Electoral registration in the United Kingdom

A literature review for the Cabinet Office Electoral Registration Transformation Programme

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List of Abbreviations

- AEC Australian Electoral Commission
- BME Black and Minority Ethnic
- CORE Coordinated On-line Register of Electors
- EONI Electoral Office for Northern Ireland
- ERO Electoral Registration Officer
- ESRC Economic and Social Research Council
- ERTP Electoral Registration Transformation Programme
- IER Individual Elector Registration
- NHS National Health Service
- OECD Organisation for Economic Co-operation and Development
- ONS Office for National Statistics
- OPCS Office of Population Censuses and Surveys

Acknowledgments

This literature review is a revised and expanded version of a similar paper originally prepared by the author while undertaking an ESRC Research Placement Fellowship at the Electoral Commission. I am grateful to the Commission for consenting for this review to be updated for the purposes of informing the Cabinet Office's work programme on electoral registration.

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Executive Summary

Purpose and context

This review is intended to inform the work of the Cabinet Office's Electoral Registration Transformation Programme (ERTP), in light of the current proposals for fundamental changes to the system of electoral registration. It is principally intended as a source document for ERTP, setting out what is known about the state of the UK electoral registers, as well as identifying gaps in the knowledge base which may be significant to the commissioning of future research. The paper is a revised and expanded version of a literature review prepared by the author while undertaking an ESRC Placement Fellowship at the Electoral Commission from 2009 to 2010.

Researching electoral registration: an overview of the literature

Research into the state of the electoral registers is patchy and has been uneven over time. While concerns about accuracy and completeness were first raised in the early 1950s, most research into the registers has been undertaken since the early 1980s. Since that time, there have been notable shifts in focus:

- From the 1980s, concerns about under-registration became dominant in the literature, with published research on electoral registration peaking amid concerns about the possible loss of hundreds of thousands of voters from the registers due to Poll Tax evasion.
- After the mid-1990s, the state of the registers became a neglected area of research, although this tendency has since been reversed as a result of the Electoral Commission's growing focus on registration research.
- More recent years have seen a growing focus on issues of both underand over-registration; this shift in focus has resulted, in part, from highprofile political and media concerns about the possible impact of the state of the registers for both levels of electoral participation and for guaranteeing electoral integrity. The challenges associated with the proposed introduction of individual elector registration (IER) have also brought questions regarding the completeness and accuracy of the register to the fore.

Electoral registration at home and abroad: a summary of the knowledge base

This literature review identifies sufficient evidence of ten key patterns and trends in relation to the completeness of the electoral registers. These are as follows:

1. The most recent national estimate for the coverage of the electoral registers in Great Britain found that they were 85-87 per cent complete

following the 2010 annual canvass, indicating a significant drop compared to the finding of previous studies, which had suggested the registers were 90-93 per cent complete.

- 2. Registration rates fluctuate over time, but show evidence of a gradual overall decline from the 1950s to the 1990s, followed by a steeper decline during the 2000s.
- 3. Fluctuations in registration rates have become more obvious since the early 1990s, and there is strong evidence to suggest that there was a serious dip in registration levels from 2002 to 2004, after which the completeness of the UK's electoral registers stabilised, but did not recover.
- 4. Clear geographical and social variations in under-registration have been evident since the early 1980s and have been consistently highlighted by subsequent research, although it is possible that some geographical variations may have narrowed as registration levels have begun to decline more rapidly.
- 5. Within Great Britain, the most obvious concentration of unregistered eligible voters is in Greater London, although there are also clear signs that the completeness of the registers has declined in other metropolitan areas, and possibly also in non-metropolitan area, over the past decade;
- 6. The methods used to undertake the annual canvass of electors in Great Britain can have a significant impact on canvass returns and, therefore, on levels of completeness and accuracy in the registers.
- Following the introduction of Individual Elector Registration (IER), Northern Ireland appears to have significant numbers of unregistered eligible voters and its registration rate appears to have stabilised at around 84 per cent – similar to the most recent estimate for the completeness of the registers in Great Britain.
- 8. Experience from Northern Ireland suggests that IER risks exacerbating levels of non-registration among those groups typically at risk of being most absent from the register.
- 9. The UK is one of relatively few established democracies which continue to compile their electoral registers on the basis of a canvass of households.
- 10. The latest national estimate for the UK suggests that the coverage of Great Britain's electoral registers no longer compares relatively well to the rates achieved in other Organisation for Economic Co-operation and Development (OECD) Member countries.

Evidence relating to the accuracy of the registers is less extensive, although recent Electoral Commission research does provide enough evidence for three broad tendencies to be identified:

- 1. *Rates of accuracy tend to mirror levels of completeness*: this is largely because the principal cause of both missing entries and redundant entries is the same, namely population movement. As a result, the accuracy of the registers declines over the period in which they are in force. The most recent estimate is the Great Britain's electoral registers were 82 per cent accurate in April 2011.
- 2. *Minor errors of recording are not especially common*: there is little evidence of registers containing significant numbers of errors or missing information relating to the recording of electors' names or addresses, and such mistakes are highly unlikely to prevent an elector from voting.
- 3. The number of registers inflated by attempts at 'roll-stuffing' is probably very small: concerns about the extent of fraudulent or 'ghost' names have been widely expressed, but it would appear that such problems are likely to be highly localised.

In addition, the review considers the experience of electoral registration in other democracies, with a particular focus on identifying potential lessons for the transition to IER in Great Britain. On the basis of the available evidence, particularly from Australia and Canada, it is suggested that:

- maintaining electoral registers by accessing other public databases can provide acceptable levels of completeness and accuracy (although typically lower than in countries with a civil registry). However, there can be stark contrasts in the rates of completeness and accuracy achieved;
- based on international experience, two key factors will influence the completeness and accuracy of the registers in Great Britain under IER
 the quality and usability of other public databases and the extent to which electors respond to any moral or legal obligation to provide information for the purposes of electoral registration.

Gaps and shortcomings: an overview of neglected issues and methodological problems

The review identifies a number of shortcomings within the literature which may be regarded as being 'internal' to debates on electoral registration. These are as follows:

- there is no available estimate of the extent to which there are duplicate entries on the registers and the scope to produce one has been undermined by insufficient progress towards a Coordinated On-line Register of Electors;
- despite the evidence which emerged in the 1990s, there has been a lack of attention in recent years to assessing the impact of particular methods of running the annual canvass on registration rates;
- there has been a tendency for existing research to offer insufficient analysis of the interaction between a range of factors influencing registration rates.

In addition, the review highlights three failings which arise from the lack of connection between research on the registers and wider bodies of evidence in the social sciences. These are as follows:

- there is limited recognition that changes in registration rates are influenced by variables which have no direct connection to electoral registration or even to politics;
- the nature of the relationship between social exclusion and electoral registration/participation has been insufficiently explored. This is despite the fact that many of the socio-demographic groups with the lowest registration levels are also those in which rates of participation in any form of political or social activity are lowest;
- there has been no sustained focus on public opinion in register research (although Electoral Commission surveys have provided valuable data in recent years) and there is a need for survey work which does more to explore the links between electoral registration and wider patterns of social and political (dis)engagement.

It is also suggested that attempts to estimate the completeness and accuracy of the registers have exhibited obvious methodological flaws. This point is strongly reinforced by the fact that recent survey findings have found the completeness of the registers to be several percentage points below the level which had been suggested by other recent studies. The key issues identified are the following:

- The hitherto preferred method of matching census returns against the electoral register in force at that time can only be carried out every 10 years and may over-estimate completeness due to the poor coverage of the census in metropolitan areas (it is possible that periodic national surveys may become the preferred method of estimating completeness and accuracy in future).
- Annual estimates derived by calculating registered voters as a proportion of the estimated adult population make use of mid-term population estimates which will include adults ineligible to vote, and electoral statistics which may include redundant entries on individual registers or duplicate entries across multiple registers.
- Cross-referencing electoral registers with NHS patient lists suffers from the limitation that the electoral registers have been found to be the more comprehensive of the two sources in question.
- Surveys are expensive to conduct and suffer from the limitation that, in areas where reluctance to complete electoral registration forms is greatest, researchers conducting surveys about the registers will often encounter similar responses to registration canvassers.

However, the review notes that, in the last three years, significant progress has been made in addressing a number of these methodological issues. In particular, the development of new methodologies for house-to-house surveys has made it possible to produce high quality estimates of completeness and accuracy at a lower cost than had been assumed previously. As a result, recent, current and future research offers far greater potential to monitor changes in the registers, particularly in light of the transition to IER.

Conclusions and recommendations for future research

The review concludes with a number of recommendations for future research. The principal recommendations put forward are that:

- There is an urgent need for updated research findings about levels of registration among 'at risk' groups in Northern Ireland, including identification of good practice and limitations around attempts to boost registration among specific groups, such as attainers.
- It is important to establish whether the accuracy of the Northern Ireland register is deteriorating as a result of the absence of an annual canvass since 2006.
- There may be particular value in further Northern Ireland research examining how the Electoral Office for Northern Ireland (EONI) has sought to address under-registration among different social groups and the lessons which can be learnt from this experience.
- There would be particular value in research examining the extent to which the Northern Ireland experience suggests data-sharing can be rendered more effective and how such matching might best be combined with a periodic canvass to maintain the completeness and accuracy of the registers.
- More could be learned from further research, or perhaps simply the sharing of research findings and frameworks, regarding the operation and outcomes of electoral registration in other countries which have moved from a 'periodic list' to a 'continuous list' system in recent decades.
- The potential impact of IER in Great Britain should be modelled in relation to: (i) the extent of expected change in the registers; (ii) the impact of defining registration as a matter of personal choice; and (iii) the implications of IER for the re-drawing of parliamentary constituency boundaries in future.
- There is a need for research into whether increasing registration rates within target groups is likely to be costly, particularly if there is no incentive or penalty applying to unregistered eligible voters. In addition, research into how levels of political participation can be raised, among both registered and unregistered voters, should be considered.

1. Introduction

The purpose and scope of this review

- 1.1 This literature review is intended to help inform the work of the Cabinet Office's Electoral Registration Transformation Programme (ERTP), in light of the current proposals for fundamental changes to the system of electoral registration. These proposals were outlined in a government white paper and draft bill, published in July 2011.
- 1.2 The literature review aims to provide a comprehensive overview of existing knowledge about electoral registration in the UK, including some comparisons with other established democracies. It is principally intended as a source document for ERTP, setting out what is known about the state of the UK electoral registers, as well as identifying gaps in the knowledge base which may be significant to the commissioning of future research. The body of literature reviewed was that which had been published in the period to the end of December 2011. This review therefore takes account of the finding of the most recent Electoral Commission research, which provides the first national estimates of the completeness and accuracy of the electoral registers in Great Britain for a decade.
- 1.3 It is also important to acknowledge that this paper comprises a considerably revised and expanded version of a literature review prepared by the author while undertaking an ESRC Placement Fellowship at the Electoral Commission from 2009 to 2010. Both the author and The Cabinet Office would like to express their gratitude to the Electoral Commission for giving permission for the original review to be updated for the purposes of the Cabinet Office's work programme on electoral registration.
- 1.4 In the context of the White Paper and draft Bill on electoral registration, the specific aims of this review are to:
 - provide an overview of existing research relating to the UK's electoral registers, as well as relevant research relating to the reform of electoral registration arrangements overseas;
 - summarise what can be established from this research about the current state of the UK's electoral registers, in particular the extent of under-registration in the UK and how this varies geographically and by socio-demographic group;
 - review the specific evidence on the impact of introducing Individual Elector Registration (IER) in Northern Ireland, including an assessment of the effect on registration levels;
 - identify the target groups at risk of falling off the register when electoral registration in Great Britain moves across to IER;
 - consider how under-registration and the identified 'target groups' relate to levels of political engagement more generally;

- identify the key gaps in the existing knowledge base, particularly in relation to the Electoral Commission's current research programme;
- consider the extent to which new research (planned and underway), including data-matching pilots, and survey work to produce national estimates of accuracy and completeness, will address the gaps which are identified;
- make recommendations for research based on the research lessons identified and on the needs of the Electoral Registration Transformation Programme.
- 1.5 The body of literature reviewed is summarised in Section 2. Before turning directly to consider this existing body of evidence relating to the electoral registers, it is important to first outline the current policy context. In addition, this introduction also considers some key definitional issues, particularly those relating to how 'accuracy' and 'completeness' are defined in relation to the electoral registers.

The policy context: electoral transformation

- 1.6 Following a relatively long period of minimal change to electoral registration arrangements, a variety of legislative changes impacting on registration procedures were introduced after 2000 as part of a wider agenda of 'electoral modernisation'. The key pieces of relevant legislation introduced by the Labour governments of 1997 to 2010 include:
 - The Representation of the People Act 2000 introduced provisions for rolling registration to augment the annual canvass of electors;
 - The Electoral Fraud (Northern Ireland) Act 2002 replaced 'household registration' with 'individual registration' in Northern Ireland. Under this system each individual elector is required to register separately and to provide 'personal identifiers' (signature, date of birth, national insurance number) with their application;
 - The Electoral Administration Act 2006 established a duty on Electoral Registration Officers (EROs) to take specific steps to ensure all eligible electors are registered;
 - The Political Parties and Elections Act 2009 made provisions for the introduction of individual electoral registration (IER) in Great Britain. The Act provided for personal identifiers to initially be collected from voters on a voluntary basis, with the introduction of IER on a compulsory basis after 2015 being dependent upon both a positive recommendation in favour of the proposed system from the Electoral Commission *and* subsequent approval by parliament.
- 1.7 The Conservative-Liberal Democrat coalition which took office following the May 2010 General Election included a commitment to accelerate the introduction of IER in its coalition agreement and, subsequently, its Programme for Government. Under the proposals published in the

White Paper on Individual Electoral Registration and draft Bill in July 2011, the government formally proposed to dispense with the voluntary phase legislated for by the previous government. In addition, the White Paper outlines that there would be:

- a transition period which will guarantee that electors who do not register under the new system in 2013 or 2014 will be retained on the register, thereby ensuring that they remain eligible to vote at the 2015 General Election;
- changes to the requirements for personal identifiers, so that voters will no longer need to provide a signature for these purposes and national insurance numbers will not be retained by EROs;
- a modernisation of the system of electoral registration, with EROs making much greater use of other public databases to maintain the electoral registers and enabling voters to register to vote, or amend their registration details, on-line;
- extensive use of these public databases by EROs to identify people who are missing from the register but may be eligible to vote, and to invite them to join the register;
- an express definition of the decision about whether or not to register to vote as a matter of 'personal choice' (although the current legal provision, as per the Representation of the People Regulations 2001, that electors not responding to an ERO's request for information could potentially liable to pay a fine of up to £1,000 would remain);
- provisions for parliament to vote, at a later stage, on whether to dispense with the annual canvass of electors, if the new arrangements are shown to be effective in maintaining the completeness and accuracy of the electoral registers.
- 1.8 The proposals contained in the White Paper have also been supplemented by a number of pilot schemes intended to test and develop the scope for 'data-matching' across different public databases by EROs. These pilots will be instrumental to the task of ensuring that registration under the new system will be effective both in providing for accurate electoral registers and in enabling EROs to identify individuals who are not currently registered to vote but may be eligible to do so.

Definitions of accuracy and completeness

1.9 In simple terms, the 'completeness' of the electoral registers refers to the extent to which all eligible voters are registered (and, likewise, that ineligible people are not registered). By contrast, the 'accuracy' of the registers is usually taken to constitute a measure of the extent to which the information contained in the register is correct. The formal definitions of accuracy and completeness used by the Electoral Commission were reviewed in 2008. The Commission's revised

definitions greatly simplified those used previously. These definitions remain current and are as follows:

- **Completeness**: 'every person who is entitled to have an entry in an electoral register is registered';
- Accuracy: 'there are no false entries on the electoral register'.

Structure of this review

- 1.10 The remainder of this review is presented in five main sections, as follows:
 - Section 2 presents a brief overview of the literature and summarises the key concerns which have been raised by research on the UK's electoral registers (as well as by other reports and published documents with a bearing on the registers). This section also provides a brief introduction to some of the English language literature about electoral registration in other democracies.
 - Section 3 provides an overall summary of what is known about the UK registers, based on a comprehensive review of the findings reported in the literature. This section includes a detailed discussion of the experience of IER in Northern Ireland and introduces some key findings from the review of electoral registration arrangements in other countries, most notably Australia and Canada.
 - Section 4 identifies a number of gaps in the existing knowledge base, as well as some key methodological problems, and considers the extent to which planned research being carried out by the Cabinet Office and the Electoral Commission will address these issues.
 - Section 5 summarises the principal conclusions reached by the review and makes a number of recommendations for future research.

