example, of a printer’s error, shows the breadth of the potential problems: for the parish of Morchard-Bishop, Devon the 1831 Comparative account (Census of Great Britain, 1831, Comparative account of the population of Great Britain in the years, 74) reports the 1801 population as missing. However, the printer has placed the 1801 population in the wrong column. Examination of the 1801 Enumeration Abstract (Census of Great Britain, 1801, Abstract of the answers and returns … Enumeration. Part I, 70) shows this to be the case.
25. Audrey Perkyns has shown that some of the Poor Law Commissioners reports suffer from sloppy proof-reading. See her note 'Lies, damned lies and statistics', *Local Population Studies Newsletter*, 37 (2006), 12.

26. For an examination of the levels of under-enumeration in the pre-1841 censuses see E.A. Wrigley and R.S. Schofield, *The population history of England, 1541–1871: a reconstruction* (London, 1981), 122–6. Their conclusion that 'very many errors exist in the 1801 census but there is no firm evidence to show that they produced a general tendency to depress the national total below its true level or to elevate it excessively' (p. 126) remains valid—the net increase of 19,556 people 'added' at the time of the 1851 census were the result of a series of individual error corrections and not a correction generally applied. Wrigley and Schofield also provide an interesting example of intentional over-enumeration in Farleigh Hungerford, Somerset see Wrigley and Schofield, *Population history*, 126 note 29. A later example of (unintentional) over-enumeration is discussed in M. Woollard, ‘‘Shooting the nets’: a note on the reliability of the 1881 census enumerators’ books’, *Local Population Studies*, 59 (1997), 54–7.

REVIEW OF RECENT PERIODICAL LITERATURE

Andrew Hinde and Jon Stobart

Unless otherwise stated, all articles reviewed in this issue were published in 2007.


This is an account of the New Survey of London Life and Labour, conducted between 1928 and 1935, and designed as a follow-up to Charles Booth’s great survey of the late nineteenth century. The New Survey found that poverty in the capital had declined by about one third since Booth’s survey, and that the working poor enjoyed increased amounts of leisure. This had engendered rising aspirations. The position of women within working-class society had improved, the increased female autonomy being related to opportunities to work outside the home in the new factories which had been built on the main roads radiating from the city centre (on the position of women in the mid twentieth century see also the paper by Brooke reviewed below). However, there was still a housing shortage in the city, and the council and local authorities maintained a paternalistic attitude towards the working people.


This paper compares the populations of Seahouses and Cullercoats in Northumberland during the nineteenth century, focusing on the demographic data obtainable from the census enumerators’ books. Barke explains that whereas the village of Cullercoats came into existence around 1600, Seahouses was largely an early nineteenth-century creation. By the mid nineteenth century Seahouses offered a wide variety of employment opportunities (though mainly in traditionally male occupations) whereas Cullercoats had a binary economy involving a long-established fishing community which tended to be closed to outsiders and a more recently established role as a holiday resort. The latter afforded employment for women as domestic servants, and this contributed to a relative abundance of females in Cullercoats compared with Seahouses. The article also considers the age structure of the two villages, and includes a descriptive analysis of the household structure.

C. Beaumont, ‘Moral dilemmas and women’s rights: the attitude of the Mothers’ Union and Catholic Women’s League to divorce, birth control and
This paper describes the tensions which emerged among organisations committed to promoting women's rights in England between the wars over the questions of divorce, birth control, and abortion. Women's organisations within the Church of England and the Roman Catholic Church had deep reservations about proposals to change the divorce laws and increase access to information about birth control, and were flatly opposed to legalising abortion. Despite their differences of opinion, however, Beaumont explains that these Christian women's organisations continued to work with secular organisations to promote the political and economic emancipation of women and in so doing 'made a significant contribution to the campaign for women's rights' (p. 463).


In this short piece the director of the Victoria County History outlines some current developments in the project, including the use of a recent lottery grant to fund a project called 'England's Past for Everyone' which aims to bring local history to a wider popular audience while still maintaining a high level of scholarship.


This paper explores the way in which poor law guardians treated payments from friendly societies when assessing the amount of poor relief to grant to applicants. The 'official policy', laid down by the central poor law authorities, was to deduct payments from friendly societies from the relief awarded. However, local Boards of Guardians realised that this effectively penalised prudence and self-reliance, and often ignored such payments in full or in part, so that applicants for poor relief who were eligible for benefits from friendly societies could receive these benefits in addition to their relief. The paper illustrates variations in local practice using examples from the coal industry.


Like the paper by Walker reviewed in Local Population Studies (LPS) 79 (2007), 127, and the paper by Gaskell reviewed below, this paper uses the detailed study of a single case to frame a discussion of wider issues. The question here is illegitimacy, and the specific difference between Scottish law, under which a pre-maritally born child could be subsequently legitimised by the marriage of his or her parents, and the law in England and Wales and elsewhere, by which a child born illegitimate was forever condemned to that status. The specific case centres on whether or not one William Shedden (born to unmarried parents who subsequently married a week before his father died) had the right to inherit his father’s estate. Shedden was born in the United States, which followed English common law, but to a Scottish father, and the estate in
question was in Scotland. The decision therefore turned on whether the case was to be considered under Scottish law or not. If Scottish law applied, William Shedden had been rendered legitimate by his father’s marriage, and hence was the rightful heir to the property. If not, then he was illegitimate and could not inherit. Bourne-Taylor describes the history of the case, which spanned several decades. For another study of the consequences of the difference between English and Scottish laws of illegitimacy, see the paper by Leneman reviewed in LPS 69 (2002), 88.


Many writers have discussed the *embourgeoisement* of the British working classes during the twentieth century. In this paper, Brooke argues that a key element of this process was a profound change in the sexuality of the working classes, in respect of which between the 1920s and the 1950s they became much more like the middle classes. Fundamental to this transition in working class sexuality was the gaining by working class women of control over their fertility. By liberating them from the fear of procreation, this allowed sex to become a recreation. Thus the fertility transition becomes a cause of social and cultural change as well as its consequence. There are some difficulties with Brooke’s thesis, notably that fertility—even working class fertility—was actually quite low by the 1920s and the 1930s and was to rise in the 1960s despite reliable methods of birth control. He also admits that sections of working-class society, such as the mining communities of Yorkshire, were not subject to *embourgeoisement*. Nevertheless, the idea that women gained control over their bodies as a gradual process associated with the fertility transition seems more plausible to this reviewer (AH) than the commonly held view that they had to wait until the advent of the contraceptive pill in the 1960s (see the paper by Cook reviewed below).

C.G. Brown, ‘Secularization, the growth of militancy and the spiritual revolution: religious change and gender power in Britain, 1901–2001’, Historical Research, 80, 394–418.

This paper is primarily sociological in its focus, but it makes several points relevant to historical demography. First, it challenges the simplistic secularisation narrative which sometimes surfaces (but more often is hidden) in some accounts of the causes of demographic change during the twentieth century. Second, it suggests that the demography of active Church membership has shifted since the 1960s. Until then, congregations were dominated by women, with such men as were in Church looking rather uncomfortable and out of place. The decline in Church attendance since 1960 has, however, been disproportionately among women, so that the sex ratio of Church membership is now much more equal. Finally, it looks at the relationship between religious and demographic changes, such as the rise in the proportion of births outside marriage in the last 40 years of the twentieth century.

This review article assesses the state of English rural history. Burchardt describes the advances made by the history of agriculture, but points out that in recent years, traditional agricultural history has become more narrowly economic in focus, and less concerned with rural society as a whole. On the other hand, the journal *Rural History*, which regularly features in this Review of Periodical Literature, has begun to deliver a wider social history of the countryside, in which non-agricultural activities are emphasised. The article describes the work of Alun Howkins, perhaps the most important figure in this new historiography. Later, Burchardt turns his attention to the history of the twentieth-century countryside and laments that fact that, even more than for the preceding centuries, the literature on rural history is largely coterminous with that on agricultural history. There are exceptions, such as Howkins’ *The death of rural England: a social history of the countryside since 1900* (London, 2003), but these need to be augmented by many more studies in a similar vein.


In this study of the female workforce at two farms, one in Gloucestershire and the other close to the Dorset-Devon border, Burnette shows that the female labourers were mainly aged between 35 and 55 years, and were commonly married. Some of them worked only at haymaking and harvest, whereas others worked for a substantial proportion of the year. Although several had children, the presence of young children (aged under five years) acted as a disincentive to work in the fields, as adequate child care was expensive, and leaving young children in the care of older siblings was regarded as risky.


The civil registration of births, marriages and deaths did not come into force in Scotland until 1855, fully 18 years after it was introduced in England. Cameron’s paper explores the reasons for this delay, which occurred despite eight failed attempts to carry a bill in parliament between 1829 and 1849. Various obstacles prevented a bill being passed. The Church of Scotland, which was in charge of the previous (very haphazard) system of parochial registration, feared the loss of income and thought that parish clerks could adequately perform the task required. The position of the Church was complicated by the Disruption of 1843 when the Free Church of Scotland split from the main body of the Church. But the most important difficulty was the perceived necessity to amend the Scottish marriage law which permitted marriage by ‘custom and repute’. The registration bills were all bundled together with bills proposing changes to the laws of marriage, and objections to these were more deeply held than were objections to registration. Cameron notes, however, that by the time these challenges were overcome and the bill safely passed, it marked a development from the system introduced in
England and Wales in 1837, for it made registration compulsory. It was to be more than another 18 years before this happened south of the border.


This article offers a complex analysis of three related data sets over a very long time period: nominal day wages, the marginal product of a day of farm labour, and the purchasing power of a day’s wage. The second of these is an implied rather than recorded figure, while the third is estimated from patterns of consumption amongst farm workers. There is some need, therefore, to be cautious in the conclusions that might be reached on the basis of such data—figures can be rather misleading in their precision. Nonetheless, the data suggest that labour productivity had reached a high level as early as the Middle Ages and support suggestions that the population of England at this date might have been as high as six million. For the next 350 years or so, there appear to have been few advances in either agricultural technology or the general efficiency of the economy—any growth that occurred was entirely in line with population growth. Only from the start of the seventeenth century did technological developments encourage real growth in agriculture and the English economy in general. This picture confirms conventional understandings of the long-term trend in agricultural and economic development in England, and underscores the argument that agricultural growth was the basis for growing prosperity and industrialisation from the mid seventeenth century.


This remarkable paper makes a point frequently overlooked by demographers in their quest for explanations of fertility variation: understanding reproduction means understanding sexuality. Cook begins by pointing out that ‘[i]n England, prior to the late nineteenth century, effective contraception was not available, alternative sexual practices were not acceptable substitutes for coitus, and children were a major economic cost’ (p. 915). This meant that, once the Malthusian preventive check started to wane during the eighteenth century for reasons associated with industrialisation and changing employment patterns, fertility inevitably rose. As the costs of high fertility became greater, however, the demand for birth control grew, but in the absence of reliable methods of contraception, this could only be achieved by sexual repression encouraging sexual continence. This sexual repression was a fundamental feature of England’s fertility transition and was only abandoned with the arrival of the contraceptive pill in the 1960s, which enabled women (in particular) to dissociate sexual intercourse from pregnancy. The paper breaks new ground by explaining the rise of the ‘culture of abstinence’ emphasised by Simon Szreter in his account of the English fertility transition (see S. Szreter, Fertility, class and gender in Britain 1860–1940 (Cambridge, 1996)). However, the timing of the abandonment of sexual repression has been questioned (see the paper by Brooke reviewed above).
As this article notes at its outset, the making of the working class is a well-worn historical narrative. Recent years have been marked by a layering of gender on to what is already a complex story, marked by local differences and temporal discontinuities. Custer locates his argument within this context, contending that women formed an important part of the crowds that rioted against mechanisation in the late eighteenth century and in favour of political reform in the early nineteenth century. Indeed, some contemporary commentators saw them as more troublesome than the men. Much of the article is taken up with tracing the narrative of riots as they unfolded in southern Lancashire, but the focus is increasingly on women and their position within the crowd. This requires attention to be paid to more fragmentary evidence than the usual reports and correspondence, and shows the value of a careful reading of what might easily be dismissed as marginalia.

In this article, DabhoiwaIa charts one of the periodic attempts in English history to curtail adultery, prostitution and other practices deemed immoral. In the last decade of the seventeenth century and the early part of the eighteenth century a range of societies emerged which aimed to police immorality and bring it to book through the courts. The paper reveals how these attempts foundered amid accusations of hypocrisy and a belief that the punishments meted out by the courts varied according to the social class of the perpetrators (being more severe for the poor than the better off). By 1800 the role of the courts in the fight against vice had been largely eliminated.