2 Researching electoral registration: an overview of the literature

The nature of the literature

- 2.1 The literature on the UK electoral registers is relatively sparse. While research undertaken by government statisticians on the coverage of the electoral registers dates back to the 1950s and 1960s, the only substantial programme of rolling research, until recently, was undertaken by the Office of Population Censuses and Surveys (OPCS) in the 1980s and 1990s (Young and Todd, 1990; Hickman, 1991; Freeth, 1995, 1996, Devore, 1997). The earliest official studies were, moreover, mainly concerned with assessing the value of using the registers as a sampling frame for social surveys. It was only in later work undertaken by OPCS that concerns emerged about the coverage of the registers, variations in canvass returns from local authorities, and the extent of non-registration in inner-city areas. Notably, OPCS ceased to undertake research in this area after 1997, with the result that no governmental body published any assessment of the state of the registers in the period from 1997 to 2003.
- 2.2 It is only since 2003 that research into the electoral registers, undertaken or commissioned by the Electoral Commission, has begun to address this gap. The Commission has undertaken a major programme of research into changes in the Northern Ireland electoral registration following the introduction of IER in the province in 2002. In addition, it has published retrospective analysis of the state of the register in England and Wales in 2000/01 (Electoral Commission, 2005b). Most recently, the Commission has published two significant reports on the state of the registers in Great Britain making use of house-to-house surveys. The first of these reports presents findings from eight local case studies of the registers (Electoral Commission, 2010a). The second provides national estimates for the completeness and accuracy of the registers (Electoral Commission, 2011a).
- 2.3 Academic research on the UK's electoral registers is far patchier and mostly relates to work conducted in the 1990s. This small body of academic literature is also highly fragmented, comprising a small number of studies considering each of the following issues:
 - the impact of the Community Charge ('Poll Tax') on the coverage of the electoral registers (McLean and Smith, 1992, 1994, 1995);
 - registration levels among particular minority ethnic groups (Anwar, 2001; Fieldhouse and Cutts, 2007, 2008; Fieldhouse et al., 2007);
 - the pros and cons of using the electoral registers to assess the coverage and accuracy of NHS patients lists and/or as a sample frame for patient surveys (Bowling et al., 1989; Crombie et al., 1989; Monks et al., 1986; Pope and Croft, 1996; Rowarth and Jones, 1988; Walsh, 1994);

- the use of the electoral registers with regard to producing statistical estimates of population (Black, 1985; Redfern, 1989; Simpson et al., 1998) or as a sample frame for general social surveys (Lynn, 1997; Lynn and Taylor, 1995; Wilson and Elliot, 1987: Lynn, 2003); and
- the implications of incompleteness and inaccuracy in the registers for wider electoral matters, including: the measurement of turnout (Johnston and Pattie, 1997; Pattie et al., 1996; Swaddle and Health, 1989); the use of turnout thresholds in referendums (Balsom and McAllister, 1980); and the drawing of boundaries for parliamentary constituencies (Heady et al., 1996).
- 2.4 Despite the limited extent and depth of the literature, there is enough of an evidence base to identify some key historical and contemporary trends and to draw out key lessons for current research and policy. The extensive research on the operation and impact of IER in Northern Ireland is clearly of particular significance in the current policy context. In addition, there is a limited range of sources relating to governmental and academic research on electoral registration in other Organisation for Economic Co-operation and Development (OECD) Member countries. These sources offer at least some scope to contextualise the UK's performance in electoral registration and to identify possible lessons for research in the UK. In particular, the available literature on recent electoral registration reforms in Australia and Canada provide some useful insights for policy-makers in Great Britain given the White Paper's proposals for a transition to a 'continuous list' system of electoral registration, in which data-matching with other public records will play a significant role.

What concerns have been raised about the UK registers?

- 2.5 Current concerns about the UK's electoral registers are twofold. First, there may be under-registration on a level which serves to disenfranchise significant numbers of voters, particularly in urban areas. According to the Electoral Commission (2011a), there are at least six million eligible electors who are absent from the electoral registers. Young people, members of some ethnic minority groups and those on low incomes most likely to be unregistered. Second, the registers may simultaneously be inflated through the inclusion of entries which represent redundant names or, more worryingly, ineligible, duplicate or even fictitious voters. The latter has become a growing concern because of proven, albeit isolated, cases of 'roll stuffing', whereby illegitimate names have been added to registers in order to commit electoral fraud.
- 2.6 While the current level of attention to the state of the electoral registers is unprecedented, the concerns being raised about the registers are certainly familiar. Reviews of electoral registration arrangements date back as far as the 1940s (Oliver, 1946) and the possibilities of both under- and over-registration have been recognised since the very first

attempts to estimate the completeness and accuracy of the electoral registers (Gray et al., 1950; Gray and Gee, 1967). However, prior to 2005, the issue of under-registration was clearly the over-riding concern, with a series of studies seeking to provide estimates for the proportion of eligible voters who were absent from the registers (Todd and Butcher, 1981; Smith, 1993).

- 2.7 Concerns about the inclusion of illegitimate names on the electoral registers are much more recent. Prosecutions for electoral fraud brought since the introduction of postal voting on demand in 2001 have shown that, in some cases, fraud has been facilitated by the scope to manipulate the register through the practice of 'roll stuffing' (Wilks-Heeg, 2008). As such, the state of the electoral registers has become a key issue in recent debates about the security of the ballot. As a recent Council of Europe report noted: 'the combination of the household registration system without personal identifiers and the postal vote on demand arrangements make the election system in Great Britain very vulnerable to electoral fraud' (Däubler-Gmelin and Gacek, 2008, p.12).
- 2.8 While there is some historical continuity in the concerns expressed about the registers, it is also important to note that research into the accuracy and completeness of the electoral registers has been uneven over time. Research into the electoral registers waxes and wanes depending on shifts in the dominant policy issues surrounding electoral registration, and the state of the registers has gained significantly more attention in some periods than in others. Nonetheless, the Electoral Commission (2010a, 2011a) has demonstrated that the existing evidence base is sufficient for identifying some key temporal shifts in the coverage of the registers. Existing work also provides clear and consistent evidence about the groups most likely to be missing from the registers and can be used to identify the potential factors which may impact on levels of under- and over-registration. Finally, reviewing existing research also enables us to identify areas which would benefit from further research, draw out lessons from approaches to electoral registration overseas, and assess the strengths and weaknesses of different research methods.
- 2.9 Given the uneven, and shifting, focus of research on the registers, it is useful to divide previous and current existing research into four distinct time periods, as follows:
 - 'Early concerns' (1950 to 1980): the literature from this period is scant and is mainly concerned with estimating the extent to which inaccuracies in the electoral registers need to be taken into account where they are used as a sampling frame for social surveys. However, from the early 1970s, academics were beginning to raise doubts about the estimates of coverage put forward in these studies.
 - 'Those inner cities' (1981 to 1989): during the 1980s, greater attention was paid to concerns about the coverage of the electoral

registers, particularly in inner-city areas. This shift in focus resulted in a series of research studies undertaken by OPCS for the Home Office, and which intensified during the 1990s.

 'The missing million' (1990 to 1996): the first half of the 1990s was the period in which the electoral registers were researched most intensely, due to concerns that up to 1 million people had 'gone missing' from both the electoral registers and the 1991 Census returns. During this period, a series of studies were conducted by OPCS staff and by academics.

'The lynchpin of democracy' (2003 to the present): following a period of almost a decade in which no research into the registers was published, the issue has become the subject of renewed focus for research, particularly within the Electoral Commission. In contrast to previous phases of research, this evolving body of work has been concerned in equal measure with under- and over-registration. This shift in focus has resulted, in part, from high-profile political and media concerns about the possible impact of errors in the register for both levels of electoral participation and for guaranteeing electoral integrity. While the great bulk of the Commission's work has been focussed on the Northern Ireland register, it has also published three major reports on the state of the registers in Great Britain (Electoral Commission, 2005b, 2010a, 2011a

'Early concerns' (1950-1980)

- 2.10 As noted above, the few research studies conducted before the 1980s were mainly concerned with assessing the value of the electoral registers as a sampling frame for social surveys. The principal concerns these studies raised were twofold, as follows:
 - The coverage of the registers deteriorated over the life of the registers: studies of the registers published in March 1950 (Gray et al., 1950) and February 1966 (Gray and Gee, 1967) found that 96 per cent of electors were found to have been initially registered at the correct address within the qualifying date for the annual autumn canvass the previous year. However, by the time the registers were published four months later, population movement had reduced the proportion of voters registered at their correct address to around 94 per cent in 1950 and 93 per cent in 1966. On the last day of each register's life, the proportion of correctly registered electors had fallen to 87 and 85 per cent respectively.
 - Non-registration was significantly higher among younger voters: 'Y-voters' (the term previously used for 'attainers') were noted to have the greatest tendency to be absent from the registers. In 1958, it was estimated that only two-thirds of Y-voters appeared on the registers and in 1966 the estimate was about the same (Gray and Gee, 1967). Subsequently, Gray (1971, p.18) noted that only an estimated 40 per cent of teenagers eligible to register in 1970 appeared on the registers, while Rees (1970) reported that initial estimates for the same year suggested that around 1 million 16 to

21 year olds were absent from the registers. However, Gray and Gee (1967) also found that the coverage of the registers rose clearly with age. While 26 per cent of Y-voters were not registered, the figure was 7 per cent for under 25s, 6 per cent for the 25 to 29 age group, 3 per cent for those aged 30 to 39, and between 1 and 2 per cent for all other age groups.

- 2.11 A variety of other issues were highlighted by these early studies, but not considered as serious concerns at that time. For instance, Gray and Gee (1967) identified a need to promote registration among Indian and Pakistani communities, but without providing any clear indication of the extent of non-registration among these groups. In addition, various types of inaccuracy in the registers were identified, such as:
 - the incomplete nature of many of the addresses contained in the registers for Northern Ireland (Gray, 1971);
 - errors relating to the registration of Y-voters: around 6 per cent of eligible Y-voters appeared on the 1966 registers without a Yprefix and therefore would have been sent polling cards for the 1966 General Election (Gray and Gee, 1967);
 - the inclusion of around 0.5 million redundant entries on the registers, relating to duplicate entries, and deceased and non-eligible electors (Gray et al., 1950).
- 2.12 Academic literature on the registers prior to the 1980s was very limited in scope. In the sole academic source identified from this period, Rees (1970) suggested that Gray and Gee's estimates for the coverage of the registers were misleading on a number of grounds. In particular, Rees (1970, p.221) claimed that Gray and Gee:
 - excluded consideration of the 4 per cent of the eligible electorate 'living in hotels, boarding houses, hospitals and other establishments';
 - overlooked the methodological weaknesses of the 1966 sample Census, which was not fully independent of the electoral registers;
 - paid insufficient attention to invalid registrations, which could comprise up to 3 per cent of all registrations.

'Those inner cities' (1981 to 1989)

2.13 From 1980 onwards, concerns began to emerge about the possibility of considerable geographical variations in the coverage of the registers. Smith (1981) found that between one-quarter and one-third of women giving birth in five London registration districts in the late 1970s were not traceable on the electoral registers. Again with reference to Gray and Gee's (1967) study, Smith went on to note that 'the coverage of the Register may not currently be as good, particularly in some areas, as these studies suggest. If this is the case, those concerned with the

completeness of the Register should, perhaps, be considering ways of improving the process of registration' (p.278).

2.14 These concerns were strongly reinforced by research carried out during the 1980s by OPCS (Todd and Butcher, 1981; Todd and Dodd, 1982; Todd and Eldridge, 1987a, 1987b). These studies confirmed that there were significant geographical variations in levels of non-registration, with Inner London having a non-registration rate over double the national average (Todd and Butcher, 1981). Surveys in inner-city areas found that rates of non-registration ranged from between 4 and 17 per cent, with the highest rates of non-registration concentrated in London (Todd and Eldridge, 1987b).

'The missing million' (1990 to 1996)

- 2.15 Following the introduction of the Community Charge ('Poll Tax') in 1990, growing concern was expressed about the possible disappearance of eligible voters from the electoral registers, as a result of attempts by individuals to avoid paying the new tax. The possibility that large numbers of (Labour or Liberal Democrat) voters may have disappeared from the registers was given further credence when the initial results of the 1991 Census of Population suggested that a million or more people may have been absent from the Census returns (McLean and Smith, 1994; Dorling, 1996).
- 2.16 Research conducted during the 1990s provides at least some evidence to support these claims. McLean and Smith (1992) initially estimated that around 350,000 people had removed themselves from the electoral registers during the period in which the tax was introduced, subsequently upgrading their estimate to 600,000 individuals (McLean and Smith, 1994). In addition, both McLean and Smith (1994) and Dorling et al. (1996) concur that the number, likely socio-demographic profile, and geographical concentrations, of voters who had voluntarily removed themselves from the electoral registers were likely to have affected the outcomes of up to 10 parliamentary contests in 1992 (the Conservatives won the election with a working majority of 21).

				-	
	1988	1989	1990	1991	
Less than 90	15	17	16	26	

25

59

23

52

22

61

Table 1:Estimated final level of response to annual canvass, England
and Wales, 1988-91 (as % of forms returned).

Source: Hickman, 1992, p. 22.

25

60

90-94.9

95+

2.17 These findings are, moreover, consistent with the results of OPCS research in the 1990s which produced annual estimates of the

response to the annual canvass, based on survey returns from Electoral Registration Officers (EROs). Hickman (1992) reports a significant increase in the proportion of respondents estimating canvass returns of below 90 per cent. As Table 1 highlights, while around 16 per cent of EROs reported returns of less than 90 per cent from 1988 to 1990, this figure rose to 26 per cent of EROs in 1991. Moreover, while the proportion of EROs reporting returns in the range of 90 to 94.9 per cent remained stable, there was also a clear decline in the proportion of registers estimated to be 95+ per cent complete. The same report also highlighted clear contrasts in the canvass response rates for different types of local authorities. Thus, in 1991, 59 per cent of London boroughs reported canvass response rates of 90 per cent of 21 per cent of non-metropolitan districts.

'The lynchpin of democracy' (2003 to the present)

- The concerted efforts made by the Home Office and OPCS to increase 2.18 registration rates during the 1990s appeared to be disrupted by the merger of OPCS and the Central Statistical Office in 1996, and by the electoral reforms introduced after 1997. From the late 1990s, the emphasis of electoral policy switched from monitoring the completeness of the register and towards the introduction of new forms of 'remote voting' designed to increase turnout among registered voters. However, since 2004, the state of the electoral registers has become a key issue in relation to wider debates about both electoral participation and the security of the ballot. In particular, evidence has emerged that, in a relatively small number of cases, electoral registers have been manipulated in order to facilitate electoral fraud (Däubler-Gmelin and Gacek, 2008; Wilks-Heeg, 2008). During the same time period, moreover, reforms to registration and voting practices were introduced in Northern Ireland with the aim of addressing a widely held perception of significant levels of electoral fraud (Wilks-Heeg, 2008). At the centre of these reforms was the decision to introduce IER in order to improve the accuracy of the electoral registers in the province. Consequently, after a period of relative neglect, renewed interest in the state of the registers has seen the traditional concern with their completeness augmented with a much stronger emphasis on the need to take steps to evaluate and improve their accuracy (see, for example, Comptroller and Auditor General, 2007).
- 2.19 The main focus of electoral registration research since 2003 has been on the impact of the introduction of IER in Northern Ireland. Changes in the Northern Ireland register under IER have been closely monitored, since their inception, by a rolling programme of research undertaken by Price Waterhouse Coopers on behalf of the Electoral Commission. This research has resulted in the publication of 13 reports which, collectively, provide detailed analysis of how IER has impacted upon the completeness and accuracy of the Northern Ireland register, including the differentials in registration levels among key social groups

(PWC/Electoral Commission, 2003, 2004, 2005a, 2005b, 2005c, 2006a, 2006b, 2007a, 2007b, 2008a, 2008b, 2008c, 2008d).

2.20 For Great Britain, meanwhile, the key starting point for current discussion of the state of the electoral registers is the Electoral Commission's (2005b) report Understanding Electoral Registration. Subsequent evidence on the accuracy and completeness of the registers also emerged in the Committee on Standards in Public Life's (2007) review of the work of the Electoral Commission and the report of the Speaker's Committee (2007) on electoral registration. More recently, significant research using house-to-house surveys to estimate the completeness and accuracy of the registers has been reported by the Electoral Commission (2010a; 2011a). Meanwhile, the enormous wealth of data collected by the Electoral Commission (2008, 2009a, 2010b) in relation to the development of Performance Standards for electoral registration offers fresh evidence about variations in electoral registration. Since this data is collected via a survey of local authorities, using similar techniques to the surveys carried out by OPCS in the 1980s and 1990s, there is also scope to draw comparisons with earlier findings.

Table 2:Profile of non-registration (% not registered within group),England and Wales 2000/01

Non-Registration Rate	Status
10%	Receiving benefit
10%	Divorced/Separated
12%	Living with parents
16%	Moved 23 months prior to qualifying
17%	Commonwealth national
17%	30 years age, single
18%	Unemployed
19%	EU National
22%	Full-time student
27%	Private renter
28%	Attainer
33%	Moved 6 months prior to qualifying date
43%	Unrelated to head of household*
60%	Non UK/EU/Commonwealth nationality

Note: Eligible electors defined as being 'unrelated to head of household' would include residents in house/flat shares, lodgers and so on.

Source: ONS (2002), cited in Electoral Commission (2005b).

2.21 In its (2005b) report on electoral registration, the Electoral Commission reiterated earlier concerns about the extent of non-registration in the general population, as well as specific concerns about how variations in non-registration correlate with age, gender, ethnicity, employment

status, place of residence and other socio-demographic variables. While the report confirmed the lack of widely accepted figures for under-registration, it did produce what was, until recently, cited as the 'best available' current estimate, namely that roughly 8 to 9 per cent of eligible voters are absent from the electoral registers in England and Wales (approx 3.5m in 2000). At the same time, the report also produced estimates relating to a range of socio-demographic groups among which under-registration levels are widely assumed to be highest. Table 2 outlines the non-registration rates of a number of these key groups in England and Wales in 2000/01, reinforcing the argument that students, young people, recent home movers and those living in private rented accommodation and/or shared households are especially likely to be absent from the registers.