The fortunes and fate of Jews in medieval Europe form an enduring focus for scholarly attention. Here we have a close examination of the Jewish community in a small county town which draws on a variety of tax records to paint a predictable picture of a small but prosperous set of Jewish families engaged in money lending and other business activities in the heart of the town. Much is made of their external links, to London and a range of provincial towns, including Norwich and Gloucester, which suggest that these families were able to draw upon wider social networks, perhaps linked to their religion. Perhaps the most interesting part of the article comes when Dace is discussing the decline of Warwick’s Jewish community in the middle part of the thirteenth century. Initially, the decline was in wealth, but later it was in numbers—a result, Dace argues, of government policies and harassment rather than local animosity.
The first of these articles continues Deacon’s long-standing interest in the regional identity of Cornwall. In it, he establishes the credentials for Cornwall being regarded as culturally distinct from its eastern neighbour, but then questions whether it should be defined in terms of its territory (as a county) or its people (a nation). He goes on to examine the constituent parts of Cornish identity, including an ancient past of Celtic myths and legends as well as a more recent history of industrial development. However, central to this identity is a so-called ‘ethno-history’ which marks out Cornwall as a place inhabited by Britons rather than Anglo-Saxons. While it is often argued that institutions are crucial in carrying and marking local and regional identities, Deacon argues that in the Cornish case, local government, schools, courts and other institutions were essentially English and therefore destructive of Cornish identity. This shows that local territorial identities can never escape the influence of external factors and reminds us of the need to balance awareness of local difference with an appreciation of national processes and institutions.

The second article applies the method suggested by Andrew Hinde, ‘The use of nineteenth-century data to investigate local migration’, *LPS* 73 (2004), 8–28, to analyse migration patterns in Cornwall between 1851 and 1891. Deacon divides Cornwall into two zones, the mining zone in the west and the agricultural east. He finds that rates of net out-migration were typical of other rural areas in England at the time, so that ‘it is not immediately obvious that Cornwall was one of the major emigration regions of the British Isles’ (p. 44). Migration patterns varied between males and females, but differences between the two zones were greater for women than for men, probably because of differential employment opportunities. In the west of Cornwall, the presence of surface work in the mining operations and the existence of more urban areas led to women between the ages of 15 and 24 years being less likely to leave than their counterparts in the mainly agricultural east.


This article examines developments in local history in Kent since the mid nineteenth century, relating them to national debates about the theory and practice of the discipline, and showing how they reflected trends and fashions in the subject as a whole. Readers of *Local Population Studies* might find the most useful feature of the paper to be the authors’ summary of how local history has developed as a discipline during the last 150 years, which is concise but illuminating.


This article appears as part of a special supplement of *Past and Present* which comprises a series of essays inspired by the work of Rodney Hilton. In it, the author argues that the economic achievements of the secular and religious elite in the thirteenth century were not as dramatic as has previously been supposed. While he does not take issue with the range of advances made in the
commercialisation and development of agriculture, Dyer highlights some of the weaknesses of the seigneurial regime, including an innate conservatism amongst the wealthiest magnates which militated against profit maximisation through innovative lease or tenancy arrangements. Nor were the elite always very effective in exercising control of the peasantry through rules and regulations. What emerges is a highly differentiated picture where much depended upon local circumstances, and the character and abilities of the Lord.


The records of coroners are an important source of information about unusual or violent deaths. However, the practice of coroners varied regionally, and such variations may have important implications for comparisons of the mortality experience of different places. This paper considers the impact of the cost of holding inquests on the number of inquests held, and concludes that any ‘local studies of violent deaths [need] ...an understanding of the nature and impact of restrictions imposed on coroners’ (p. 59). This is particularly the case during the 1840s and 1850s, when the ability of local magistrates to place pressure on coroners reached a peak. After 1860 a Coroners Act imposed greater uniformity and gave coroners greater autonomy.


French uses the census enumerators’ books for the censuses from 1851 through to 1891 to chart the rising population of Surbiton. In 1851 the suburb had 2,814 inhabitants, but by 1891 there were 10,740. More than 60 per cent of these were females, a sex imbalance which was mainly due to the large number of domestic servants employed by the well-to-do residents. Indeed, by 1891 two out of every five Surbiton households employed at least one servant, and the employment of several servants was not by any means unusual. However, the fact that Surbiton was a middle-class suburb does not mean that the majority of households belonged to the middle classes. Using the Booth-Armstrong classification scheme, French finds that Classes I and II accounted for just 29 per cent of households in 1851, rising to 37 per cent in 1891. The paper concludes with a plea for more studies of suburban populations during the period of rapid growth following the construction of railway lines radiating from major cities.


Canbury was a working-class area of Kingston which grew rapidly after 1871. It was characterised by densely-packed housing of variable quality, ranging from the very poor to the ‘respectable’. A feature of the area was a large number of persons employed in transport (as carters or carriers) who kept animals in close proximity to humans. By comparing proportions of infant deaths and proportions of the population, French and Warren show that infant
mortality in Canbury was higher than in Kingston as a whole. They then use a good range of sources, including the reports of the Medical Officer of Health, the census enumerators’ books and cemetery records to analyse the infant mortality patterns of the locality in more detail. The results confirm at the local level a story which has become familiar at the national level: that infant mortality was kept high by the abnormal prevalence of diarrhoeal diseases during the 1890s. This was exacerbated in the case of Canbury by the constant presence of flies attracted by horse manure and similar excretions of the animals kept in the area. For reviews of other papers on infant mortality in Kingston upon Thames by French and his colleagues see LPS 75 (2005), 94–5; and LPS 73 (2004), 84.


This article is intriguing both in terms of what it tells us about early-modern attitudes and in the methods adopted to unfold the narrative and analysis. It focuses on the trial of a ‘cunning woman’ (or witch) in Salisbury in the year 1653. Yet, in tracing through the testimonies offered, it links back to an earlier event in the city: the association of the Duke of Buckingham with a sorcerer named Dr John Lambe. By linking these two events, Gaskell is able to reveal the importance of individual and public memory in shaping events and social attitudes. Moreover, he ties these into broader popular traditions and into the ways in which earlier events could be mobilised by political or religious activists. The paper reveals the complexity of witch trials, which ranged across time and space in their deliberations and implications. It also highlights the sophistication of seventeenth-century society, where identity and consciousness were highly nuanced constructs.