- 2.22 In subsequent research, the Electoral Commission (2010a) examined the completeness and accuracy of the electoral registers in eight case study locations across a mixture of metropolitan, urban and rural areas of Great Britain. Based on house-to-house surveys in these locations, the Commission's research produced 'snapshot' estimates of completeness and accuracy in these locations at particular points in the life of the 2008 register. In seven locations, the surveys were carried out after the June 2009 elections, and completed by late August/early September, shortly prior to the updating of the registers via the annual canvass. In the eighth location, Knowsley, the survey was carried out in Spring 2009 (before the June 2009 elections), roughly mid-way through the register's lifetime. While the nature of the case study approach meant that the results could not be aggregated to provide a national estimate, the findings revealed significant contrasts in completeness and accuracy between the eight localities, as well as some common trends in patterns of under-registration among particular social groups. Moreover, the case studies were highly effective in developing a robust methodology for assessing the accuracy of the electoral registers and in providing for a much greater understanding of the relationship between the completeness and accuracy of the registers.
- The survey methodology developed for the Electoral Commission's 2.23 case study research was subsequently adopted, with some modifications, to produce national estimates of the completeness and accuracy of the registers (Electoral Commission, 2011a). Funded by the Cabinet Office, the Electoral Commission engaged Ipsos MORI to undertake a survey of 5.287 households across 50 local authorities in England, Scotland and Wales. The local authorities making up the sample were stratified by region, local authority type and population density. Five electoral wards were then selected in each of the 50 authorities, stratified by social class to ensure a broadly representative sample. The survey was carried out between June and September 2011 to produce estimates of the completeness and accuracy of the April 2011 registers, on the basis of information from a total of 8.306 individuals eligible for inclusions on the register. The research team also used the findings to provide retrospective estimates of the

completeness of the registers in December 2010, following the annual canvass of electors. This approach enabled national estimates of completeness and accuracy to be produced for the first time using a survey-based approach rather than via matching register entries against census records.

2.23 The final body of work relevant to this review is the literature relating to electoral registration overseas. The English language literature is dominated by research on electoral registration in the USA, much of which considers the reasons for state-level variation in registration (Brown et al., 1999; Highton, 2004; Hammer 2009; Lloyd, 2001; Committee on State Voter Registration Databases, 2010; Avery and Peffley 2005). Given the very particular nature of electoral registration in the USA, including substantial inter-state variation in the laws and procedures governing registration, this literature is of limited relevance to the UK. There is a more limited range of sources on electoral registration in countries with systems broadly similar to those in the UK, notably France (Faliu et al., 1997; Schon, 2004) and Ireland (Hughes et al., 2007). Moreover, there are a modest number of sources which provide a comparative account of electoral registration arrangements in democracies around the world (Rosenberg and Chen, 2009; International IDEA, 2002; ACE Electoral Knowledge Network, undated). These sources are useful in helping to contextualise the nature of both the UK's current approach to electoral registration and the form of 'continuous registration' which the White Paper proposes to move to as part of the transition to IER. In this regard, the relatively small body of literature on electoral registration in Australia (Brent and Jackman, 2007; Brent, 2008) and Canada (Black, 2000, 2003; Brians, 1997) is of particular significance. Electoral registration in both of these countries underwent reforms in the 1990s broadly similar to those proposed in the White Paper for Great Britain, and there would appear to be much to be learned from their experience.

.3. Electoral registration at home and abroad: a summary of the knowledge base

- 3.1 Despite the relatively fragmented nature of the existing literature, and the range of approaches adopted to produce estimates of the completeness and accuracy of the UK registers, there are nevertheless a number of relatively clear initial conclusions which can be derived from the existing evidence base. In this section, we distinguish ten key areas in which there appears to be sufficient evidence to identify reasonably clear patterns and trends in relation to completeness. These are as follows:
 - The most recent national estimate for the coverage of the electoral registers in Great Britain found that they were 85-87 per cent complete following the 2010 annual canvass, indicating a significant drop compared to the finding of previous studies, which had suggested the registers were 90-93 per cent complete;
 - Registration rates fluctuate over time, but show evidence of a gradual overall decline from the 1950s to the 1990s, followed by a steeper decline during the 2000s;
 - Fluctuations in registration rates have become more obvious since the early 1990s, and there is strong evidence to suggest that there was a serious dip in registration levels from 2002 to 2004, after which the completeness of the UK's electoral registers stabilised, but did not recover;
 - Clear geographical and social variations in under-registration have been evident since the early 1980s and have been consistently highlighted by subsequent research, although it is possible that some geographical variations may have narrowed as registration levels have begun to decline more rapidly;
 - Within Great Britain, the most obvious concentration of unregistered eligible voters is in Greater London, although there are also clear signs that the completeness of the registers has declined in other metropolitan areas, and possibly also in non-metropolitan area, over the past decade;
 - The methods used to undertake the annual canvass of electors in Great Britain can have a significant impact on canvass returns and, therefore, on levels of completeness and accuracy in the registers;
 - Following the introduction of Individual Elector Registration (IER), Northern Ireland appears to have significant numbers of unregistered eligible voters and its registration rate appears to have stabilised at around 84 per cent – similar to the most recent estimate for the completeness of the registers in Great Britain;

- Experience from Northern Ireland suggests that IER risks exacerbating levels of non-registration among those groups typically at risk of being most absent from the register;
- The UK is one of relatively few established democracies which continue to compile their electoral registers on the basis of a canvass of households;
- The latest national estimate for the UK suggests that the coverage of Great Britain's electoral registers no longer compares relatively well to the rates achieved in other Organisation for Economic Co-operation and Development (OECD) Member countries.
- 3.2 It is clear from the literature that the existing evidence base is far less robust in relation to the accuracy of the electoral registers. However, there is arguably sufficient evidence to suggest that:
 - Minor errors relating to misspellings of names or slightly incorrect recording of addresses, although not uncommon, can be largely disregarded as a form of inaccuracy, since they would be unlikely to disenfranchise an elector or to provide the basis for electoral malpractice.
 - The most significant form of inaccuracy in the registers relates to electors who are not resident at the address stated on the register. The principal reason for this form of inaccuracy would appear to be electors moving home and not informing the ERO, rather than attempts to create false registrations for the purposes of committing electoral fraud.
 - However, whilst rare, deliberate attempts to manipulate the register to conduct electoral fraud do expose vulnerabilities in the current system of electoral registration; proven and suspected cases of 'roll stuffing' affect a small proportion of local registers, but have demonstrated the scope for false electors to be registered in large numbers on individual local registers.

Comparing estimates of non-registration

3.3 The Electoral Commission's (2011a) report provides the first robust national estimate of non-registration across all of Great Britain since 1991 (the Electoral Commission's (2005b) study, which applied retrospectively to 2001, was for England and Wales only). Other attempts have been made to gauge levels of under-registration over the past two decades, but it is widely accepted that most of these studies had severe methodological limitations (see Section 4 for further discussion). Prior to 2011, the conclusions reached by studies examining the state of the registers were remarkably consistent, despite the range of different methods used. Specifically, almost all research published from the early 1990s up until 2010 pointed to an average level of non-registration of between 7 and 10 per cent. By contrast, the Electoral Commission (2011a) found that the registers were only 82 per cent

complete in April 2011, having deteriorated from a maximum of 85-87 per cent completeness directly after the annual canvass. Thus, underregistration in Great Britain appears to correspond to between 13 and 18 per cent of the eligible electorate, equivalent to at least 6 million people (Electoral Commission, 2011a). This figure represents a significant increase from the estimated 3.5 million eligible electors who were absent from the registers for England and Wales in December 2010 (Electoral Commission, 2005b).

3.4 The seven principal approaches to estimating non-registration, and the results they have produced, may be summarised as follows:

a. *Comparison with census records*: the Office for National Statistics (ONS) was commissioned by the Electoral Commission in 2004 to match the October 2000 electoral register against combined samples drawn from the 2001 Population Census and the Labour Force Survey (the Census Coverage Survey used to assess levels of registration in 1991 was not available for a study of the 2001 register). From this analysis, the Electoral Commission (2005b) derived its previous 'best estimate' for England and Wales that between 8 and 9 per cent of eligible voters were absent from the register (about 3.5 million electors) at that time.

b. Comparison with mid-term population estimates: estimates, derived from comparing mid-term population estimates for the population aged 18 or over with the total number of registered electors, have been used to produce both national and local estimates of notional registration levels. Using this method, ONS estimated a national registration rate of 94.6 per cent in December 2004 (White, 2005). This approach is, however, widely recognised to be most likely to produce significant over-estimates of registration levels – some local authorities are found to have registration rates of over 100 per cent using this method (Dorling, 2007).

c. *Telephone surveys*: a public opinion survey of a sample of the UK population, using the telephone directory as the sampling frame, was conducted by MORI on behalf of the Electoral Commission in late 2004/early 2005. This survey produced an estimated level of non-registration of about 7 per cent, although it is important to note that this estimate was based on 'self-reporting' and these responses were not cross-checked against the electoral registers. A subsequent, pilot study using telephone interviews across Greater London, which did include register cross-checks, highlighted that self-reporting is likely to over-estimate completeness and that there are there are significant subnational variations in registration rates.

iv. *House-to-house surveys*: the Electoral Commission's (2010a) surveys in eight case study areas in Great Britain produced estimates of the completeness of local electoral registers which ranged from 73 per cent in the London Borough of Lambeth to 94 per cent in the Metropolitan Borough of Knowsley. Crucially, these surveys were carried out at specific points in the lifetime of the registers concerned and, since they do not constitute a national sample, they cannot be aggregated to provide a national estimate. However, by adopting the same approach to undertake a national survey, the Electoral Commission (2011a) was able to produce the estimates for the completeness and accuracy of the electoral registers summarised in paragraph 3.3 (above).

v. Other surveys of the adult population eligible to vote: since 1964, the British Election Study has surveyed around 4,000 voters before and after general elections. From 1997 onwards, the Postcode Address File replaced the electoral registers as a sampling frame; alongside this, questions about electoral registration were added to the survey and, importantly, the answers provided were cross-checked against the actual registers. In 2001, 94.9 per cent of respondents confirmed that they were on the electoral register, 3.6 per cent said they were not registered, and 1.5 per cent indicated they were unsure about their registration status.

vi. Surveys of the response rate to the annual canvass of electors: a recent survey of Electoral Registration Officers conducted by the Electoral Commission gathered data from 403 local authorities on the percentage of completed 'register of elector' forms (form A) returned to local authorities. While the completion of the form on a household basis means that these returns cannot be used to estimate local or national registration rates, the results of the survey suggest that 93 per cent of forms were completed and returned to EROs in 2007 - i.e. that 7 per cent of households did not complete the form.

vii. Cross-referencing of electoral registers against lists held by Primary Care Trusts or other medical authorities or against council tax registers: such studies, generally combined with a survey of a sample of names on the respective registers in a particular locality, typically suggest the electoral registers cover 90 to 92 per cent of the local population – i.e. that between 8 and 10% of adults are not registered to vote (Bowling et al., 1989; Garton et al., 1996). However, such studies are mostly dated and it has not been possible to identify more recent examples of this approach.

Trends in registration rates

- 3.4 Available evidence suggests that levels of electoral registration have fluctuated since the 1950s, with under-registration peaking in the early 1990s and again in the period since the mid-2000s. While the overall decline in registration levels from the 1950s to the early 2000s was relatively minimal, it would appear that the decline in the completeness of the registers has accelerated over the last decade.
- 3.5 As noted in Section 2, the maximum registration rate achieved in the post-war period appears to have been 96 per cent, although a further 10 per cent of electors could potentially have been disenfranchised by virtue of moving home during the lifetime of the register. Estimates for the period up until the early 2000s, cited above, compared relatively

well with these figures from previous decades, finding that around 92 per cent of eligible electors were registered. Specifically, registration estimates derived from comparisons with census returns suggest that there was a modest fall in registration rates from around 93 per cent in 1991 to between 91 and 92 per cent in 2001 (Electoral Commission, 2010a).

3.6 However, the period since the early 1990s has also seen significant fluctuations in registration levels. There was an absolute decline in the number of registered electors in 1989, 1991 and 1993. As a result of this decline in the number of registered voters, Home Office data suggests that non-registration rates doubled between 1987 and 1993, as Figure 1 shows, with only modest improvements after 1994. While the absolute number of entries on the registers rose from the mid-1990s, there were consecutive falls in 2001, 2002 and 2003, as highlighted in Figure 2.



Figure 1: Estimated proportion of voters not registered, 1983-1997

Note: The figures in this graph provide a notional non-registration rate, based on the difference between the voting-age population and the number of entries on the electoral registers.

Source: Home Office (1998), cited in Electoral Commission (2005b).

3.7 Given the overall population growth during this period, there was a sharp drop in the notional registration rate (a relatively crude measure of completeness) from around 95 per cent in 2001 to 91 per cent in 2006, followed by a subsequent stabilisation of the rate at this 91 per cent level thereafter (see paragraph 3.4 for discussion of the problems

with this approach to estimating completeness). Thus, while the number of entries on the UK's electoral registers rose by over 1 million between 2003 and 2008, the notional registration rate did not return to the 95 per cent figure consistently achieved from 1991 to 2011 (Electoral Commission, 2010a).

3.8 These patterns in the number of entries on the registers are consistent, moreover, with data drawn from broadly comparable surveys of canvass response levels in local authorities in 1994, 1995, 1996, 2003, 2004, 2007 and 2008. These surveys suggest that the median household response rate fell from 97 per cent in the period 1994 to 1996, to 91 per cent in 2004. As Figure 3 shows, the decline in the registration rate over this period broadly tracks this drop in canvass response. While the median canvass response rate then increased to around 94 per cent in 2008, the effect appeared to be one of stabilising, rather than increasing, the registration rate (Electoral Commission, 2010a).



Figure 2: Total number of registered UK parliamentary electors, 1991-2008

Source: ONS Electoral Statistics, 1992–2010

Figure 3: Canvass response rate (median) and estimated registration rate, England and Wales - 1995-98, 2003-04 and 2007-08 (%)



Source: Electoral Commission (2010a, p.28)

Geographical and socio-demographic variations

3.9 Reviewing the historical literature on the electoral registers underlines a number of long running problems in the coverage of the electoral registers. In particular, four particular patterns of under-registration have been noted in the literature for several decades. These are as follows:

a. Registration rates are low in parts of Greater London: a number of studies since the early 1980s have suggested that under-registration in Inner London could relate to anywhere between one-sixth and one-third of eligible voters. Smith (1981) found that among a sample comprising the 1,179 women who gave birth in five London registration districts in March 1978, 39 per cent could not be found on the electoral registers, falling to 26 per cent among UK-born women in the sample. By contrast, Todd and Eldridge (1987) suggest that non-registration rates in Inner London were 14 per cent, compared to 6.7 per cent for England and Wales; they identified one ward in London with 17 per cent of electors omitted from the registers. While these two sets of figures are an insufficient basis to suggest an improvement in registration rates in Greater London, it is notable that one study suggested that registration drives during the period 1983 to 1985 (Pinto-

Duschinsky, 1987). However, the impact of registration drives had tailed off by the early 1990s, by which time Poll Tax evasion would also have had a significant effect on London's registers (McLean and Smith, 1994). As a result, Smith (1993) estimated that 20.4 per cent of eligible voters in Inner London and 10.3 per cent of eligible voters in Outer London were missing from the registers, compared to 7.1 per cent for the UK as a whole. It is likely that under-registration in London has remained at about this level: the estimates contained in the Electoral Commission's (2005b) report, suggested 11 per cent of eligible voters in Outer London were absent from the registers, rising to 18 per cent in Inner London. However, it is possible that such figures mask significant differences between individual London boroughs. Pilot research in Greater London commissioned by the Electoral Commission suggested that under-registration in individual London boroughs could potentially range anywhere from 9 to 33 per cent (GfK NOP Social Research, 2007a). The subsequent Electoral Commission case studies of electoral registration found that the London Borough of Lambeth's register was only 73 per cent complete in late summer 2009, the lowest level of completeness in the eight areas studied (Electoral Commission, 2010a). The Electoral Commission's (2011a) survey estimated that the registers in Greater London were 80 per cent complete in April 2011, two percentage points below the national average.

Table 3:Geographical and social variations in electoral registration:estimated percentage of voters not registered, 1991 and 2000

	1991	2000
England	7.3	6.9
Scotland	6.6	n/a
Wales	4.8	6.0
Great Britain	7.1	n/a
Inner London	20.4	18
Outer London	10.3	11
Other English metropolitan areas	6.0	n/a
English non-metropolitan areas	6.3	n/a
Men	8.3	8
Women	6.1	6
Born in UK, Ireland or old Commonwealth	6.4	n/a
New Commonwealth citizen (1991)/member	36.6	17
of an ethnic minority (2000)		

Source: Smith (1993), cited in Mclean and Smith (1994); Electoral Commission (2005b).

b. Young people are most likely to be absent from the registers: since 1951, anyone who is expected to become eligible to vote within the lifetime of the register has been recorded on the registers with a

specific mark next to their entry. Initially these were known as Y-voters, although the term 'attainers' is now used. Estimates from the 1950s and 1960s suggested that around one-third of Y-voters were absent from the registers (Gray and Gee, 1967), while Gray (1971, p.18) found that only an estimated 40 per cent of teenagers appeared on the registers in 1970. More recent estimates indicate there may have been a significant improvement in the registration of attainers. Around threequarters of attainers were estimated to appear on the registers in 2000 (Electoral Commission, 2005b), a slightly higher rate than was estimated for Y-voters in the 1960s. However, these estimates also showed that registration rates rise with age, with attainers most likely to be absent from the register (Electoral Commission, 2005b, p.29). Based on these figures, attainers are up to twice as likely to be absent from the registers as 18 to 24 year olds, up to five times more likely to be absent than 35 to 44 year olds, and around 15 times more likely to be unregistered than voters aged 65 and over. Equivalent conclusions were reached from the Electoral Commission's (2010a) case study surveys. Aggregating the results across seven local authority case studies, it was estimated that only 43 per cent of 17 to 19 year olds and 44 per cent of 20 to 24 year olds were registered at their then current address. Registration levels rose steadily with each age band, to 66 per cent among those aged 25 to 34 and 84 per cent among 35 to 44 year olds, peaking at 97 per cent among those aged 60 to 64 (Electoral Commission, 2010a, p.74). A similar pattern was identified in the Electoral Commission's (2011a) national estimates, which found 55 per cent of 17-18 year olds and 56 per cent of 19-24 year olds were registered. Again, registration rates were shown to rise with age, reaching 72 per cent in the 25-34 age bracket, 86 per cent for 35-54 year olds and 90 per cent for 55s-64s. Among those aged 65 and above, registration levels were put at 94 per cent.

c. Registration rates among ethnic minority groups vary enormously: although they provided limited empirical data on rates of registration among minority ethnic groups, Gray and Gee (1967) suggested promoting registration among Indian and Pakistani communities as one of three key measures to improve the coverage of the electoral registers. This conclusion was reinforced by Smith (1993), who suggested that as many as 37 per cent of eligible 'new commonwealth' citizens in the UK may have been absent from the electoral registers in 1991. However, any assumption that these figures could be taken as a proxy estimate of under-registration across all ethnic minority groups was challenged by research evidence emerging from 2004 onwards. The Electoral Commission (2005b) confirmed that members of BME groups are more likely to be absent from the electoral registers but estimated that rates of under-registration in ethnic minority groups varied from 6 per cent for Indian and Bangladeshi communities, to 30 per cent among eligible voters of Chinese origin and 37 per cent among black Africans. The same source reported that the analysis undertaken by ONS indicated a possibly marked reduction in underregistration among British Asians. These findings are broadly confirmed by the Electoral Commission's (2010a) study of registration levels which found registration levels to be significantly lower for eligible BME British electors (69 per cent) compared to white British electors (86 per cent).¹ Similarly, in its national study, the Electoral Commission (2011a) found that completeness of the registers was 77 per cent among BME electors surveyed, but 86 per cent for white electors. While the base sizes in either of these surveys were too small to distinguish between different BME groups, there are few grounds to suppose any significant change in the variations observed above.

d. Tenants in rented accommodation are far more likely to be absent from the registers than owner-occupiers or social housing tenants: Todd and Eldridge (1987), writing in the 1980s, noted that existing research at that time indicated that areas with a high share of housing stock in the private-rental sector tended to exhibit significantly higher levels of non-registration. In turn, private sector tenants were significantly more likely to fall into other categories for which registration rates were low, including houses with multiple occupation, people with high rates of geographical mobility, and young people living away from the family home. The Electoral Commission's (2010a, p.71) report confirmed this pattern, finding that, across its eight case studies areas, registration levels among owner-occupiers were around 90 per cent, while the figure for those renting from private landlords was only 44 per cent. Noting that these contrasts partly reflect the higher levels of residential turnover among households in the private rental sector, the report also highlighted higher levels of completeness for council tenants (79 per cent) and housing association tenants (75 per cent), both of whom tend to have much greater residential stability. Again, these broad contrasts were replicated in the Electoral Commission's (2011a) research, which recorded 80 per cent completeness among those who owned their homes outright and 87 among those in household being bought on a mortgage. By contrast, 78 per cent of council and housing association tenants were registered at the correct address, and just 56 per cent of those renting from a private landlord.

3.10 Clearly, many of these categories overlap and are mutually enforcing, particularly within Inner London. However, it is also important to treat these as separate categories for the purpose of understanding patterns, causes and consequences of under-registration. In particular, it would be misleading to assume that under-registration is a specifically Inner London problem. As McLean and Smith (1994, p.144) note, 'the 1991 electoral register probably under-reports the number of young, poor, mobile and ethnic minority citizens across the whole country'. It is equally evident that the core socio-demographic

¹ It should be noted that these figures were derived by aggregating the results from seven case study surveys carried out shortly prior to the 2009 annual canvass. As such, the figures are a valid measure of the contrast in registration levels between white British and BME electors but should not be taken to represent a national estimate. It is also important to note that levels of completeness across all social groups would be higher if, as is conventional, estimates were produced following the annual canvass.

characteristics of unregistered eligible voters have changed little over the past 20 years. In this sense, the findings reported by the Electoral Commission (2005b) could have been taken from almost any similar study since the early 1980s:

Non-registration was higher in densely populated areas, in metropolitan areas (particularly inner London) and in areas characterised by employment and income deprivation. Levels of non-registration were higher among younger people, especially attainers and those who lived away from home resulting, partly, from their greater mobility (p.37).

- 3.11 What is difficult to assess, however, is the extent to which these variations in registration levels between different social groups also continue to give rise to clear contrasts between different geographical areas. The Electoral Commission (2011a) points to what appears to be a convergence in registration rates between Greater London and other metropolitan areas. The same study found relatively little difference in the completeness of the registers in two-tier local authority areas in comparison to metropolitan districts. Yet, the Electoral Commission (2010a) suggested there were grounds to believe that geographical variations in registration levels between urban (especially metropolitan) and rural areas may have widened over the last decade. However, these findings are not as contradictory as they might seem. Certainly, while analysis of registration and canvass response rates points to a stabilisation, and possibly even modest improvement, in London's registers since the late 1990s, English metropolitan districts appear to have experienced a clear fall in registration levels. In addition, the Electoral Commission's (2011a) study did not have a sufficient sample size to examine variations within the different categories of local authority, which are likely to be substantial. While the vast majority of local electoral registers in Great Britain have canvass response and notional registration rates which are above 90 per cent, just under onetenth of local authorities are below the 90 per cent threshold on both these indicators. The Electoral Commission (2010a) identified four principal types of locality among these outliers, namely:
 - *Inner London boroughs*: Camden, Hackney, Kensington and Chelsea, Lambeth, Tower Hamlets, and Westminster;
 - *Scottish unitary authorities:* Aberdeen, Edinburgh, Glasgow, and West Dunbartonshire;
 - *English metropolitan boroughs:* Bradford, Coventry, Newcastle, and Sheffield;
 - University towns/districts with large student populations: Cambridge, Canterbury, Ceredigion, Colchester, Nottingham, and Warwick.

Canvass methods are likely to impact on levels of registration

- 3.12 While rates of canvass response under a system of household registration cannot be assumed to represent the same thing as registration rates, it is nonetheless clear that maximising canvass response must be a pre-requisite for ensuring that the registers are as complete and accurate as possible. In this regard, studies dating from the 1990s, which assessed the impact of different approaches to the canvass at a local authority level on final canvass response, are an important part of the wider body of evidence relating to the completeness of the registers.
- It is evident that there are significant local variations in both the 3.13 methods used to undertake the annual canvass and in canvass response rates. EROs are known to deploy a great variety of methods in compiling the registers, including postal delivery of forms and reminders, as well as hand delivery and personal contact via a door-todoor canvass. Freeth (1996) found that around 30 per cent of households did not respond to the initial canvass in 1995, resulting in up to three reminders being issued, with personal contact being made in 70 per cent of cases where two or three reminders were required. However, the study also noted that the use of personal contact had declined since the early 1980s, particularly at the first reminder stage, despite Home Office guidance encouraging its use. Using regression analysis to estimate the likely impact of different approaches to compiling the register, Freeth (1996) calculated how the standard use of particular combinations of procedures would maximise canvass returns. These included: printed warnings about fines for nonregistration; personal canvassing; oral and written warnings about possible prosecution for non-registration; the payment of bonuses to canvassers; and bar-coding of registration forms. Freeth (1996) estimated that using this specific combination of approaches would raise canvass returns from 92.6 to 98.6 per cent in metropolitan boroughs and from 87.4 to 95.9 per cent in London boroughs.
- In an earlier study, Freeth (1995) had applied similar techniques to 3.14 estimate the specific effects of personal canvassing at the final reminder stage and of the issuing of letters with a formal warning about the risk of prosecution for non-return of the canvass form. While Freeth (1995, p.24) noted that very few EROs ever instigated such prosecutions, her modelling of canvass response rates suggested that the threat of prosecution did appear to increase returns, especially where combined with personal canvassing at the final reminder stage. As Table 4 shows, Freeth (1995) found that issuing a letter to nonresponding households would, by itself, raise the average canvass response by at least one percentage point across all types of local authority. However, if this letter were combined with a 100 per cent personal canvass of non-responding households, it was estimated that average response rates would be more than four percentage points higher in London boroughs, more than three percentage points higher

in metropolitan districts, and two percentage points higher in nonmetropolitan districts. In the context of an estimated under-registration rate of 7 per cent in 1991, and with non-registration concentrated in big cities, it seems apparent that such an approach offered scope to improve registration level quite significantly.

Table 4:Estimated levels of median canvass response (%) in England and
Wales, if all EROs adopt specific methods of targeting non-
response, 1994/95

	London Boroughs	Metropolitan Districts	Non- Metropolitan Districts
Actual canvass response rate	90.9	94.8	95.7
With reminder letter threatening prosecution for non-response	93.1	95.7	96.8
With reminder letter threatening prosecution for non-response and 100% personal canvass at third reminder stage	95.3	97.3	97.8

Source: Freeth (1995)

Why do voters register? The uncertain role of legal 'compulsion'

3.15 While there is no contemporary equivalent of Freeth's (1995) study, her findings appear especially relevant in light of the sharp decline in registration levels between 2002 and 2005, when a significant number of local authorities opted to dispense with personal canvassing and instead revert to an all-postal canvass (Electoral Commission, 2010a). The Electoral Administration Act 2006 responded to this increasingly widespread practice by requiring EROs to 'take all necessary steps to ensure that households respond to the annual canvass', including the use of personal canvassing where no response is achieved. In addition, there remains a widely-held assumption that EROs issuing clear reminders about the legal duties applying to electors are valuable as a means of maximising canvass response and, therefore registration, rates. For example, the Electoral Commission's written guidance to EROs advises that:

where several canvass forms have been sent to an address but no response has been received, it may be helpful for reminders to be accompanied with a letter from the Electoral Registration Officer, explaining that there is a legal obligation to complete the canvass form and stating the possible consequences of nonresponse and non-registration, such as being prosecuted and fined, being disenfranchised and so on. (Electoral Commission, 2009, Part C, Para 2.18).
3.16 The current legal obligations applying to EROs and electors are principally defined by the Representation of the People Acts, the Electoral Administration Act 2006, the Representation of the People Regulations 2001 and 2006, and the Representation of the People (Form of Canvass) Regulation of 2006. Two points of law are of particular significance to any discussion of the duties of electors to respond to requests from EROs. First, Regulation 23 of the Representation of the People Regulation provides EROs with the 'power to require information' from individuals and establishes the liability of an individual to be fined for non-compliance (see Box 1). Second, Schedule 1.of the Representation of the People (Form of Canvass) Regulation 2006 sets out the wording of prescribed forms to be used by EROs when conducting the annual canvass. This wording clearly requires EROs to clarify to 'the occupier' of a property that 'You are required by law to give the information asked for in this form'. Although it is not directly specified in these regulations, the information requested by EROs using this prescribed form is precisely the same information required by the ERO to reach an assessment as to whether an individual is eligible to vote or not. It therefore follows that, given the way in which it is currently prescribed by law, the annual canvass form has a dual function: it serves both as a mechanism for the ERO to collect information for the purposes of maintaining the register and as an application from the named individuals to join (or remain on) the register.

Box 1: The legal definition of an ERO's power to require information

23 Power to require information

(1) A registration officer may require any person to give information required for the purposes of that officer's duties in maintaining registers of parliamentary and local government electors.

(2) A registration officer is under a duty to require persons to give information required for the purposes of that officer's duty under section 3 (1) of the Juries Act 1974.

(3) If any person fails to comply with any such requisition of the registration officer as is mentioned in this regulation, he shall be liable on summary conviction to a fine not exceeding level 3 on the standard scale.

From: Representation of the People Regulations, 2001 (as amended in 2006), regulation 23.

3.17 The nature of these current legal requirements for UK electors to provide information to an ERO is regarded by international observers as the equivalent of mandatory voter registration (Franklin, 2002, 2011). However, there are some grounds to dispute this interpretation.

The Northern Ireland Select Committee (2004, para 52) suggests that 'electoral registration and voting is voluntary in the UK'. Similarly, the Electoral Commission (2006f, p.18) states that 'In the UK (...) registration in itself is not compulsory'.

- 3.18 These competing interpretations as to whether registering to vote in the UK is 'voluntary' or 'mandatory' arise from the dual function of the annual canvas form, as described in 3.15 (above). A strict, formal interpretation of the law would probably draw a distinction between the act of responding to an ERO's request for information, which is legally required, and the act of registering to vote, which is not. If such a distinction is drawn, then electoral registration could be seen as 'voluntary'. The difficulty with this interpretation, however, is that such a distinction cannot *currently* be sustained in practice, particularly because of the role of the annual canvass. As has been noted, in the specific context of the annual canvass, the legal requirement to supply information to an ERO can be argued to render electoral registration mandatory.
- 3.19 At the same time, the dual function of the annual canvass form adds a further complication. The canvass form is addressed to the 'occupier' of a property rather to individual electors. This placing of legal responsibility on the occupier (often referred to erroneously as 'the head of household') adds further uncertainty about whether registration is voluntary or mandatory, and even about whether the legal requirement to respond to the canvas can be enforced in practice. On one hand, electors can be registered by a member of their household without each elector being required to provide his/her consent. An eligible elector is registered if his or her details have been supplied to the ERO by another member of the household, as is legally required. Moreover, there is currently no legal provision enabling an individual elector to 'opt-out' under such circumstances. On the other hand, addressing the legal obligation to respond to the canvass 'to the occupier' raises evident difficulties about the extent to which this requirement can be meaningfully enforced. The obligation cannot be argued to apply to individual electors unless they are the sole resident of the property who is eligible to vote. Thus, where EROs do reach the conclusion that prosecuting for non-response may be the only remaining option, it will often be difficult to identify which member of a household should be prosecuted.
- 3.20 Partly because of the practical difficulties involved, very few EROs ever instigate prosecutions for non-response to the canvass or for refusal to supply other forms of information. In this sense, the legal requirement to provide information could be argued to lack substance. The Electoral Commission's 'performance standards' data for EROs relating to the 2008 canvass suggests there were a total of 186 prosecutions initiated for failure to comply with the annual canvass, amounting to a miniscule proportion of the households which failed to respond to the canvass.

There is no reason to suppose that the figure for 2008 is unusually low. As the Electoral Commission (2006f, p.18) notes:

although it is a legal requirement to comply with an Electoral Registration Officer's requests for information (thereby enabling them to fulfil their duties of maintaining a complete and accurate register), failures to comply are rarely penalised.

- 3.21 Given this somewhat ambiguous legal context, it is enormously difficult to gauge the impact which current regulations and practices regarding the power of EROs have on registration levels. We have no contemporary evidence about how electors respond, at the time of the canvass, to the clear statement on the annual canvass form that providing the information requested is required by law. The only recent evidence we can drawn on is the Electoral Commission's 2010 postelection survey (conducted by Ipsos MORI), which was conducted more than six months after the previous annual canvass. This survey found that 83 per cent of respondents did not believe that failure to register carried the risk of being fined (this being an incorrect assumption) (Electoral Commission/Ipsos Mori, 2010). The same survey found that only 3 per cent of those registered to vote cited reasons associated with legal requirements as the primary reason for being on the register. However, other findings in the same survey suggest that, while few electors appear to be aware of the legal requirement to respond to the annual canvass, many assume, again incorrectly, that voter registration is in some sense automatic. When presented with other 'true or false' statements about voter registration procedures, 43 per cent stated that voter registration was automatic for anyone aged over 18, while 31 per cent believed that registration was automatic upon payment of Council Tax. Neither is true.
- 3.22 If electors' understanding of registration arrangements appears at best confused, what does emerge rather more consistently from the Commission's post-election survey, however, is that the main reasons people give for registering to vote are overwhelmingly associated with them asserting either their desire, their right, or their duty to vote. In this sense, there is evidence to confirm that there is public support for the Electoral Commission's (2011b) view that 'electoral registration though not compulsory is regarded as an important civic duty'. Equally, however, the emphasis which voters appear to place on their wish to vote as a reason to register to vote also underlines the relevance of the Commission's (2011b) concerns about the proposals made in the White Paper to allow electors to 'opt-out' of being registered.
- 3.23 Pre-legislative scrutiny of the draft Bill and White Paper has led to much discussion of the extent to which the draft Bill would involve significant changes in the legal requirements associated with electoral registration (Political and Constitutional Reform Select Committee, 2011). The White Paper makes references to registration becoming a matter of 'personal choice' and to voters being permitted to 'opt out' of

the register. This wording has widely been interpreted, and criticised by some, as an attempt to re-define electoral registration as a voluntary act and to remove existing legal requirements placed on eligible electors to join the register.

Figure 4: Two competing interpretations of how the draft Electoral Registration Bill impacts on the requirements placed on electors

The draft Bill provides for legal continuity in the requirements placed on electors because:	The draft Bill redefines the legal requirements placed on electors, rendering electoral registration voluntary because:			
1. It is not currently compulsory to register to vote in the UK, although it is a legal requirement to respond to a request for information from an ERO.	1. The existing legal provisions make registering to vote in the UK mandatory in practice because of the dual function of the current, legally prescribed annual canvass form.			
 The existing legal requirement will remain for electors to respond to a request for information from an ERO. For example, it would still be a legal requirement to provide EROs with the information requested on the household enquiry form, which will replace the annual canvass form under IER. EROs would still be required, as currently, to take all necessary steps to ensure that the registers are as complete and accurate as possible. In particular, EROs would be required to contact 	 Providing the information required on the household enquiry form will no longer constitute an application to register. As a consequence, the legislation would have the <i>indirect</i> effect of removing the existing, <i>de facto</i> duty placed on households to ensure all eligible electors are registered via the annual canvass. While it would remain a legal requirement to return the household enquiry form, there would be no equivalent legal requirement placed on individuals to return a registration form. 			
from the register but potentially eligible to vote.	able to 'invite' electors to register, and electors would be able to decline this invitation by 'opting out' of the register.			
4. The 'opt out' provisions in the draft Bill apply specifically to instances where EROs contact unregistered electors to invite them to register. As noted above, there would still be a legal requirement on these electors, as currently, to respond to the ERO's request for information	4. The draft Bill makes provisions for the annual canvass to be abolished via secondary legislation (statutory instrument). If the annual canvass were abolished, it would remove the principal mechanism through which EROs currently request, and receive, information directly from electors.			