The idea of matrimonial litigation might seem peculiarly modern, but it was in fact part of the wide-ranging influence exercised by church courts during the Middle Ages. This article examines the rich records of the court at York during the fourteenth and fifteenth centuries. Goldberg looks for evidence of how gender affected both the operation and decision of the courts and the ways which people negotiated their way through them. The conclusion reached is that the courts appear to have been remarkably even handed in their dealings with men and women, although the author warns against seeing this as a reflection of any notion of gender equality. Quite apart from these interesting findings and the wealth of evidence contained in the article, there is much of interest here in the methodology adopted. Court records are examined not only for what they tell us about the law, but also for what they show about the ways in which people interacted with each other and with the instruments of government. This article thus links closely to the growing corpus of literature which focuses on the use and experience of nineteenth-century institutions such as the law courts and the poor law.

Although it is well known that a nuclear family system dominated in England during the seventeenth century, it is clear that such a system could be placed under strain by demographic crises, such as those caused by epidemic disease or famine. This paper examines a series of crises in the Lancashire village of Broughton in the late 1660s and early 1670s, and uses the Compton Census of 1676 to consider the household structure of the village shortly after the crises. Households in 1676 were rather smaller than might be expected on the basis of previous studies at the national level, and this might be attributed either to the generally increased mortality levels of the previous years, or to the fact that marriages had increased following the crises so that in 1676 there was a relatively high proportion of households containing young couples who had only started childbearing recently. The evidence suggests that the nuclear family system was able to withstand mortality crises, and if some ‘reconfigurations’ took place in the immediate aftermath of the period of elevated mortality, they did not affect ‘anything other than a very small number of cases’ (p. 62).


In the late eighteenth and early nineteenth centuries, the town of Devizes was one of the most prosperous of its size in southern England. This paper describes the various local institutions which bound the community together, including both established and nonconformist churches, the poor relief system, and the numerous charitable organisations and funds aimed at supporting the needy and bettering the condition of the poor. As Haycock emphasises, as well as being philanthropic, ‘[c]harity was … seen both as an antidote to disorder and crime and as a means of social control’. Her paper sets its development and implementation in the context both of local and national economic events (such as the difficult years between 1796 and 1803), and philosophical shifts, notably the increasing prevalence of the view that charity was about helping the poor to help themselves out of dependency. This is a detailed and impressive study of the social capital of an English market town.


In this article, Healey challenges the image of the Lake District amongst contemporary social commentators as a place where a traditional agricultural society remained stable in its composition and structure throughout the early-modern period, only changing as it became opened up to the ‘modern’ world from around 1800. Focusing on Grasmere and neighbouring Great Langdale, he argues that marked social stability in the sixteenth and seventeenth centuries gave way to marked change in the eighteenth century. Forms of landholding were transformed and, alongside a core of well-established families,
there was an increasingly rapid turnover of farmers. With this came growing social differentiation and stratification as small customary tenant farmers were squeezed out of their holdings to be replaced by larger farmers and agricultural labourers. This story is familiar from other parts of the country, but sits in marked contrast with an image of the Lake District as a social as well as environmental ideal.


The early cotton and other textile mills in much of the north of England relied for a large proportion on their workforce on parish apprentices. These were poor children, often from distant parishes (many came from London), who were taken on by the parishes in which the mills were built and apprenticed to the mill owners. Employers preferred parish apprentices to ‘free’ labour, as they were more reliable, easily replaceable, and did not come encumbered with awkward parents. However, most employers did not exploit parish apprentices unduly, and many apprentices were promoted to positions of responsibility and continued working in the mills as adults. The paper examines the experiences of these apprentices by using a range of examples, mainly from the West Riding of Yorkshire.


This paper describes the cholera epidemic of 1848–1849 in the town of Berwick-upon-Tweed and its surrounding area, stressing its impact upon the management of public health and the formulation of health policy in the area. Hunter examines the tensions within the town council, the role of the local press and the inquiry into the sanitary condition of Berwick that followed the epidemic. He shows how the epidemic led to calls for action to improve the environmental conditions in the worst areas of the town—in other words how cholera acted as a ‘trigger for reform’ (p. 115). Reform, however, was slow in coming, partly because people did not realise the importance of a clean water supply.

A. Janssens, ‘Were women present at the demographic transition? A question revisited’, *History of the Family*, 12, 43–59

Whilst such a question may seem redundant, this polemical article argues that there is much to be gained by incorporating ideas of gender into analyses of the fertility decline often seen as critical in the transformation of demographic regimes during western industrialisation. It can help to produce understandings of changes in fertility that are more nuanced and more sensitive to local economic, social or cultural circumstances. In particular, the paper highlights the potentially different views of reproduction taken by men and women: differences which are masked in traditional (macro-scale) analyses of demographic change. More generally, it argues for the restoration of agency to both men and women, recognising them as active agents in processes of
historical change. Rather than present new data, then, this paper offers us a challenging new approach to historical demography.


In 1991 the population census of England and Wales included a question on ethnic origin. Although the original returns for such a recent census are not available to researchers, data for small areas have been published. This article makes use of the latter to analyse the ethnic representativeness of health service patients in part of north-west London by matching them against health service records. Jones finds that some ethnic minorities are under-represented among referrals for certain types of treatment, whereas others are over-represented. The paper provides a valuable example of the insights that can be gained by using multi-source matching even in the absence of the nominative information commonly used by local historians.


Readers of LPS will be familiar with the long-running debate about the representativeness of family reconstitution data, and in particular about the problem of the ‘reconstitutable minority’, which, it is argued, consists predominantly of people who did not migrate. It has been pointed out that failure to allow adequately for migration can bias estimates of important demographic quantities, notably the mean age at marriage, and various measures of mortality. Several methods of correcting for the potential bias have been proposed. In this paper, Jonker and van der Vaart summarise these, and propose another method based on a statistical model known as the ‘passive registration model’. Using computer simulation, they then compare the accuracy of their method in correctly estimating mortality in a population from which some data have been artificially removed with that of earlier methods. The results suggest that Jonker and van der Vaart’s method and the various methods proposed in the past all perform fairly well, but the approach suggested by Ruggles (‘Migration, marriage and mortality: correcting sources of bias in English family reconstitutions’, Population Studies, 46 (1992), 507–22) is the best.