- 3.24 The legal issues here are complex, because of the need to interpret the formal provisions of the draft Bill alongside a number of indirect implications it would have for the legal framework governing electoral registration. As a result, the changes which the draft Bill would introduce in relation to the legal obligations placed on electors, and EROs, can be interpreted in two contrasting ways, as Figure 4 illustrates. One interpretation suggests that the draft Bill provides for continuity since EROs will still be required to take 'all necessary steps' to maintain complete and accurate registers and electors will still have a legal duty to provide information to an ERO, including a response to the annual canvass. A second interpretation asserts that the provisions made in the draft Bill would shift the legal context from one where registering to vote is mandatory in practice to one where it is clearly voluntary.
- 3.25 It is not possible to evaluate the relative merits of these two legal competing interpretations in the context of a literature review. Moreover, we have no means of knowing what the impact of defining any aspect of electoral registration as a matter of 'personal choice' may have on the register. Three things are clear, however. First, there are few democracies in the world which define electoral registration as entirely voluntary. Second, there is no known case of a democracy moving from some form of legal requirement to register to having no legal requirement to register (which can be argued to a de facto, although not *de jure*, change introduced by the draft Bill). Third, the distinction which IER introduces between an elector providing information to an ERO and an elector applying to join the register does alter the existing balance of incentives and sanctions in electoral registration. Given the growing number of habitual non-voters, the absence of a *perceived* legal requirement to register could clearly have the potential to depress registration levels. These points are explored further in subsequent sections of this review.

The accuracy of the registers

3.26 Evidence relating to the accuracy of the registers is far less robust than that relating to completeness, although there is partial evidence to suggest that three broad tendencies can be identified:

a. Rates of accuracy tend to mirror levels of completeness: the Electoral Commission's (2010a) case studies highlighted that the local variations in the percentage of electors not correctly registered were closely correlated with the percentage of register entries which were inaccurate. In the main, rates of accuracy were between 2 and 6 per cent higher than rates of completeness in each local authority studied. This pattern arises largely because the principal cause of both missing entries and redundant entries is the same, namely population movement. This tendency was especially clear in the Commission's

research, as the estimates were produced towards the end of a registers' lifetime, just prior to an annual canvass. A similar relationship between completeness and accuracy was highlighted in the Electoral Commission's (2011a) study, which found the April 2011 parliamentary registers to be 82.3 per cent complete and 85.5 per cent accurate. It is also noteworthy that earlier research into the state of the registers post-canvass confirmed a similar pattern. Public health research carried out in the late 1980s and early 1990s, with the primary aim of establishing the best sampling frame for health surveys, suggested that typically 6 to 8 per cent of those listed on the electoral register are not actually resident at those addresses (Bowling et al., 1989; Bickler and Sutton, 1993; Pope and Croft, 1996; Garton et al., 1996). These figures are closely in line with estimates for levels of under-registration during that time period.

b. Minor errors of recording are not especially common: in their report for the Electoral Commission, GfK NOP Social Research (2007a) estimated that 2 to 3 per cent of entries on the register in Greater London contained errors or missing information relating to the recording of the survey respondent's name or address. These types of mistake, such as typos or errors in the transliteration of details from a canvass form, are highly unlikely to prevent an elector from voting.

c. The number of registers inflated by attempts at 'roll-stuffing' is probably very small: there is very little information about the extent of fraudulent or 'ghost' names which appear on the registers either locally or nationally. While fragmented, available evidence does suggest that such problems are likely to be highly localised. Fraud cases investigated by the police and tried in the courts have generally centred on accusations of large-scale 'roll stuffing'. In the immediate aftermath of such investigations, local authorities such as Reading, Slough and Tower Hamlets have reported a substantial drop in the number of registered electors, and lower than average returns of registration forms. However, local authorities undertaking systematic 'clean up' exercises on their registers have reported great variations in the proportion of names found to be redundant (Wilks-Heeg, 2008). Datamining of eight local registers, and follow-up survey work undertaken by Ipsos MORI for the Electoral Commission (2009b), found no significant causes for concern regarding names which appeared in duplicate on individual registers, or regarding households where unusually large numbers of people were registered. In virtually all cases, such apparently 'suspicious' register entries were found to be perfectly legitimate. In addition, the case study surveys undertaken by the Electoral Commission (2010a) found little or no evidence of inaccurate entries relating to electors who were deceased, were registered at derelict properties or non-residential addresses, or had not previously lived at the address in question.

3.27 It would be misleading to assume that because levels of completeness and accuracy mirror one another, that the two somehow 'cancel each other out', thereby producing a figure for the total number of electors in any given area which is broadly correct. Additional analysis has tended to highlight that the areas with lower rates of completeness and accuracy are generally those in which the number of registered electors has failed to keep pace with the growth in the notionally eligible population over the past decade (Electoral Commission, 2010a). The Electoral Commission's case studies found this pattern to be particularly evident in the case of Glasgow, where the register was found to be only 74 per cent complete and 77 per cent accurate, and where the total number of register entries had declined over a decade, despite clear population growth. Conversely, the areas which were found to have the most complete and accurate registers tended to be those where the registered electorate had grown at the same pace as the adult population. This was well illustrated by the case of Hambleton, a sparsely populated rural district in North Yorkshire, where annual growth in the register has ensured that the register was 89 per cent complete and 91 per cent accurate (Electoral Commission, 2010a).

The experience of IER in Northern Ireland

- 3.28 Individual voter registration was introduced in Northern Ireland in 2002 as part of a wider set of reforms intended to secure the integrity of elections in the province. Under the terms of the Electoral Fraud (Northern Ireland) Act, which received Royal Assent on 1 May 2002, electoral registration in Northern Ireland was reformed as follows:
 - Voters were required to register individually and to supply three personal identifiers: their date of birth, signature and national insurance number.
 - A new register was to be compiled each year, thereby ending the practice of 'carry forward', through which names could be retained on the register for one year if those individuals had not responded to the annual canvass.
 - Provisions were introduced for rolling registration, to enable individuals to register outside of the canvass period, and bringing Northern Ireland into line with the changes introduced in the rest of the UK under the Representation of the People Act 2000.
- 3.29 The rolling programme of research undertaken by the Electoral Commission on electoral registration in Northern Ireland provides detailed evidence about the impact of IER on registration levels, including the differentials in registration levels among key social groups. In addition to the thirteen research reports produced for the Commission by Price Waterhouse Coopers, discussed in detail below, the Commission has produced a number of short 'research findings' documents based on this work (see Electoral Commission 2003, 2004, 2005a, 2006a, 2006b, 2006c, 2006d, 2007).

The impact of IER on the Northern Ireland register

- 3.30 Following a canvass of all households in the autumn of 2002, the first register compiled under the new system was published on 2 December that year. It had been assumed widely that the number of entries on the Northern Ireland would fall under the new system because of removal of redundant, duplicate names and fraudulent entries. The publication of this register appeared to confirm these assumptions. The number of register entries fell from 1,192,136 on the August 2002 register to 1,072,346 on the December 2002 register. In the context of a relatively small total electorate, this reduction in the number of register entries by 120,000 electors, (representing a 10 per cent decline compared to the August 2002 register) prompted the registration rate to fall from 96 to 86 per cent (PWC/Electoral Commission, 2003).
- 3.31 While this initial drop in the number of register entries was generally regarded as evidence that IER had been successful in cleaning up the Northern Ireland register (Electoral Commission, 2003), it became necessary to revisit this interpretation as each subsequent annual canvass saw registration levels fall further. In its review of the 2002 Act, the Northern Ireland Select Committee (2004, p.10) noted that 'a pattern appears to be emerging for the number of registered electors to decline at each canvass only to show a slow increase thereafter as a consequence of rolling registrations'. The Electoral Commission identified a steady decline in levels of response to the annual canvass under IER, which, if left unchecked, was projected to result in a 1.5 to 2 per cent decline in the number of register entries per annum, at a time when Northern Ireland's population was growing. Significantly, this evidence of a so called 'negative canvass effect' was observed, albeit to different degrees, across the whole of Northern Ireland. PWC/Electoral Commission (2004) found that from December 2002 to May 2004 there was a clear downward trend in the number of register entries across all of Northern Ireland's eighteen parliamentary constituencies. The decline was deepest in urban areas (particularly the three constituencies of Belfast West, Belfast North and Foyle), less pronounced in suburban areas and least evident in predominantly rural constituencies. Moreover, it was noted that such a decline was virtually inevitable following a canvass given that absence of any mechanism for retaining voters on the register who did not respond to the canvass (PWC/Electoral Commission, 2004) In light of these trends, the Northern Ireland Select Committee (2004, p.3) reached the following assessment:

The Electoral Fraud (Northern Ireland) Act 2002 has been successful in reducing fraud and establishing a more transparent electoral system for the people of Northern Ireland but our inquiry has uncovered a number of serious flaws in the current arrangements: The rate of voter registration has been declining at an alarming rate and stands at less than 84% of those eligible. This level is a threat to the confidence in the present electoral arrangements and action to reverse the decline is required as a matter of urgency.

- 3.32 In light of these concerns about a cumulative decline in the Northern Ireland register, subsequent research evidence added to a developing recognition of the need to make fundamental changes to the operation of IER. The Electoral Commission/PWC (2004, 2005c) established that while use of rolling registration partially compensated for canvass nonresponse, it was far from sufficient to tackle the problem of the 'negative canvass effect'. Furthermore, PWC/Electoral Commission (2005c) identified that simply dispensing with an annual canvass would not, in itself, counter the problem of declining registration levels. In particular, it was noted that 'a strategy needs to be put in place to stimulate new registrations' and that an alternative mechanism would need to be found for maintaining the accuracy of the register (PWC/Electoral Commission, 2005c, p.35). Without the latter, it was stressed, the accuracy of the registers could decline by one-third over a five year period. Given these requirements, the report highlighted international experience with systems through which there was continuous updating of the electoral roll using information from other public databases. It was proposed that, assuming a suitable infrastructure could be put in place, such an approach would enable the Electoral Office for Northern Ireland (EONI) to identify population change and allow for more proactive management of the accuracy of the registers.
- 3.33 With a general election approaching, the UK government passed a short-term measure to boost registration levels. The Electoral Registration (Northern Ireland) Act 2005 removed the legal requirement for Northern Ireland's register to be completely refreshed every year and temporarily re-instated 70,000 electors who had failed to respond to the annual canvass. To provide a longer-term solution, the Northern Ireland Miscellaneous Provisions Act 2006 dropped the automatic requirement for an annual canvass and introduced a system of 'continuous registration', whereby the EONI was granted greater powers to request data from other public agencies for the purpose of maintaining the register. Under this system, which is broadly similar to the approach to electoral registration used in Australia and Canada since the mid-1990s, the registration rate in Northern Ireland has stabilised at around 85 per cent, while the level of accuracy of the registers is estimated to be 94 per cent.
- 3.34 While the decline in registration levels has been arrested, the completeness of the Northern Ireland register appears to compare unfavourably with Great Britain, which has a notional registration rate of around 91 per cent. In making such comparisons it should be noted, however, that the registration rate for Great Britain is likely to be inflated due to the number of duplicate, redundant and fraudulent entries which remain on the registers across England, Scotland and

Wales. Indeed, the estimated 94 per cent accuracy of the Northern Ireland register is almost certainly far in excess of that found in the rest of the UK. These observations underline that there may well be a significant degree of trade-off between completeness and accuracy in the operation of any registration system. Nonetheless, the most striking feature of the introduction of IER in Northern Ireland has been the sharp fall in registration levels, which clearly appears to have exceeded initial assumptions about the effect of removing redundant and illegitimate entries from the register. Moreover, there is compelling evidence that this increase in non-registration has become particularly evident among specific social groups - as is discussed in more detail below.





Source: Calculated from ONS Electoral Statistics – 1992-2010.

3.35 One further effect of IER in Northern Ireland should also be noted. Since 2002, Northern Ireland's registers have become considerably more volatile. As Figure 5 shows, while the annual change in the number of register entries varied from 0 to 1 per cent between 1992 and 2001, the fluctuations since 2002 have been far more dramatic. Admittedly, the causes of some of the sharpest peaks and troughs shown in Figure 5 are highly specific. As noted, the 10 per cent decline in 2002 arose from the introduction of IER. Likewise, the 10 per cent increase in 2005 was the product of the decision to reinstate significant numbers of electors. Yet, even without these more dramatic swings in registration levels, the register has clearly been more volatile under IER than it was previously. For instance, the 5 per cent increase in the number of register entries in 2007 is clearly attributable to a 'looming election effect' associated with the Northern Ireland Assembly elections that year (PWC/Electoral Commission, 2008a). Under the new rules to be applied in the re-drawing of parliamentary boundaries for the 2015 General Election onwards, fluctuations of this order would represent the difference between Northern Ireland being allocated 14, 15 or 16 constituencies under the electoral quota, depending on which register were used.

Why did registration levels fall so sharply under IER?

- 3.36 As noted above, one interpretation of the decline in register entries in Northern Ireland after 2002 was that it was simply a product of cleaning-up the register. However, while the removal of redundant, duplicate and fraudulent entries from the register was logically expected to result in a decline in the total number of register entries, there was no available estimate of the scale of such inaccuracies which could be used to estimate the potential scale of the reduction under IER. Thus, the first Electoral Commission research on the changes in the Northern Ireland register under IER took the view that it was 'impossible to tell what part of the change was due to an actual increase in non-registration following the new system, and what part was due to the elimination of various sources of "inflation" in the Electoral Register under the old system of household registration' (PWC/Electoral Commission, 2003, p.62).
- 3.37 What does seem clear is that a key factor explaining much of the initial 10 per cent drop in registration levels under IER was the decision to cease the practice of 'carry forward' (Northern Ireland Select Committee, 2004). Some 10 per cent of households routinely failed to respond to the canvass under the old system of 'household' registration, but were generally given one year's grace and retained on the register until the following canvass. It has long been recognised that the use of 'carry forward' helps to maximise the completeness of the registers, but that it does so at the cost of accuracy, since at least some of the retained names will be redundant. Since the aim of the reforms was to improve the accuracy of the Northern Ireland register to eliminate fraud, the inevitable trade-off between completeness and accuracy was, in this instance, bound to lead to a partial decline in the registration rate. However, as the Northern Ireland Select Committee (2004, p.17) noted, it was important that additional measures were introduced 'to counter the unfortunate effect of a sound decision'.

3.38 In addition to the elimination of fraudulent and redundant entries and the abolition of 'carry forward', the Northern Ireland Select Committee (2004) identified three further factors which appeared to explain the decline in registration levels. The first of these was a widespread degree of voter apathy and/or alienation, which was likely to have provided a powerful disincentive to register given the additional information which was now required from electors. An April 2003 survey undertaken by the Electoral Commission revealed that, among those not registered under IER, the principal reasons cited were: 'haven't got around to it' (37 per cent); 'not interested in voting' (36 per cent) and 'couldn't be bothered' (29 per cent) (Electoral Commission, 2004, p.51). The second factor was the insufficient impact of efforts to publicise electoral registration, particularly among young people. The Commission's April 2003 survey suggested that only 68 per cent of 18 to 24 year olds were aware of the new registration arrangements, compared to 84 per cent for the population as a whole. Allied to these two factors, the Northern Ireland Select Committee (2004, p.19) suggested that the nature of individual registration itself had important consequences, and that it was 'one of the key factors contributing to the low levels of registration in certain population groups'. These points are of particular significance given the clear evidence that a number of social groups were found to be especially likely to be missing from the registers under IER. These groups included 'young people and students, people with learning disabilities, people with disabilities generally and those living in areas of high social deprivation' (Electoral Commission, 2004, p.55).

Groups 'at risk' of disappearing from the register

- 3.39 Building on the Electoral Commission's initial (2004) analysis, the Commission's extensive body of research into electoral registration in Northern Ireland has identified six groups particularly at risk of being under-represented on the electoral registers as a result of individual elector registration. These groups are as follows:
 - Young people and students;
 - People resident in areas with higher levels of social deprivation;
 - Members of black and minority ethnic groups;
 - EU nationals;
 - People with learning disabilities and/or physical disabilities;
 - Residents in communal establishments, including student halls of residents, residential care homes, etc.
- 3.40 Clearly, there will be a degree of overlap between some of these groups. In particular, significant numbers of students are residents in communal establishments, and the same will apply to some people with learning difficulties and physical disabilities. However, it is

nonetheless useful to consider the research evidence relating to each of these groups in turn:

a. Young people and students: registration rates in Northern Ireland rise steadily with age and are estimated to range from 45 per cent among 18 year olds to 97 per cent among 79 year olds (PWC/Electoral Commission, 2008b). Half of the eligible electors missing from Northern Ireland's registers are aged 34 or under, while 35 per cent are aged 17 to 24 (PWC/Electoral Commission, 2008b, p. iv). Since these age groups make up around 30 and 15 per cent of the adult population respectively, they are very much over-represented among those not registered to vote. Under-registration may well be even greater among young people who are in higher education. PWC/Electoral Commission (2007a, p.18) found that the Botanic and Windsor wards of South Belfast, covering an area with a heavy concentration of students, had an estimated non-registration rate of 74 and 62 per cent respectively. Research has also identified particular concerns about a sharp drop in the number of attainers on the register in Northern Ireland. Following the introduction of individual registration, the Northern Ireland Select Committee (2004) expressed concern that less than 25 per cent of 17and 18-year-olds were registered. Similarly, the Electoral Commission (2006d) highlighted that the 2005 canvass resulted in only 30 per cent of 17-year-olds being added to the register. After 2006, however, the problem became significantly worse. Whereas the December 2006 register included 10,500 attainers, this had dropped to just 245 in December 2007 (PWC/Electoral Commission, 2008b, p.9). Given the clear risk that many of these voters would not be added to the register when they turned 18, it was suggested that attainers represented 'a potential "moving cliff" in the age profile of the register' (PWC/Electoral Commission, 2008b, p.ii). Subsequent efforts to increase the number of attainers on the register through a programme of work with schools appear to have been successful, resulting in the registration of 10,881 2010 (ONS, 2011). This dramatic improvement attainers in notwithstanding, it would nonetheless appear likely that the great majority of eligible attainers are not currently registered in Northern Ireland.

b. People resident in areas with higher levels of social deprivation: following the introduction of individual registration, the biggest falls in the number of registered electors were in wards with the highest proportion of residents in receipt of Jobseekers Allowance or Income Support (Northern Ireland Select Committee, 2004). While there was some evidence that residents of deprived neighbourhoods were more likely to make use of rolling registration provisions, each subsequent annual canvass replicated the pattern of high levels of non-response in deprived areas. PWC/Electoral Commission (2006b, p.24) identified the 20 wards with the lowest level of response to the 2005 annual canvass, non-response ranging from 15 per cent to 25 per cent. Of these 20 wards, 16 were ranked among the 10 per cent most deprived in Northern Ireland, 17 were entirely urban, and 18 had a much higher

proportion of social housing than the Northern Ireland average. The picture that emerged from the analysis was of a 'clustering of higher non-response rates in the more deprived areas, with a preponderance of households living in social housing in urban areas or estates on the periphery of Belfast or Derry' (PWC/Electoral Commission, 2006b, p.24). There is also a clear urban-rural contrast in registration levels which appears to operate independently from levels of social deprivation. PWC/Electoral Commission (2008a, p.36) demonstrated that rural areas have significantly higher registration rates even when compared directly to urban areas with equivalent levels of social deprivation.

c. Black and minority ethnic (BME) groups: based on a survey of 500 BME residents of Northern Ireland (drawn from 59 different BME communities), the Electoral Commission (2006a) suggested that non-registration was as high as 60 per cent across these groups. By contrast, the Commission's research at that time suggested that under-registration among BME communities in England and Wales was around 17 per cent, albeit with significant variations between different minority ethnic groups.

d. EU nationals: there were 5,619 citizens of other EU member states on the Northern Ireland electoral register in December 2007, a significant increase on the 1,293 EU nationals who had been registered in September 2003 (PWC/Electoral Commission, 2008c, p.iv). However, highly indicative estimates, produced by comparing these figures against other indicators of immigration from the EU, suggest that between two-thirds and three-quarters of EU national are not registered to vote in Northern Ireland. Moreover, among EU nationals originating from the accession member states, non-registration is likely to be as high as 80 per cent (PWC/Electoral Commission, 2008c, p.v).

e. People with learning disabilities and/or physical disabilities: provisions were made in the Electoral Fraud (Northern Ireland) Act 2002 for registration forms relating to electors with learning disabilities to be completed by another individual. The Electoral Commission (2004) identified that EONI had written to around a thousand such 'attestors' to seek to verify whether the named voter had 'sufficient mental capacity to be capable of making a choice for themselves regarding whom they wish to vote for'. Since only 120 responses were received providing such confirmation, the Electoral Commission (2004) expressed concern that the provisions may have impacted inadvertently on people with learning disabilities, thus effectively disenfranchising hundreds of people with learning disabilities who may have voted in the past. Electoral Commission research also found that disabled people were twice as likely not to be registered owing to difficulties which they experienced with completing the required forms (cited in Northern Ireland Select Committee, 2004).

f. Residents in communal establishments: the Electoral Commission (2005a) highlighted concerns that registration rates appeared to be as low as 20 per cent in hostels and long-stay medical establishments, that uptake was equally poor in army barracks, and that relatively little had been done to ensure that students living in halls of residence were registered (since it was assumed that they would be registered at a parental address). Furthermore, a clear correlation was identified between wards with the lowest registration rates and 'presence in those Wards of communal establishments such as army bases, prisons and student halls of residence' (Electoral Commission 2005a, p.3). These findings raised concerns about the apparent inconsistency of registration practices for communal establishments, such that 'there appears not to exist any common procedure for registering residents across the range of establishments and feedback during the process indicated that these practices can vary greatly'.

3.41 Much of the evidence regarding to 'at risk' groups relates to the early period of IER in Northern Ireland. For instance, most research evidence about levels of registration among black and minority ethnic groups appears to be from 2006. Likewise, there seems to be little additional information available regarding the concerns raised in 2004 about registration among those with learning disabilities and physical disabilities. It is possible that some of the problems identified above have since been remedied to at least some degree. Thus, the particular difficulties associated with registering attainers in the absence of an annual canvass have been partially addressed, although rates of registration among young people and students appear to remain extremely low. Overall, it seems unlikely that there has been a general improvement in rates of registration across all of the groups identified above. As has already been noted, the introduction of continuous registration and provisions for data-sharing appear to have been successful in stabilising the register, but not in 'growing' it. It is, therefore, by no means clear how much progress EONI has been able to make in ensuring that 'at risk' groups do not disappear from the register under IER.

The UK electoral registers in comparative perspective

- 3.42 While the available literature on electoral registration overseas is relatively scant, it is sufficient to establish that there are clearly valuable insights which can be drawn from international comparison. In particular, it is possible to identify:
 - three broad approaches to registration internationally and consider their relative merits, including the extent to which they produce complete and accurate registers;
 - agreed international standards about the principles which any system of electoral registration should seek to adhere to and the outcomes to which it should aim to aspire;

• lessons from other countries which have recently undergone a similar transition in their systems of electoral registration to that proposed for Great Britain.

Approaches to electoral registration overseas

- 3.43 There are three principal approaches to electoral registration which may be identified internationally (ACE Electoral Knowledge Project, undated). The first method is that of compiling a 'periodic list' of electors and is most commonly found in English-speaking democracies. This involves the production of a fresh electoral register either annually or for each electoral event. This list is generally compiled via house-to-house enumeration (referred to in the British context as the 'annual canvass of electors'), although some countries may require voters to register in person with the authorities. The second method may be described as the maintenance of a 'continuous' list' of electors and has emerged in a relatively small number of countries which have sought to move away from the periodic list system, notably Canada, Australia and Northern Ireland. While the specific details vary, the approach adopted in these three countries is one of maintaining and updating the registers with information available on other public databases. The third method is the approach adopted in much of continental Europe, whereby the register for each election or referendum is derived from a comprehensive population register or 'civil registry'. Registration with public authorities is compulsory under such systems, including a legal duty being placed on citizens to update their details if they move house. Figure 6 provides an overview of each of these three contrasting approaches.
- 3.44 It is possible, of course, for approaches to electoral registration to constitute hybrids of the systems outlined in Figure 6. It is especially noteworthy that, while Britain has been classified here as operating a 'periodic list' system, the manner in which the electoral registers are compiled in Great Britain already includes elements of the continuous list system. The maintenance of electoral registers in Britain is by no means wholly reliant on the annual canvass of electors, for instance. EROs receive notifications of deaths from local registrars, which they use to remove names of deceased electors from the electoral register. More generally, EROs can (and should, by law) also access other records held by their local authority (such as the Council Tax register), as well as request data held by other public bodies, or indeed any individual or organisation, for the purpose of updating the register. It should also be noted that the electoral registers are updated monthly in the period between each annual canvass, and that eligible electors can apply at any such time to be added to the register or to have their details amended via the 'rolling registration' mechanism. The expectation that EROs should make use of other data sources in maintaining the register and promote the use of rolling registration is

reflected in the Electoral Commission's Performance Standards framework.

- 3.45 Figure 6 also summarises the main advantages and disadvantages of the three principal approaches to voter registration. The pros and cons of the different models largely centre on issues of: cost and available resources; whether or not a suitable infrastructure to support datasharing exists; and the extent to which privacy issues among citizens are a major concern. Since the significance of these issues will vary from one country to another, it would be misleading to assert that any one of the three approaches is inherently superior. Certainly, as Figure 6 suggests, the use of a civil registry produces consistently high rates of electoral registration among those countries adopting this approach. Yet, Figure 7 also shows that registration rates of 90 per cent plus can be produced by any one of the three approaches. The real question which arises from the comparisons made in here is why levels of voter registration appear to vary so considerably among countries adopting either the 'periodic list' or 'continuous list' systems.
- 3.46 As Figure 7 highlights, electoral registration rates in the USA are generally recognised to be among the lowest in OECD countries. Estimates provided by the US Census Bureau show that registration rates in the USA fluctuated between 67.5 and 72.0 per cent from 1994 to 2006 (File, 2008). Highton (2004) notes that in some districts there are administrative barriers which act as strong disincentives to registration, such as the remoteness of registration locations and the requirement to complete lengthy and often complicated forms. The absence of such barriers in other English-speaking countries, notably Canada, New Zealand, Australia and the UK, offers one potential explanation as to why levels of electoral registration are higher in these countries.
- 3.47 There are two further issues raised by international comparison which may help us to understand this degree of variation among countries adopting similar voter registration systems. These are, first, whether voter registration is mandatory or voluntary, and, second, the related question of whether governments take a passive or an active approach to registering voters. There is at least some evidence to suggest that both voluntary registration and a passive approach to registering voters may serve to depress registration levels.
- 3.48 It seems self-evident that voluntary registration is likely to depress registration levels and, perhaps for this very reason, mandatory registration is very much the international norm. In a study of electoral participation in 40 countries, Franklin (2002) found that voluntary registration was essentially restricted to the USA, France and a few Latin American countries. Among the 22 countries globally which have been electoral democracies since the 1940s, only the USA and France have an entirely voluntary system of voter registration (Franklin, 2011). Given the very small number of cases of fully voluntary registration, it is

difficult to draw any firm conclusions. However, it is again noteworthy that the USA has the lowest registration of any established democracy. Moreover, despite performing relatively well by international standards, France appears to have one of the lowest registration rates in Western Europe.

3.49 Similarly, at least some clues about the potential impact of active versus passive approaches to registration may be gleaned from Rosenberg and Chen's (2009) comparison of voter registration arrangements in the USA with those in 16 countries and four Canadian provinces (see Figure 7 for the full list of countries and provinces). Among the cases they studied, Rosenberg found that, in addition to the USA, only four countries placed the onus for initiating registration almost solely on the individual - the Bahamas, Belize, Burundi, and Mexico. Once again, based on a small number of known cases, it is difficult to assess the extent to which making registration a matter of personal responsibility serves to depress registration rates. Rosenberg and Chen (2009) found registration rates among the cases they studied to be lowest in the USA (68 per cent) and the Bahamas (75 per cent), yet Belize, Burundi and Mexico all have registration rates of 91 per cent or more. Nonetheless, Rosenberg and Chen (2009) suggest that the comparatively high rates of voter registration found in many European and 'Westminster' democracies arises from governments taking an active approach to the registration of electors in these countries. The same authors also underline that, in many cases, this active approach to voter registration involves the adoption systems of 'carefully regulated data-sharing between government agencies' (Rosenberg and Chen 2009, p.3).

Figure 6: A typology of approaches to electoral registration

	Periodic List	Continuous List	Civil Registry
How does it work?	A new electoral register is prepared either annually or prior to each election. The list may be compiled via house-to- house enumeration ('canvass') or by requiring voters to register in person.	Electoral administrators add or delete electors from the electoral register, or update electors' addresses, based on information obtained from other public agencies (e.g. those registering deaths, issuing passports or driving licenses, processing tax returns and so on).	Public authorities maintain a registry of all citizens (name, address, age, nationality) and the register for each electoral event is derived from this list, depending on eligibility to vote in that type of election.
What are the advantages?	Useful if population mobility is high or where there is insufficient infrastructure to maintain a continuous list. Can be highly effective in updating the registers in light of population movement.	Can be highly efficient and cost-effective <i>if</i> other public databases already capture changes of address, persons becoming eligible to vote, etc. and <i>if</i> this information can be shared effectively.	If civil registry is already in place, compiling an electoral register is straightforward and cost- effective. If civil registry is comprehensive and accurate, electoral register will be too.
What are the disadvantages?	Coverage of the register may be poor, especially if there is no, or limited, house-to-house enumeration. House-to-house enumeration can be relatively expensive and time-consuming. Completeness and accuracy of registers will decline if the register is compiled some time in advance of an election.	The system will only be viable <i>if</i> there is a wider infrastructure in place to enable data-sharing. If there is public hostility to data-sharing, it may be necessary to include 'opt-out' provisions which undermine how effective the system will be in producing a register which is as complete and accurate as possible.	This option will require very substantial investment if there is no civil registry already in place. There may also be concerns among citizens about privacy and about the potential loss or misuse of personal data which make it difficult to introduce or operate a civil registry.
Which countries use this system & what are their registration rates?*	Great Britain (86%/97%), Indonesia (94%), and USA (67%).	Canada (93%), Australia (92%), France (91%), and Northern Ireland (84%).	Most EU countries, including Sweden (95%), Germany (93%), Belgium (94%), and Austria (93%).

Notes: 1) Given that EROs in Great Britain already make use of other data sources to maintain the register, and voters can register outside the canvass period via rolling registration, the existing system in Great Britain can be argued to be something of a hybrid between a 'periodic list' and a 'continuous list' system. 2) The registration rates cited above represent the number of register entries divided by the voting age population. In some cases this method of calculation may significantly over-estimate registration rates. In the case of Great Britain, the registration rate cited by Rosenberg and Chen (97 per cent) is known to be significantly above that produced via surveys or matching register entries against census records. The alternative 86 per cent figure for the registration rate in Great Britain is the mid-range estimate provided by the Electoral Commission (2011a).

Sources: Derived principally from ACE Electoral Knowledge Project (undated), with additional detail from Rosenberg and Chen (2009, p.10) and Electoral Commission (2010a; 2011a).

Figure 7: A spectrum of how countries build voter rolls, with voter registration rates (2004-08)



Source: Rosenberg and Chen (2009), pp. 2-3.

International standards for voter registration

3.50 Despite considerable variation across democracies globally in how the task of registering voters is approached, some clear international standards for electoral registration can nonetheless be identified. International IDEA provides the clearest statement of such a standard:

The international standard for voter registration is that the register must be comprehensive, inclusive, accurate and up to date, and the process must be fully transparent. The process should facilitate the registration of a qualified voter, while at the same time safeguarding against the registration of ineligible persons (International IDEA, 2002, p.45).

3.51 In defining this standard, International IDEA does not prescribe how voter registration should be approached. It is recognised that the legal framework may either ascribe primary responsibility for registration to the individual, to the state, or to a combination of the two. Likewise, there is no assumption as to whether registers should be updated via house-to-house enumeration (i.e. a canvass) or through the management of lists of electors in conjunction with other public records, notably population registers. In addition, International IDEA recognises that the task of managing the electoral register may rest with local authorities or with a central state agency. Yet, however the task is approached, the goal of electoral registration in a democracy remains the same - namely, to 'facilitate and protect the right of citizens of legal age to register and prevent unlawful or fraudulent registration' (p.47).

Based on these principles, International IDEA provides a checklist for voter registration, as outlined in Box 2.

Box 2: International IDEA's Checklist for Voter Registration

□ Does the registration process provide for accurate voter registers? Is the process itself transparent?

□ Does the legal framework contain provisions for regular and timely updating of voter registers before an election?

□ Are the requirements for voter registration stated in clear and unambiguous language?

Does the law clearly identify what documents are necessary to register as a voter?

□ Are the provisions for challenging a registration decision stated in clear and unambiguous language?

Is the time period for challenging a registration decision clearly stated?
 Are voters protected from the wrongful disclosure of personal data?

Source: International IDEA (2002, p.47).

- 3.52 It should be noted, however, that this checklist largely makes reference to the process of voter registration in relation to the accuracy of the register. However, as noted above, International IDEA goes further than this in specifying that maximising the completeness of the register should be a clear goal. The ACE Electoral Knowledge Project (undated) suggests 'a proper registration system seeks to prevent or at least minimize the exclusion of eligible voters. The priority should be to register all eligible voters. In practice this cannot be fully achieved, but it should provide the impetus for setting very clear performance criteria by which to measure success in approaching universal registration'.
- 3.53 Likewise, existing international standards for electoral registration say relatively little about whether voter registration should be voluntary or mandatory. However, as was noted above, very few established democracies operate systems of voluntary registration. Moreover, the ACE Electoral Knowledge Project (undated) has expressed concern that voluntary registration appears likely to reinforce the tendency for under-registration to be significantly higher among some social groups. The ACE project's encyclopaedia also suggests that where electoral registration arrangements fail to provide for a sufficiently broad base of electoral participation, this may serve to undermine the legitimacy of electoral outcomes.

International experience with reforming voter registration

3.54 There are relatively few cases of established democracies engaging in major reforms of their voter registration procedures in recent decades. However, during the 1990s, both Australia and Canada moved away from producing periodic lists using house-to-house enumeration to a

continuous list system based upon updating the register from other data sources. The decision to move from an annual canvass in Northern Ireland to a system of 'continuous registration' in 2005 was, to a significant degree, based on lessons drawn from the experience of these two countries.

- 3.55 There are some important differences between the way voter registration is managed in Australia and Canada. In Australia, registration is mandatory by virtue of the country's policy of compulsory voting, placing a notable degree of responsibility on the citizen to register, whereas, in Canada, registration is automatic (Brent, 2008). However, both countries have adopted similar approaches to maintaining the completeness and accuracy of their electoral registers based principally on matching data from a range of different sources (PWC/Electoral Commission, 2005c). In Canada, these data sources include the records derived from tax returns and applications for child tax benefits submitted to Revenue Canada, details held by provincial agencies administering health insurance, and information held by Canada Post (Rosenberg and Chen, 2009). In Australia, data matching of records held by agencies tasked with social security, utilities and motor vehicle licensing, Australia Post, and others is used to undertake 'continuous roll updating' (Brent, 2008; PWC/Electoral Commission, 2005c). In both cases, the focus of data-matching techniques is on identifying electors who have become eligible to vote as well as those who have changed their address (PWC/Electoral Commission, 2005c).
- 3.56 While both Australian and Canada boast comparatively high levels of electoral registration, there are some clear differences in the outcomes which the two systems achieve with regard to the accuracy of the registers. Australia's register is estimated to be 95 per cent complete and 90 per cent accurate, whereas Canada's register was estimated in 2004 to be 95 per cent complete but only 83 per cent accurate (PWC/Electoral Commission, 2005c).
- 3.57 Higher levels of concerns about privacy in Canada are likely to explain part of the reason for the comparatively low level of accuracy in its electoral register. The Australian system is, in effect, very similar to a continental European population register, with citizens feeling a relatively strong sense of legal and civic obligation to update their details, and public authorities being proactive in their use of datamatching techniques to maintain a detailed record of who lives at each residential address in Australia. The updating of records in the Canadian system relies on individuals submitting personal information to other agencies and then providing consent for this data to be passed on to Elections Canada. However, this consent is not always forthcoming. For instance, in the 1997/98 tax year, 5 per cent of people submitting information to Revenue Canada refused to supply such consent, while a further 11 per cent failed to tick either the box indicating consent or the one refusing it (PWC/Electoral Commission, 2005c, p.29). Clearly, if information such as a change of address does

not reach Elections Canada because consent has not been forthcoming, incorrect register entries risk being left unchanged.