R. Esser, “They obey all magistrates and all good lawes ... and we thinke our citty happie to enjoye them”: migrants and urban stability in early modern English towns, Urban History, 34, 64–75.

S. Poole, “Bringing great shame upon this city”: sodomy, the courts and the civic idiom in eighteenth-century Bristol, Urban History, 34, 114–26.

These three articles form part of a special issue of Urban History entitled ‘Urban governance and petty conflict in early-modern Europe’—the other papers in
the volume focusing on towns in Germany, Austria, Switzerland and France. The articles in this special issue tell us much about the ways in urban communities in the early-modern period operated: how power was both relational and contingent, and how local custom and practice remained a strong influence on people’s lives.

Lee’s article examines oaths of office as evidence of the theoretical and practical duties of office-holders in early-modern Bristol. He sees the process of oath-taking as an important rite of passage through which the individual gained admittance to the civic and urban community. Oaths combined sacred and secular elements and thus tied duty to the community with duty to God and thereby helped to bolster social and political stability in the town. By contrast, refusal to take an oath marked the individual as unfit for membership of the particular group and, by implication, the civic community more generally. Oath-breaking was therefore viewed in a very negative light, often entailing curtailment of political and economic freedom.

The same theme of urban stability runs through Esser’s article, but here the focus is upon the processes and strategies adopted to control crime and reduce conflict with refugee and other immigrant communities. She argues that urban magistrates—who were formally responsible for implementing the law at the local level—frequently operated in tandem with the leaders of immigrant groups. Such ‘systems of devolved crime control’ (p. 66) were not only effective in reducing conflict and dealing with breaches of the law when they did arise, but were also an important in two other respects. First, they formed part of a wider process whereby strangers were often able to present themselves as valuable and useful additions to urban society. Second, they allowed the immigrant community to maintain its own particular networks—and thus, in some ways, benefit from enhanced social capital—while becoming integrated within their host community.

Poole’s article considers a very different threat to urban stability: the problem of sodomy. He focuses on Bristol which, in the 1730s, acquired a reputation as a place where sodomy was rife and (more worrying to some commentators at the time) where the magistracy appeared unwilling or unable to address the problem through the courts. The discussion is set within the broader context of Bristol’s divided politics and the often violent intervention of the crowd in matters of local interest. One aspect of this was the attempt to portray sodomites as morally degenerate and, importantly, as outsiders rather than Bristol men. Poole examines the veracity of such claims, and the unfortunate reputation that Bristol had gained, through detailed analysis of the court records. He concludes that the Bristol courts appear to have been unusually active in their prosecution of sodomites, especially in the 1730s. However, the number of convictions was unusually low in this decade, causing much public outcry, violence and a baying for blood. Poole thus weaves a fascinating narrative about the inter-connectedness of elite and mob power, and of local and national influence.

This paper is a sequel to Lyle’s paper on the treatment of illegitimate children reviewed in *LPS 77* (2006), 92. Like the earlier paper, this one is based on the responses to the 1832–1833 Rural Queries. Here Lyle turns her attention to agricultural cash wages, and presents an analysis of the responses of individual parishes to the relevant question. The results reveal two zones of high wages, one (perhaps surprisingly in the light of what we know of the geography of pauperism at the time) in the south-east of England and the other in the East Midlands and Lincolnshire. In Wales and the south west wages were much lower. Lyle then pursues the topic of her earlier paper and shows that the allowances given to mothers of illegitimate children in different parts of the country were directly related to the local level of cash wages.


Urban historians have long had an interest in planned settlements, be they utopian visions, model villages or pragmatic solutions to the provision of housing for an industrial workforce. In all these places, a strong link is made between the physical structure of the settlement and the demography and socio-cultural experiences of its inhabitants. In this article, attention focuses on the planned fishing villages established in the Scottish Highlands by the British Fisheries Society (BFS) in the late eighteenth and early nineteenth centuries. Whilst the chief focus of activity for the BFS was the construction of the harbour, storehouse and inns (all seen as vital elements of the fisheries trade in these ab initio settlements), it also established control over the nature of domestic architecture through building regulations. While small in number, Maudlin argues that these planned settlements exerted considerable influence over subsequent urban development in the Highlands, shaping the physical appearance and, as a consequence, the socio-cultural character of many settlements.


Although much has been written about the Victorian census enumerators, very little is known about the registrars and superintendent registrars who oversaw the taking of the early Victorian censuses. In this paper, Mills, Wheeler and Woollard describe the lives and economic activities of two men who became registrar and deputy registrar respectively in the Lincoln South sub-district soon after the introduction of civil registration in 1837. They then set the Lincoln experience in the national context, looking at the occupational breakdown of registrars appointed before September 1838. About 47 per cent of these had previously been officers of a Poor Law Union, and of the remainder, just under one in ten were in the medical profession, 22 per cent were in other professions, and 37 per cent were ‘in trade’ (p. 18).

Readers interested in Jon Stobart’s article on Cheshire butchers in *LPS* 79 (2007), 23–37 might also wish to consult this article, which examines the economic role of fairs in the counties of Cheshire, Derbyshire, Leicestershire, Nottinghamshire, Shropshire and Staffordshire, focusing especially on the period 1750–1830. The ways in which people bought and sold goods—especially food—are important to our understanding of local communities and the broader social and economic development of the country, and in this article Mitchell examines a form of trading that has been surprisingly neglected in the literature. Drawing on a wide range of sources, he argues that the fairs of the north Midlands were not merely the places of popular entertainment that they are often assumed to have become during the eighteenth century. Rather, they were important places of retail and business transactions, and formed significant events in the calendars of even quite large towns, such as Chester, where they provided a real fillip for local shopkeepers. It was the early nineteenth century that witnessed a more profound change, as many fairs declined whilst others were reoriented towards agricultural marketing, breaking their link with the ordinary consumer.