3.58 While compulsory registration (and voting) in Australia is regarded as part of the reason for the comparatively high levels of completeness and accuracy of the country's electoral rolls, it is far from the whole explanation. Citing the Australian Electoral Commission's (AEC) 2004/05 annual report, which found that 60 per cent of changes to the roll arose from continuous roll updating, PWC/Electoral Commission (2005c, p.32) suggested that 'even with compulsion, the registration process still needs a very proactive approach to management'. Australia faces ongoing difficulties in ensuring high levels of registration among younger voters, with some 400,000 voters aged 18 to 25 estimated to be missing from the roll (Saha and Print, 2009, p.2). Moreover, there is evidence that the growing reliance on data-sharing to update the registers has prompted a gradual overall decline in registration levels. Brent and Jackman (2007) highlight that enrolments failed to keep up with population growth between 2002 and 2006, and that there was an absolute decline in the number of registered voters between 2005 and 2006. In a subsequent paper, Brent (2008) offered the following explanation for this pattern:

the high quality of information has a lopsided effect on the electoral roll, because it means the AEC is getting much better at taking people off the roll, but not at putting them on. When the Commission finds out someone has moved, they take them off the roll. But they are not able to do the same at the other end; they can't put the person on the roll at their new address. Instead, the most they can do is send a change of address/enrolment form with a sharp reminder that enrolment is compulsory in this country. And many people are not returning these forms (Brent, 2008, p.3).

3.59 Experience from Australia and Canada is of particular interest to the UK because both countries have replaced their periodic list systems, based on house-to-house enumeration, with a continuous list system centred on data-matching and sharing. That the use of data-matching techniques can achieve a level of completeness comparable to a canvass of households is clear (Black, 2000, 2003). However, in the Australian case, it is apparent that such an approach falls some way short of producing universal registration and fully accurate voter rolls, even within the context of compulsory voting. In the case of Canada, the perceived need to allow citizens to 'opt-out' of data-sharing arrangements appears to have made it more difficult to maintain registers with a very high degree of accuracy.

4. Gaps and shortcomings: an overview of neglected issues and methodological problems

- 4.1 The fragmented nature of the literature on the electoral registers has given rise to a number of neglected areas within the literature. In some instances, these are issues which are raised in the literature but have not become a sustained focus for research. To a degree, this is because there are particular research questions which have proved difficult, if not impossible, to address using available data sets, techniques and resources. However, more commonly, gaps have arisen because of a straightforward lack of continuity in the literature, rather than from methodological problems being identified within existing research.
- 4.2 The other obvious pattern in the literature is that, with the exception of work analysing the 'Poll Tax effect', a number of important connections to wider social, economic and political trends have been missed. This failure to link research into the electoral registers to wider bodies of knowledge in the social sciences is likely to arise from the inevitably technical and specialist nature of research into the registers, which may serve to narrow its field of influence.

Neglected issues which are 'internal' to electoral registration

4.3 There are three specific issues internal to the existing literature which may be argued to have been insufficiently developed. The first of these is a highly specific concern, albeit one with a significant bearing on the production of estimates relating to completeness and accuracy of the registers. Attempts have been made to ascertain the extent to which the electoral registers contain inaccurate information, such as ineligible electors appearing on the registers or eligible electors being registered at an incorrect address. However, at no point has any research study derived an estimate of the extent to which there are duplicate entries on the registers (although the Electoral Commission (2009) did demonstrate how data-mining techniques could be combined with house-to-house surveys to identify duplicates). There are many reasons why this task has not been attempted. Aside from the methodological difficulties of searching for, and identifying, duplicate entries across hundreds of separate local registers, any such research would also need to distinguish between legitimate and illegitimate forms of duplicate entry (the former include students living away from the parental home during term-time and those with second homes). However, in relation to wider debates about the registers, the lack of capacity to identify duplicates is a potentially significant problem. While the proposed Coordinated On-Line Register of Electors (CORE) could have made an important contribution to addressing this concern, the White Paper proposes to bring an end to this project, long-stalled at an early stage of its development.

- 4.4 The second issue is one which constituted a central focus for registration research in the 1990s, but has since been sidelined. Despite the evidence summarised in Section 3, there has been a lack of attention in recent years to assessing the impact of particular methods of running the annual canvass on registration rates. The absence of such research has possibly led to elements of best practice in electoral registration being overlooked. It is also possible that the 10 year gap between the last OPCS survey of how EROs compile the register and the first Electoral Commission survey of EROs on performance standards could have resulted in a significant loss of wider knowledge on the state of the registers. One striking gap in our current knowledge is that we have very little idea of the reasons why large numbers of habitual non-voters remain on the registers. For those eligible electors with apparently little or no intention of voting, is the motivation for being registered associated with the use of the register for credit purposes, or do such individuals continue to register out of some sense of legal or moral obligation?
- 4.5 The third shortcoming which may be identified within the literature is a tendency for existing research to offer insufficient analysis of the interaction between a range of factors influencing registration rates. For example, little or nothing is known about the possible interactions between canvass methods and socio-demographic characteristics of local populations, particularly in deprived inner-urban areas, and how these influence registration rates. As such, the literature offers only limited scope to identify the principal causal factors influencing registration rates and, in particular, to assess the reasons for variations in the registration rate between local authorities. To take an example, Liverpool and Glasgow are cities of a similar size and with very similar socio-demographic profiles. Yet, evidence suggests that the registration rate in Liverpool is several percentage points higher than in Glasgow. To what extent can this differential be explained with reference to how electoral registration is managed or resourced in these two cities? The lack of attention to such issues highlights, in turn, a neglect of the wider influences on electoral registration, as discussed below.

Neglected issues relating to wider social, economic and political trends

4.6 One of the primary shortcomings of research on the electoral registers is that it contains little or no recognition that changes in registration rates are also influenced by variables which have no direct connection to electoral registration or even to politics. A variety of factors which are clearly 'external' to electoral registration are likely to have an important bearing on registration rates and may be particularly significant where improvements have been observed. For instance, young people are less likely to vote than their equivalents 20 years ago, but are significantly more likely to apply for credit cards, store cards or personal loans. To do either, they will need to be on the electoral

register. Likewise, it is at least feasible that *falls* in registration may also be related to the use of the electoral registers in credit checks. Mapping the fall in registrations from the early 2000s against the rise in personal insolvencies suggests a fairly close relationship between the two – a pattern which would suggest that registrations may fall as a result of individuals seeking to evade payments of debts (Electoral Registration, 2010, p.45). While it is difficult to disentangle such effects from the impact of other factors, such as changes in the way the annual canvass was conducted, or declining interest in politics (see below), the possibility of such influences on electoral registration must be considered in future research.

4.7 Similarly, it is crucial to note that the completeness and accuracy of the electoral registers are influenced by wider policy change, including legislation which has little or nothing to do with electoral registration directly. The impact of the Community Charge ('Poll Tax') on electoral registration levels has already been discussed, but other indirect policy influences may also need to be recognised. For instance, the concerted efforts made by the Home Office and OPCS to increase registration rates during the 1990s appeared to be disrupted by electoral reforms introduced after 2000, after which registration levels have seemed to drop quite dramatically. For a number of years, the emphasis of policy switched from monitoring the completeness of the register and towards the introduction of new forms of 'remote voting'. The pressure on local authorities to find 'efficiency savings' in the early 2000s may also have been significant at this time. With postal voting on demand placing additional pressures on electoral administrators, there is some evidence that reducing expenditure on the annual canvass was seen as a way of releasing resources for the management of postal voting. One way of achieving the savings required was to switch to an all-postal canvass, as a recent Electoral Commission report notes:

> The proportion of local authorities which switched to an allpostal canvass during 2000–6 is not known, but the practice appears to have been relatively widespread and the likely consequences well known to EROs. One local authority report from this period justifying the move to an all postal canvass noted that stopping the use of personal canvassers would result in cost-savings of around £15,000 but would see a 'potential drop in response of 5–8% (Electoral Commission, 2010a, pp.42-43).

4.8 A second issue relating to wider social trends concerns the link between non-registration and social exclusion. It is widely recognised that non-registration is concentrated among specific social groups, some of which would typically be defined as 'socially excluded'. However, the nature of the relationship between social exclusion and electoral registration has been insufficiently explored. This is a surprising tendency for two reasons. First, the social groups which tend to be under-registered also tend to be geographically concentrated in areas which have been heavily targeted by government regeneration programmes and local authority anti-poverty strategies, both of which have generally defined greater community involvement in local decision-making as a key objective (Wilks-Heeg, 2003). Second, there is overwhelming evidence to suggest that the groups in which underregistration is most prevalent are also those in which levels of participation in all forms of civic and political activity are lowest. The failure to link under-registration to social exclusion policy therefore reflects a wider failure to recognise the links between various forms of political, economic and social inequality.

- 4.9 The issue of the relationship between socio-demographic determinants of under-registration and (evidence of) wider differentials in political participation among different social groups merits some elaboration. It is widely accepted that the two most obvious factors influencing whether people vote are age and social class. Surveys conducted since the 1970s have consistently demonstrated higher levels of abstention among younger voters, while more recent surveys have found that those in professional and managerial occupations are significantly more likely to vote than those in manual occupations (Denver, 2007). Turnouts among different ethnic minority groups also vary significantly, with white British voters far more likely to vote than members of most ethnic minorities. These differences in electoral participation are, unsurprisingly, also reflected in variations in levels of electoral registration among different groups, although it would appear that differences in registration levels by social class are relatively minimal (Electoral Commission, 2011a).
- 4.10 Significantly, surveys conducted during the last four general elections by the polling agency Ipsos MORI suggest that these differences in turnout between different social groups are widening. Figure 8 illustrates these patterns with reference to social class, showing that self-reported turnout among those in the highest social classes (A and B) was 79 per cent in 1997, but only 66 per cent among eligible voters from social classes D and E. However, at each subsequent general election this differential has widened. By 2010, turnout among voters classified as ABs was reported to be 76 per cent, compared to only 57 per cent among those from social classes D and E. Thus, the difference in turnout between those in social classes AB and those in classes DE rose steadily from 13 to 19 percentage points in the period from 1997 to 2010.





Source: Ipsos MORI (1997, 2010); Electoral Commission (2005c)

- 4.11 Table 5 shows that self-reported turnout among those aged 65 and above was 28 percentage points higher than among those aged 18-24 in 1997. This differential had increased to 38 percentage points by 2005 (although a notable increase in turnout among younger voters served to reduce the gap to 32 points in 2010). While data relating to turnout among ethnic minority groups is only available for 2001 and 2005, making is harder to discern any trends, Table 5 also makes clear that white British voters are significantly more likely to vote than members of ethnic minority communities.
- 4.12 These patterns of differential levels of election turnout across different social groups are replicated across other fields of political activity. The Hansard Society's Audit of Political Engagement, carried out annually from 2003 to 2009, seeks to measure the proportion of the population who claim to have engaged politically by signing petitions, discussing politics with someone else, contacting an elected representative, attending a political meeting, or various other forms of activity. While fewer people participate in these wider forms of activism than vote in elections, the contrasts in participation levels between different social groups are even greater. Figure 9 shows that members of social classes A and B are twice as likely to report that they have signed a petition, and three times as likely to have discussed politics with someone else, than members of social classes D and E. In short, the

sociological divisions apparent in electoral registration are replicated across almost all fields of political engagement.

	1997	2001	2005	2010			
TOTAL	71	59	61	65			
Age							
18–24	51	39	37	44			
25–34	64	46	48	55			
35–44	73	59	61	66			
45–54	79	65	64	69			
55–64	80	69	71	73			
65+	79	70	75	76			
Ethnicity							
White		60	62	n/a			
Ethnic minority		47	47	n/a			

Table 5: Estimated turnout in general elections by age and ethnicity 1997-2010

Source: Ipsos MORI (1997, 2001, 2010); Electoral Commission (2005)



Figure 9: Participation in high frequency political action, by social class, 2009

Source: Hansard Society (2010)

In light of the wider influences on electoral registration levels, it is also 4.13 important to note one final issue which has received insufficient attention – attitudes towards electoral registration. While attitudes towards registration have been ascertained via surveys reported in the literature, there has no sustained focus on public opinion in registration research. As a result, it is difficult to establish whether fluctuations in registration levels are reflected in changing public attitudes towards 'officialdom' or towards the political process. The Electoral Commission (2010a) highlights that the period from 2001 to 2005 not only saw a sharp drop in electoral registration, but in turnout in all elections and in the proportion of UK residents reporting any interest in politics. Yet, the Commission's report recognises that, in the absence of further evidence, this is effectively one of several competing hypotheses which might explain why registration levels fell. The survey work which has been undertaken does not sufficiently explore the links between electoral registration and wider patterns of social and political engagement discussed above. These are issues which those undertaking or commissioning research on electoral registration may wish to consider in developing future research plans.

Methodological issues

4.14 Despite the relative consistencies in the evidence about the completeness and accuracy of the registers, highlighted in Section 3, it is widely accepted that there are serious methodological difficulties associated with researching the electoral registers. Indeed, it is not an exaggeration to say that all current approaches to estimating the completeness and accuracy of the electoral registers are, at best, imperfect and, at worst, seriously flawed. Given these issues, the remainder of this section summarises some of the principal methodological difficulties highlighted by existing research into the state of the registers. It also highlights some particular challenges associated with undertaking research in relation to the transition to IER and offers some possible, albeit limited, solutions to some of the problems identified.

Two core problems: denominators and numerators

4.15 There are two core sets of problems raised by research into the completeness and accuracy of the UK's electoral registers. The first set relates to the difficulties involved in establishing what statisticians would describe as the 'denominator', i.e. the total number of people eligible to register to vote. In the absence of a single population register, the most accurate estimate for the number of adult residents in the UK can only be derived from the decennial census of population. As we note below, not only are there concerns about the coverage of the last two censuses, but it has also proved difficult to identify from census returns alone those adults who are ineligible to vote on the grounds of nationality. Moreover, while denominators for local

registration rates could be derived from other sources – such as NHS patient lists or council tax registers – the same problems of coverage and eligibility would apply to these sources, and almost certainly on a greater scale.

- 4.16 The second set of difficulties concern the most reliable means of establishing the 'numerator' for registration statistics, i.e. the number of individuals who are actually (and correctly) registered. Statistics are published annually by ONS showing the total number entries on the registers nationally and locally, including figures for the numbers of attainers, service voters, voluntary patients and overseas voters. Moreover, these statistics distinguish between the electorate for local and European elections (which include citizens of other EU member states) and the electorate for parliamentary elections (which does not).
- However, the number of entries on the registers cannot be assumed to 4.17 equate to the number of registered voters. UK electoral law currently permits eligible voters to register to vote in two or more localities under particular circumstances - for instance students who have both a 'home' and 'term-time' address, or owners of second homes. As such, the figure for the total UK electorate will include a number of duplicate entries across different local registers. In addition, current provisions allow EROs to 'carry forward' names from the previous to the current register where no canvass form has been returned from a household but the ERO believes there may be grounds to maintain the relevant name(s) already on the register for this household. Again, at least some of these entries will represent duplicates where the individuals in question have registered in another local authority district. In periods when guidance to EROs has emphasised the need to maximise registration levels, significant numbers of entries are likely to have been carried forward in this way. As a result, the number of entries on the registers will clearly be higher than the number of people registered to vote – although there is no current means of quantifying the extent to which the number of entries over-estimate the number of registered electors.

The benefits and limitations of using census returns

4.18 The most accepted method for estimating the completeness of the electoral registers nationally is to match census returns against the electoral register in force at that time. This was the preferred method used to estimate the coverage of the registers in 1981 and 1991. However, the timing of cross-comparisons with the census is crucial. Ideally, these checks need to be made at the time when census analysis is being completed, and it was established in 2004 that it would be very difficult to carry out such checks retrospectively. The Electoral Commission's (2005b) study dealt with this difficulty by making use of supplementary use of records from the Labour Forces Survey (LFS). While there have been some concerns about whether the estimate for the completeness of the register in 2001 is consistent

with the methods used to produce earlier census-based estimates (Committee for Standards in Public Life, 2007), most statisticians would agree that the approach taken to assessing the 2000/01 register is perfectly credible and, in some ways, has advantages over the use of census records alone.