The East Riding of Yorkshire occupies an anomalous position in context of the late nineteenth-century agrarian economy. Although it was predominantly an arable farming region, the tradition of farm servants ‘living in’ persisted until the early twentieth century, and may even have become stronger as the nineteenth century progressed. In this paper Moses begins by exploring the reasons for the continued reliance on farm servants in the region. He suggests that the sparse population of the area, combined with competition for labour from industrial areas to the north and west, presented farmers with an acute shortage of labour, which they met by tying labourers to farms on annual contracts. However, the growing social distance between farmers and their workers did mean that the living quarters of servants were gradually moved out of farmhouses in favour of purpose-built living accommodation presided over by foremen. These were much disapproved of by the resurgent Anglican Church in the mid-nineteenth century, as they were seen as encouraging immorality and vice (in the same way that agricultural gangs were).


This paper uses econometric methods to analyse the annual data on fertility, mortality and real wages described in E.A. Wrigley and R.S. Schofield’s *The population history of England 1541–1871: a reconstruction* (London, 1981). Nicolini shows that the Malthusian positive check disappeared in the mid-seventeenth century, in that after that date increases in real wages no longer led to
decreases in mortality. England, therefore, broke free of the Malthusian ‘trap’ well before the industrial revolution, a point also made by Smith in his paper reviewed later in this section. The Malthusian preventive check lasted longer, but had largely vanished by the mid eighteenth century. Nicolini dates the disappearance of the preventive check to the 1740s, which accords exactly with the conclusions of Andrew Hinde in *England’s population: a history since the Domesday Survey* (London, 2003), 190.


This article discusses the reasons for the changing employment structure of what is now the metropolitan borough of Calderdale, the boundaries of which approximate to those of the ancient parish of Halifax. The authors use figures constructed from the population censuses and Ministry of Labour censuses, and adapted so that they may be compared across the period. Ensuring comparability of statistics relating to the occupational structure of a defined area across several decades is not a simple matter, and the article includes a useful description of the challenges inherent in such an exercise. Noble and Burkitt explain the patterns and trends they reveal in terms of changes in economic circumstances and social trends, both regional and national.


The Revd Thomas George Dixon inherited the moribund estate of Holton-le-Moor in Lincolnshire in 1906, having previously cured souls in Essex. Holton-le-Moor was a good example of a small country estate centred on the closed village of the same name. Olney describes how Dixon set about improving the social and economic life of the population by the construction of houses and a shop and the building of a village hall in which local associations could meet. For the first 12 or so years of his tenure of the estate he managed to make steady progress in his efforts to strengthen community cohesion, but after that the post-war depression adversely affected the economic fortunes of the estate and progress slowed. The paper employs an unusually rich archive to paint a detailed and informative picture of the life of an estate village in the early twentieth century.


This paper uses many of the sources described in N. Goose and A. Hinde, ‘Estimating local population sizes at fixed points in time: part II – specific sources’, *Local Population Studies, 78* (2007), 74–88, including Hearth Tax returns and the 1563 Bishops’ Census, to estimate the populations of Welsh towns during the early modern period. In addition, the paper makes use of a source specific to Wales and parts of Shropshire, the *Notitiae* collected by the Bishop of St Asaph from 1681 to 1686. The challenges posed by using all these sources are laid out in detail, and the Appendix contains a list of all towns in Wales with
new estimates of their populations at various points during the sixteenth and seventeenth centuries.


Local history at its best seeks to explore broad issues and questions in the context of particular times and places. Such is the ambition of this article, which attempts to address some key questions about agricultural change by focusing on the activities and experiences of a single family. Indeed, it is possible to see this as a piece of family history, deployed within wider historical narratives. Ram draws on manorial records, parish and manorial surveys, probate records and farm accounts to examine how several generations of his ancestors coped with the growing commercialisation of farming in the parish of Great Waltham. Much of the article is taken up with a description of the changing land-holding and tenancy practices, but there is also some intriguing material on the family’s farming activity and engagement in village life. The usual figures on farm size and rents are thus repopulated with real people, which helps to bring the discussion to life.


This is a major new study of London’s mortality history using a range of sources, including the well-known Bills of Mortality, family reconstitution data for several parishes, and other genealogical data. The conclusions are, first, that infant and childhood mortality more than doubled between the mid sixteenth century and the mid eighteenth century, by which time two out of every three babies born in London failed to reach their fifth birthday. After 1750, though, mortality at ages below two years fell sharply so that by 1825–1850 only about 30 per cent of children born died before their fifth birthday. Adult mortality also fell after 1750, at least the mortality of adult men as measured by the proportion of girls marrying at ages under 21 years whose fathers were still alive at the time of their marriages, and the proportion of apprentices whose fathers were alive to witness their indenture. A striking finding is that there was no evidence of a social class gradient in mortality before the nineteenth century, a fact which Razzell and Spence attribute to the dominance of infectious diseases in the high mortality period of the eighteenth century, which diseases were no respecters of rank or status. A corollary of the findings is that high mortality probably did not inhibit the growth of London during the late sixteenth and early seventeenth centuries, but that during the eighteenth century London was certainly a demographic ‘sink’, the population of which could only have been maintained by in-migration.


Following an outbreak of typhoid at Uppingham School in 1875, a fierce argument developed between those who wanted sanitary reform immediately,
and those who opposed it. The opponents included many members of the Rural Sanitary Authority (RSA), who were concerned about the expense, and seem to have been overwhelmed by the scale of the work involved (they were, after all, amateurs and volunteers). Eventually the exasperated headmaster of the school moved the entire staff and student body to Wales. This crippled the economy of the town and led to a ratepayers ‘revolt’ which forced the hands of the RSA members. Richardson’s account of this local struggle for sanitary reform is sympathetic to both sides, recognising that all those involved were working under pressure.


This is a companion paper to that by Rimmington reviewed in LPS 79 (2007), 122. This paper deals with the development of congregationalism in the town of Leicester during the period of rapid urban growth at the end of the nineteenth century and beginning of the twentieth, which saw the population of the town more than double between 1871 and 1911. Rimmington explains how the congregational churches were concerned that the rate of founding of new churches was failing to keep pace with the town’s growth, especially among the working class population. He discusses the attempts at urban mission made in response to these concerns and assesses their success. Overall, the membership of congregational churches did increase (though not at the same rate as the town’s population) but attempts to appeal to the working classes did not succeed in the long run.

K. Schürer, ‘Creating a nationally representative individual and household sample for Great Britain, 1851 to 1901—the Victorian panel study (VPS)’, Historical Social Research, 32, 211–331.

This long article (running to well over 100 pages) is a comprehensive description of the proposal to construct a panel data set by taking a sample of persons and households from the 1851 census enumerators’ books (CEBs) and linking the relevant census entries to those from the next five censuses, civil registers and other sources. The result would be a longitudinal data set on the scale of the Office for National Statistics’s Longitudinal Study of a one per cent sample of the population of England and Wales since 1971. Schürer describes the rationale underlying the proposal to undertake this massive record linkage exercise. He then discusses various options for drawing the initial sample, including the obvious one of using the two per cent sample of the 1851 CEBs drawn up by Michael Anderson and his colleagues nearly 30 years ago and available from the UK Data Archive in Essex. One key issue is how to maintain the size of the panel in the light of attrition through death, emigration and failure to link records. The article also includes a detailed discussion of potential record linkage techniques and of the stages involved in the construction of the database. It will be of interest to anyone who is thinking of building up any kind of database using nineteenth-century census data.
L. Schwarz, ‘Custom, wages and workload in England during industrialization’, *Past and Present*, 197, 144–75.

The inter-connections between custom, wages and work are of perennial interest to economic and social historians. In this article, Schwarz revisits some of the ideas originally discussed by Eric Hobsbawm in the 1960s, but focuses on the maxim ‘time is money’ in an attempt to unpick the relationship between time and wages. He begins by considering the nature of piece-rate payments during the industrial revolution. These are compared with time rates to assess their relative impact on the relationship between effort and reward, the broad conclusion being that practices varied between industries and across time. This was in part due to the differential impact of new industrial practices, but it was also linked to the survival of a traditional consensus over work and pay. The relationship between work and wages was further complicated by the long survival of practices such as living-in and apprenticeship, and economic benefits such as access to the commons, perquisites and makeshifts. Schwarz concludes his analysis with the suggestion that ‘traditional’ entitlements existed alongside a ‘modern’ wage-economy well into the nineteenth century. Local historians can add much to this picture by exploring how these two inter-related within particular places and particular times.


In the extensive literature on witchcraft, little has been written on the phenomenon in the Isle of Man—a place which is often seen as being distinctive in its cultural and social character. This article examines popular and official attitudes to witchcraft on the island, based mainly on accounts in the ecclesiastical courts. These reveal a rich popular culture relating to witchcraft, but also show how such beliefs were closely linked to other aspects of popular culture, specifically what Sharpe terms ‘fairy beliefs’ and belief in the efficacy of the curse. The pervasive nature of these attitudes is linked to a tolerant approach on the part of Manx authorities, who appear to have treated witchcraft as an unfortunate sign of ignorance rather than as a morally and spiritually dangerous set of beliefs and practices. More generally, this article highlights the way in which not just popular culture, but also official attitudes and ecclesiastical-legal practices, could vary considerably across the country, producing unique socio-cultural contexts for people’s everyday lives.


This paper considers the ‘differences between political and demographic historians in their respective approaches to time and period’ (p. 203). Smith discusses the idea of the ‘organic economy’, which has been used to suggest that in pre-industrial times ‘patterns of behaviour were fundamentally unchanging over long sweeps of time and space’ (p. 203). By comparing the demographic history of France and England during the sixteenth, seventeenth and eighteenth centuries, he shows that the concept of demographic and
economic stasis might be a useful one within which to understand the French experience, but that in the English case the rapid growth of London, and the existence of substantial emigration, were sufficient to undermine its utility, at least after the sixteenth century.


This study of butchers in Cheshire between 1660 and 1820 reveals that butchers were fully integrated within rural society. Many of them owned or occupied land, and doubled as farmers. Much of their business was conducted within the countryside, selling meat to rural people, rather than simply supplying it to urban markets. The number and distribution of butchers changed during the period roughly in parallel with general population changes. Unlike some other trades, which were more concerned with bringing urban products to the countryside, butchers were truly rural, dealing in ‘essentially rural products’ and having a ‘rootedness in village society’ (p. 35).


This extremely useful paper reviews the evolution of the theory of the fertility transition from its heady early days to its present predicament. It begins by laying out what the author describes as the ‘Princeton paradigm’ (p. 14), although it drew from work carried out beyond the confines of the Office of Population Research at Princeton University. According to the original version, the fertility transition occurred because modernisation removed the social and institutional supports to high fertility and couples therefore adopted ‘family limitation’ or parity-dependent birth control. Before the transition, fertility was essentially ‘natural’, or biologically determined and, as such, not very interesting from a behavioural perspective. Szoltysek then describes the empirical work carried out over the last 30 or so years which has undermined this ‘paradigm’, showing that ‘natural’ fertility may not have been so natural at all, that birth spacing rather than parity-dependent ‘stopping behaviour’ was an important element in the transition, and that convincing explanations of the fertility transition are context-dependent. He concludes by surveying possible theoretical developments which might be able to replace the ‘Princeton paradigm’ by a similarly grand general theory of fertility decline, but expresses doubts that this will be achieved in the near future.


Women often remain hidden from our view of history. In part this reflects the paucity of sources that can truly reflect their activities and experiences, but it also reflects a reluctance to see them as active agents of historical change. In this article, Thornton attempts to uncover something of the social and economic role of women in rural Northamptonshire during the middle ages. He draws primarily upon manorial records to examine a wide range of topics.
In terms of landholding, he shows that women could and did own land (albeit in small numbers), and that they were active in buying and selling land. Within the home, women were responsible for domestic management, but also for more commercially-oriented activities such as ale-selling; they even appear in some numbers as day workers on large estates. The active role played by women is clear from their appearance as litigants at the manorial courts, most often as plaintiffs. Yet perhaps the most telling part of the article comes when exploring the social status of women, where we are reminded that, even within rural communities, women were not all of equal standing, nor were their experiences homogenous. This serves as a warning against lumping individuals together into simplistic and normalising categories: people had their own identities and experiences, and should not simply be seen as conforming to meta-structures such as gender, class or ethnicity.


Although it is more of an economic history than a demographic history, this account of the foundation of the port of Silloth west of Carlisle and its defiant struggle for viability may interest some readers of *LPS*. The port was originally built to replace the silt-ridden Port Carlisle further up the Solway Firth, but it faced stiff competition for the coal trade from the established docks at Maryport. It eventually found salvation in the form of grain, when Jonathan Carr, the biscuit manufacturer, built a large mill in the town. Good local economic histories such as this provide essential contextual material for understanding local demographic change.