- 4.19 Even allowing for the above, using the census to estimate the completeness of the electoral registers does have three obvious limitations, as follows:
 - missing census returns and missing entries in the electoral registers are likely to relate to the same individuals;
 - past census design has not enabled researchers to identify UK residents who are ineligible to vote;
 - the exercise can only be repeated every 10 years.
- The first two of these limitations underline the issues highlighted above 4.20 about the use of the census to derive a denominator for register estimates. These limitations will hopefully be overcome by an improved coverage and the inclusion of 'nationality' questions in the 2011 Census. However, the extent of the problems associated with the coverage of the 1991 and 2001 Censuses suggest that significant gaps are likely to remain (Dorling and Simpson, 1993, 1994; Dorling, 2007). It has been suggested that there may have been a million people or more missing from the past two censuses (Dorling, 2007). There are reasonable grounds to assume that missing records will also overlap i.e. that many individuals who did not complete a census return are also unlikely to appear on the electoral register. It is notable in this regard that the gaps in the 2001 Census were most obvious in metropolitan areas, with young men most likely to be absent from the census count. Census returns from Inner London were estimated to be 88 per cent in 1991, but fell to 78 per cent in 2001 - compared to a national average of 94 per cent. Register checks based on the census therefore risk artificially inflating estimates for the coverage of the electoral registers because it is likely that the denominator is underestimated, although it is possible that the Census Coverage Survey, which seeks to estimate the extent and profile on non-respondents, may mitigate this problem to some degree.
- 4.21 Notwithstanding all of these issues regarding census-based estimates, this approach currently offers the most effective way of estimating both the completeness and accuracy of the registers on a reasonably regular basis. In particular, comparison against the census provides the fullest insight into variations in the registers geographically and across different social groups. ONS will be carrying out such an analysis of the December 2010 register for the Electoral Commission within the next two years, and these findings will play an important role in the task of monitoring the impact of the transition to IER alongside the evidence

from the national survey being conducted by Ipsos MORI for the Electoral Commission in late 2010.²

4.22 As a result of recent methodological refinement, national surveys of electoral registration may well come to replace census-based estimates as the key measure of the completeness and accuracy of the registers (see below). The need to monitor the registers in the transition to IER underlines that additional techniques are needed to provide estimates between censuses, and to provide annual updates to any baseline indications of the state of the registers produced via comparison against the census. The current approach to providing annual estimates is to derive them by calculating registered voters as a proportion of the estimated adult population. While relatively straightforward, this approach requires a large number of caveats to be added. In particular, as with census returns, the use of mid-term population estimates as the denominator replicates the problem that the proportion of the adult population who are eligible to vote cannot be identified. The problems with the numerator also remain the same: no account can be taken of redundant names on individual local registers or duplicate entries across different electoral registers. The most obvious way of overcoming these problems, as is noted below, is to undertake regular large-scale, house-to-house surveys.

The scope and limitations of alternative approaches

- 4.23 There are two current alternatives to these approaches for estimating completeness and accuracy. The first is to derive estimates from national (or local) surveys of a representative or random sample of electors. The second is to match a sample of entries on electoral registers, either nationally or locally, against records on other public databases, such as NHS patient lists or Council Tax records, or against a combination of such sources.
- 4.24 In the past, it has been found that, while these two approaches can be used to identify a number of specific problems in the registers, they have clear limitations for producing national or even local estimates of completeness and accuracy. However, building on recent pilots of survey-based methods, and in the context of the widespread availability of public records in broadly compatible electronic formats, the potential for application of these two approaches has grown considerably. As a result, work adopting each of these approaches is currently underway.
- 4.25 The limitations of using surveys to estimate levels of accuracy and completeness were discussed at length in the methodology report compiled by GfK NOP Social Research (2007b). Notable limitations arise regardless of whether such surveys are conducted by telephone, in-street or door-to-door. In areas where reluctance or, in some cases,

² This research has now been published.

resistance to completing electoral registration forms and census enumeration forms is greatest, it is almost certain that researchers will encounter similar responses to requests to answer survey questions about the electoral register. Face-to-face surveys in the home are the ideal approach from a 'data quality' perspective, and also enable the recording of additional information about properties which are derelict or unoccupied (Todd, 1987; Electoral Commission, 2010a).

- However, face-to-face surveys are highly labour-intensive, and the 4.26 problems of gaining access to survey respondents, particularly in innercity areas where large numbers of people live in high-rise blocks or in houses in multiple occupation, can significantly increase the cost of such surveys. (Indeed, GfK NOP Social Research (2007b, p.4) suggest 'there are large parts of London that are effectively impossible to interview face to face'.) Although Ipsos MORI was able to overcome these problems conducting field work on the London Borough of Lambeth, response rates were indeed very low. While telephone surveys overcome problems of physical access, the growing proportion of households without landlines renders it difficult to contact some social groups in this way, most notably young people. In-street surveys are also recognised to produce notable sampling bias, largely because of a tendency among interviewers to use often sub-conscious visual cues to select potential participants. Perhaps most significantly of all, it has in the past been enormously costly to survey a sample large enough to produce a national estimate. One previous estimate provided by the Electoral Commission (2006e, p.2) was that a survey of 10,000 to 20,000 people nationally would cost in the order of £0.5 to 1 million and would thus be higher than the Commission's entire annual research budget.
- 4.27 The case study surveys carried out by Ipsos MORI for the Electoral Commission (2009b, 2010a, 2011a) have gone a very long way towards addressing these concerns. By using a clustered and stratified sample, Ipsos MORI were able to undertake house-to-house surveys at a significantly lower cost, while also ensuring that estimates of completeness and accuracy were kept within reasonable confidence limits. Having derived further lessons from this work about how to finetune the design of samples, it has become possible to extend the approach to produce national estimates. The Electoral Commission's (2011a) study, funded with the assistance of the Cabinet Office, has led to the production of national estimates of completeness and accuracy, including some analysis of geographical and sociological variation in rates of completeness and accuracy (see Section 3 for full details). This work has been highly significant in confirming that the possibility alluded to in earlier research (Electoral Commission, 2010a), that registration rates might not have recovered from the drop in registration levels in the early-mid 2000s.
- 4.28 Research which cross-references electoral registers against other public records has most commonly involved comparing the resisters to

patient lists held by PCTs or other NHS bodies. This work has, in the past, generally been undertaken as a basis for assessing the accuracy and comprehensiveness of NHS patient lists rather than that of the registers. For the purpose of research intended to assess the completeness and accuracy of the electoral registers, it suffers from the limitation that the electoral registers have generally been found to be the more comprehensive of the two. In addition, access to the electoral registers for academic research purposes has been restricted, almost certainly inadvertently, since the passage of the Electoral Administration Act 2006. Consequently, there is been no recently published work which has attempted to identify gaps or inaccuracies in the electoral registers using NHS patient lists or similar sources.

4.29 The government's decision to commission a number of data-matching pilots as part of the planning for IER may overcome some of the limitations highlighted above. By seeking to match register entries to data held across a wider-range of government databases, these pilots will provide a valuable means of assessing the current scope to operate a 'continuous list' system of electoral registration. Moreover, the pilots will also provide some indicative findings, for a number of localities, about the relative completeness and accuracy of the electoral registers compared to other data sources which record the equivalent information about UK citizens. The results of these data-matching pilots are expected during early 2012.

Other possibilities

- 4.30 The 'gold standard' for estimating the completeness of the registers will continue to be based on samples derived from a census with maximum possible coverage. However, given the significant time period between each census and the substantial fluctuations in registration levels in recent years, the scope to be able to derive national estimates from reasonably cost-effective surveys and, potentially, from future data-matching exercises is very encouraging.
- 4.31 Moreover, as the Electoral Commission (2010a) indicates, there is also considerable scope to undertake further analysis of the data collected via recent surveys of EROs carried out by the Electoral Commission. Since 2007, the Electoral Commission has collected a range of information from EROs which has informed the definition of performance standards for electoral administration. Much of the information, which is collected on an annual basis, is broadly compatible with that gathered via OPCS surveys of EROs in the 1990s. It may therefore be possible to repeat, at least in part, the analysis carried out by Freeth (1995, 1996) of the correlation between final returns and the methods used to compile the registers.
- 4.32 The Electoral Commission (2010a) also derived useful indicative findings from mapping the correlation between registration rates and canvass response, particularly with regard to identifying areas where

the electoral registers looked 'at risk' of falling below minimum levels of completeness and accuracy. Such an approach could potentially be combined with performance standards data to identify areas where some survey work might be targeted to assess the extent to which additional efforts are required to improve the state of the registers and what forms such intervention should take. For instance, in local authorities where annual canvass returns and/or registration rates are well below average the factors responsible may be highly localised – in some cases wards with a high proportion of students may account for a large proportion of registration forms which are not returned. Targeted research work could help identify such patterns and also inform the most appropriate strategies for tackling specific issues giving rise to lower than expected levels of completeness or accuracy.
5. Conclusions and recommendations for future research

5.1 The evidence considered in this review points to a number of specific conclusions about the state of the UK's electoral registers and, as importantly, about the state of the evidence base relating to the registers. It also provides the basis for a number of recommendations for future research.

The state of the registers/the state of the evidence

- 5.2 The literature on electoral registration in the UK has shown a tendency to be fragmented and patchy over time. However, more recent work, most notably the Electoral Commission's (2010a, 2011a) reports, have succeeded in drawing together this material with new research findings, giving us a far clearer picture of the state of the registers in Great Britain. At the same time, there is a range of sources to draw upon which provide valuable insight into the research questions which will need to be addressed as a result of the transition to IER. These additional sources fall into two main categories. First, there is the wealth of research undertaken by the Electoral Commission on changes in the Northern Ireland electoral register under IER. Second, there are a number of studies of electoral registration in countries operating similar 'continuous list' system of registration, most notably Australia and Canada.
- 5.3 Based on the available literature, a number of conclusions can be reached about the state of the registers in Great Britain and about the issues raised by the proposed transition to IER. In turn, these conclusions highlight a number of areas where further research is likely to be necessary as part of the Cabinet Office's wider Electoral Registration Transformation Programme.
- 5.4 The ten key conclusions derived from the literature review are as follows:
 - while the problems associated with all methods of producing estimates for the completeness and accuracy of the electoral registers are well known, recent work by the Electoral Commission highlights the scope to combine national surveys with other research techniques to produce robust measures of the state of the registers;
 - although the completeness of the electoral registers in Great Britain probably did not decline substantially over the course of t four decades, there does appear to have been a significant deterioration since the early 2000s. As a result, it seems unlikely that registration rates in the UK remain broadly comparable to the rates achieved in other OECD countries with similar systems of electoral registration;

- the introduction of IER in Northern Ireland in 2002 also resulted in a sharp drop in registration levels followed by further, albeit less dramatic, declines in 2003 and 2004. While the registration rate in Northern Ireland has now stabilised, it remains at about the same level as the latest estimates for Great Britain;
- the groups at risk of being absent from the register have remained remarkably consistent over time. Moreover, there are very few differences in the groups which exhibit very low rates of registration under the current system of registration in Great Britain and under IER in Northern Ireland. These groups primarily include young people and students, members of some ethnic minority groups, residents of deprived urban areas, EU nationals, and people with learning or physical disabilities;
- while direct comparisons are difficult, there is some evidence to suggest that registration rates among most, if not all, of these 'at risk' groups are even lower under IER in Northern Ireland than they are under the existing registration system in Great Britain;
- evidence from Northern Ireland, Australia and Canada underlines that maintaining electoral registers by accessing other public databases can provide acceptable levels of completeness and accuracy (although typically lower than in countries with a civil registry). However, there are some clear contrasts in the outcomes achieved in these three countries, with regard to both completeness and accuracy;
- based on international experience, two key factors will influence the completeness and accuracy of the registers in Great Britain under IER - the quality and usability of other public databases, and the extent to which electors respond to any moral or legal obligation to provide information for the purposes of electoral registration;
- many of the socio-demographic groups with the lowest registration levels are also those in which rates of participation in any form of political or social activity are lowest;
- research scheduled over the short- and medium-term will provide us with a much more detailed picture of the state of the electoral registers in Great Britain and will be of crucial importance during the transition to IER;
- some significant progress has been made in addressing some of the shortcomings of past attempts to measure the completeness and accuracy of the registers; however, a number of gaps in the knowledge base remain (see below).

Recommendations for future research

5.5 This review has identified a number of gaps in the existing knowledge base. In view of these gaps, there are a number of examples of areas where research could be developed by the Cabinet Office, in some instances in conjunction with the Electoral Commission, to develop the existing evidence base. These primarily include the following:

- Updated Northern Ireland research: there is an urgent need for updated research findings about levels of registration among 'at risk' groups in Northern Ireland, including identification of good practice and limitations around attempts to boost registration among specific groups, such as attainers. In addition, it is important to establish whether the accuracy of the Northern Ireland register is deteriorating as a result of the absence of an annual canvass since 2006. Much of the research evidence about under-registration among different social groups in Northern Ireland dates from the period immediately after the introduction of IER, and it is clear that since then registration levels among attainers, for instance, have fluctuated enormously. A short scoping study should be able to identify the extent to which the existing gaps in research relating to Northern Ireland would require fresh research to be commissioned. Some of the data required may already be available in EONI's annual reports or in unpublished formats. Likewise, the proposed study of the completeness and accuracy of the Northern Ireland register, scheduled for 2012, should provide some of the updates required, particularly relating to registration rates by age and to the accuracy of the current register.
- Fresh Northern Ireland research: it is possible that a scoping study of options for further Northern Ireland research would suggest that the most 'added value' would come from case studies of how EONI has sought to address under-registration among different social groups (e.g. school outreach work to capture attainers) and what lessons can be learnt from this experience for the rest of the UK. Given that the registration rate in Northern Ireland appears to have stabilised at around 84 per cent, but shows little sign of increasing under 'continuous registration', there would be particular value in establishing the extent to which data-sharing can be rendered more effective and how such matching might best be combined with a periodic canvass to maintain the completeness and accuracy of the registers.
- More learning from overseas: there is, without doubt, more that could be learned from further research, or perhaps simply the sharing of research findings and frameworks, regarding the operation and outcomes of electoral registration in other countries. Since both Australia and Canada have moved from a 'periodic list' to a 'continuous list' system in recent decades, the scope for learning between the UK and these other countries is especially obvious. A particularly significant issue which merits further investigation concerns the reasons for the significant contrasts in the completeness and accuracy of the registers in Australia, Canada and Northern Ireland, all of which use comparable approaches. In this regard, it is helpful that the UK's Electoral Commission is already at the initial stages of discussing a possible international research network with its counterparts in other English-speaking democracies. In addition, the Cabinet Office has already

begun to access findings from Australian research, most notably into the registration of younger voters.

• Modelling the potential impact of IER in Great Britain: based on the experience of Northern Ireland, it is clear that there is likely to be a drop in the number of register entries under IER and that a far greater degree of volatility may be introduced into the registers in Great Britain as a result of the proposed reforms. Given these expected patterns, it would be valuable to undertake some modelling of the potential impact of IER in Great Britain, including with regard to the likely additional impact of making registration voluntary. There are three key questions that this research would need to try to answer:

a. What would be the anticipated level of change in the electoral register in Great Britain as a result of introducing IER if all currently registered electors were retained on the register? Since IER will result in a cleaning of the register, some redundant and fraudulent entries will be removed, as may some, but not all, duplicate entries. A reduction in the number of register entries is therefore inevitable, even with the number of registered people remaining the same. Assessing the extent of this likely change will be essential if the change in the registration rate under IER is to be measured accurately. Without such estimates, the drop in the registration rate may appear to be far greater than it would be if the level of redundant and fraudulent entries were not taken into account.

b. What will be the impact of defining an invitation to register to vote as a matter of personal choice? It is hoped that data-matching will produce more complete and more accurate electoral registers. However, there is no current means of assessing what effect the shift towards greater use of data-matching to maintain the registers may have on registration levels, especially if such invitations are presented as a matter of 'personal choice'. Some evidence may be gleaned from the data-matching pilots about whether eligible voters missing from the register would respond positively to an invitation to be added to it. However, it is possible that a small-scale pilot or a 'field-trial' would be needed to ascertain how electors will respond to invitations to join the register if they are informed that they may refuse freely with no sanction being imposed.

c. What might the implications of IER be for the re-drawing of parliamentary constituency boundaries in future? The experience from Northern Ireland suggests that, under IER, registration levels are likely to fall more sharply in some areas than in others and that the registers may evidence a far greater level of volatility than currently. If this pattern is transferred to the rest of the UK, the implications for the redrawing of constituency boundaries could be profound, particularly given the requirements in the Parliamentary Voting System and Constituencies Act 2011 that all but four

'protected' constituencies should have electorates within 5 per cent of the electoral quota.

- 5.6 Again, some scoping of research would be desirable in relation to the modelling exercises proposed above. Some of these questions may be answerable using research which is already underway or planned. The Electoral Commission's future research plans currently include provisions to monitor changes associated with the ending of 'carry forward', with a view to projecting the likely level of decline in the registers after 2015. In addition, the Commission expects to conduct a future national study of completeness and accuracy using a spread of local authorities, which will include a sample of the adult population (boosted if necessary) who do not register under IER. Such research, which was not undertaken in Northern Ireland at the time of transition, will examine whether these members of the population currently unregistered are actually eligible to register, whether they have moved to a different address and are registered there instead, and so on. This survey should also be able to pick up broad urban and regional differences and may include more detailed consideration of patterns of change in individual local authorities where there appears to be a significant risk of sharp falls in registration levels.
- 5.7 It will also be crucial to consider the above recommendations for research in light of the findings of current Electoral Commission surveys of completeness and accuracy and of the data-matching pilots. In particular, little is currently known about how effective data-sharing will prove to be, either as a means of maintaining complete and accurate registers or as a method of monitoring the state of the registers. It is already apparent, for instance, that in the absence of a single national electoral register, the scope to identify duplicate entries across local registers will be very limited. Likewise, there may well be limited scope to identify voters who have moved to another area but failed to register since changing address. The quality and usability of the data from these pilots will therefore be crucial to determining any additional future research needs.
- 5.8 Finally, this review has also stressed that research into the state of the electoral registers cannot not take place in a socio-political vacuum. It is clear that the groups in which registration levels are lowest are also those among which rates of participation in any form of political activity are lowest. While there is evidence to suggest that an impact can be made in relation to under-registered groups, the barriers to improving registration rates among under-registered groups also need to be recognised. It is therefore important to consider whether increasing registration rates within the target groups is likely to be costly, particularly if there is no incentive or penalty applying to unregistered voters. In addition, research should be considered into how levels of political participation can be raised among two specific groups: (i) habitual non-voters who are nonetheless currently registered; and (ii)

unregistered voters with especially low levels of civic and political participation.

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