D. Uttley, ‘The decline of the Cumbrian yeoman: fact or fiction?’ *Transactions of the Cumberland and Westmorland Antiquarian and Archaeological Society*, 7, 121–33.

The ‘Cumbrian yeoman’ in the title of this paper is ‘a small owner-occupier farming fewer than 100 acres’ (p. 121). Such farmers were numerous in the eighteenth century and were an important influence upon the county’s agriculture, as great estates were few. However, many historians of the county believe that they were virtually wiped out by the agricultural depression following the Napoleonic Wars. Uttley sets out to ascertain whether the evidence backs up this view, using Land Tax records from 1780 and 1829, the tithe apportionment of the period around 1840 and Income Tax records for 1913. His results suggest that between 1813 and 1829 about one in three yeomen disappeared, and that the class declined further during the rest of the nineteenth century. One surprise is that the severe distress felt by the yeoman class in the aftermath of the Napoleonic Wars did not produce more comment in the local press or emergency measures to alleviate the families who were forced from the land.

The authors of this paper use a ‘household production approach’ to analyse the relationship between real incomes and mortality in the English past. The household production approach supposes that households ‘produce’ health (as measured by the expectation of life at birth) from food and non-food inputs, given a budget constraint and a certain level of technology. The results of the analysis show that, in contrast to earlier studies using different approaches, there was a clear relationship between food and non-food inputs and mortality. There were also substantial shifts over time in the technological environment within which household production took place. A limitation of the study is that it focuses exclusively on the contemporaneous relationship between inputs and the expectation of life, whereas there are reasons to suppose that inputs at any given time might have effects on mortality at some future time. The authors recognise this and propose to analyse these ‘lagged’ effects in future research.


This article offers a detailed analysis of a series of tax records from the mid-sixteenth to the early nineteenth century, examining in particular the appearance of women within these records. The data reveal that women were consistently under-represented in the tax records: a situation which remained broadly steady over the centuries and regardless of the basis of tax being levied (be it on goods, houses occupied or land owned). Moreover, when they do appear, they are revealed as disproportionately poor, relative to men. In the Hearth Tax, for example, there was double the proportion of female than of male householders in those exempt from paying the tax. The article thus presents a clear picture of women householders struggling to get by on very meagre resources—a story consistent with our perceptions of poor widows, but confirmed here in the pounds, shillings and pence that they paid in taxes.

N. Whyte, ‘Landscape, memory and custom: parish identities, c.1550–1700’, *Social History*, 32, 166–86.

During the early-modern period, the parish emerged as the primary unit of local governance. It is the spatial unit that local historians often adopt in their analyses of particular places, believing that it equates with a real community. And yet, in many places, local identity and sense of place was linked to settlement or manor rather than parish. In this article, Whyte draws on evidence from numerous court cases to examine the relationships between the social and geographical definition of the parish, the defence of common and custom rights, and the physical environment. Boundaries between places were drawn and redrawn on economic as much as social grounds, with practices such as beating the bounds being associated with defining customs and land use rights as much as cementing parish identity. Even with the coming of enclosure, parish boundaries still had to be remembered and carefully marked since they did not necessarily follow field boundaries.

This paper uses the Gaol Files from the Court of Great Sessions to construct a picture of the persons accused of infanticide in Wales during the eighteenth and early nineteenth centuries. Infanticide was rare, with fewer than 0.3 infanticides per 100,000 people. It was much more common when children were illegitimate, and this meant that it was more common in southern Wales than in the north of the country. Most of those accused of infanticide were woman, mainly (though not exclusively) single women, and many were domestic servants. However, it was not true that most were young, and many were in their late twenties and thirties. Woodward concludes that infanticide in Wales was rather similar in its characteristics to infanticide in England at the same time. The paper provides a wealth of information about individual cases as well as aggregate statistics.

R. Woods, ‘Medical and demographic history: inseparable?’ *Social History of Medicine*, 20, 483–503.

Woods wants medical historians to pay greater attention to measuring the impact of changes in medical technology and practice by identifying improvements in health consequent upon such developments. Because many aspects of health, such as sickness and people’s assessments of their own health status, tend to be socially constructed, they are difficult to use in this context, as it is hard to measure changes in health status objectively. Although mortality is not always correlated with morbidity, it is at least a culturally-invariant measure of health, and hence might help historians overcome the essential subjectivity of measures of the health of living people. Woods therefore argues that medical historians do need to consider demographic history (or at least that part dealing with the history of mortality) in order to assess the impact of medicine on society. This point was made many years ago by Thomas McKeown, and, as Woods recognises, has not been invalidated by the demonstration by subsequent historians that McKeown’s explanation of the decline of mortality was wrong. In the paper, Woods considers a wide range of examples, including mortality in London (see the paper by Razzell and Spence reviewed above) and foetal and neo-natal mortality.


In this important paper, Wrigley presents new estimates of the populations of English counties in 1761, 1771, 1781, 1791 and 1801. These estimates have been made as part of a project to analyse occupational change and economic growth in England between 1750 and 1851. The paper first describes the method used to make the estimates. This relies on the numbers of marriages in each hundred for the period following Hardwicke’s Act of 1753, as reported in the parish register abstracts for 1801. Because these can be regarded as complete records of the actual number of marriages contracted, then, assuming a constant marriage rate over the period, the trend over time in the number of marriages
reported should reflect changes in the underlying population totals. The application of this apparently simple approach turned out, as usual, to be somewhat more complex than envisaged, and Wrigley describes various corrections which were made to circumvent deficiencies in the data. Some of these involve constraining the resulting estimates to be consistent with those made in E.A. Wrigley and R.S. Schofield, *The population history of England, 1541–1871: a reconstruction* (London, 1981). The paper then discusses the results, which show that population growth was much slower in predominantly agricultural districts than in industrial areas, or in the counties around London. Finally, the paper illustrates how differential population growth rates among the regions of a country can lead to an apparent change in the national occupational structure even where the occupational structure of every region remained the same.
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Thanks to the generosity of Roger Schofield, the Roger Schofield Local Population Studies Research Fund has been created to provide grants to individual researchers whose work furthers the aims of the journal *LPS* and the Local Population Studies Society. Both promote the historical study of population within local and regional contexts, addressing questions that relate not only to historical demography, but also to wider issues in the social and economic history of Britain and Ireland.

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