Working Futures 2004-2014
Spatial Report

skills
FOR BUSINESS

Working Futures 2004-2014:

SPATIAL REPORT

A. Green, K. Homenidou, R. White and R. Wilson
January 2006

Institute for Employment Research, University of Warwick, Coventry CV4 7AL
tel: 024 765 23283 fax: 024 765 24241 E-mail r.a.wilson@warwick.ac.uk

Preface and acknowledgements

The authors are grateful to the SSDA and the LSC for funding this research. Special thanks are due to the project Steering Group, comprising Lesley Giles (SSDA), Richard Garrett (SSDA), Joyce Findlater and Nathan Dodd (LSC), Mark Deas (EEDA on behalf of the RDAs), Geoffrey Shoesmith and Gary Clarkson (DfES) and Lauren Sadler (of Cogent, representing the Sector Skills Councils (SSCs).

This has been a team effort, involving a large number of people. Rachel Beaven, Andrew Holden and Peter Millar all made important contributions to the data analysis and processing. Thanks are also due to Amanda Kerry for word processing and related assistance and to Jackie Wilson for help in proof reading. The responsibility for any remaining errors is the authors.

The projections are presented at a variety of different sectoral levels using two main types of definition:

- **broad sectoral definitions** based on groups of 6, 14 or 27 sectors, and defined by Standard Industrial Classification (SIC) codes. These preserve the traditional manufacturing, services and public sector groupings of the economy. They are hierarchically related, with the 6 broadest sectors being a more aggregated grouping of the 14 industries, and so on. The 14 and 27 groups have been adopted by the SSDA in their Sector Skills Matrix database and hence are referred to as the Sector Matrix Industries (SMI). These are not coterminous with the SSCs' footprints; and

- **Sector Skills Councils definitions** which employ SIC code groupings that most closely match the SSC footprints. These definitions are a 'best fit' of each SSC's core business sectors. These specify the *core* SIC codes that are undisputed and do not overlap with any other SSC. The extent to which this is an exact fit varies between SSCs. In some cases, the use of the core SIC codes excludes elements of the SSC footprint because they are included in other areas. SSCs can provide further depth analysis of skills and future employment within their sector (see their individual websites for details).

The results should be regarded as indicative of likely trends given a continuation of past patterns of behaviour and performance, rather than precise forecasts of what will inevitably happen. They should be regarded as a robust benchmark for debate and used in conjunction with a variety of other sources of LMI. The opinions expressed in this report are those of the authors and do not necessarily reflect the views of the SSDA, the LSC, DfES, RDAs nor individual SSCs.

Sector Skills Development Agency
Wath on Dearne

ISBN 0-9552029-0-6

WORKING FUTURES 2004-2014: SPATIAL REPORT

Contents

Contents

Contents

List of Tables & Figures

Contents

PAGE

Contents

Contents

Contents

Note   Categories in **bold** type are those used in the reporting of the results.

SUMMARY

This document is part of the ***Working Futures 2004-2014*** series of detailed projections of employment, by sector and region. It was commissioned jointly by the Sector Skills Development Agency (SSDA) and the Learning and Skills Council (LSC). The results are intended to provide a sound statistical foundation for the deliberations of all those with an interest in the supply of and demand for skills, including individuals, employers, education and training providers as well as the various agencies and departments of government. The latter include the Treasury, the Department for Education and Skills (DfES), the Sector Skills Councils (SSCs), Regional Development Agencies (RDAs) and Local Learning and Skills Councils (LLSCs), as well as the report's main sponsors the SSDA and LSC.

It focuses on the situation in the constituent countries within the UK and the English Regions. It provides the most comprehensive picture available for the UK about future patterns of demand for and supply of skills, focussing here upon occupational employment.

The first chapter provides an overview and summary of the projections of sectoral and occupational employment over the period to 2014. The term 'region' is used here as a shorthand to cover all the English regions (as represented by the Regional Development Agencies [RDAs] in England) together with Wales, Scotland and Northern Ireland. Subsequent chapters provide details for each of these geographical areas in turn.

The general approach to the projections is based on quantitative methods using a multi-sectoral regional model of the UK economy. The results incorporate the latest sectoral employment data from ONS, including the 2003 Annual Business Inquiry. They also take account of information from the 2001 Census and subsequent revisions to the LFS. These new data provide insights into recent trends in sectoral employment as well as other aspects of employment structure such as the gender status mix of employment and changing occupational shares.

The projected changes in output and employment prospects in the countries and regions of the UK can be seen as a combination of a number of general trends, common across all geographical areas, together with the specific structural features of each area.

The key trends[1] which are common to almost all regions are as follows:

- Sectoral shifts in favour of employment in the service sector, especially marketed services related to business and tourism and leisure;
- Significant further job losses in the primary and manufacturing sectors;
- Linked to these developments some changes in favour of part-time working and an increasing role for female workers in the formal economy;
- Changing occupational structures in favour of higher level, white collar jobs such as managerial, professional and associate professional occupations;
- Increasing employment shares also for personal service and sales & customer service occupations;
- Job losses for many administrative, clerical & secretarial occupations;
- Employment decline for most blue collar, manual occupations, including many skilled trades; machine & transport operatives and elementary (unskilled occupations).

Each of the English regions and the other countries of the UK possess unique structural features which and serve to moderate or reinforce these general trends. In general, the trends outlined are

[1] These general trends are explored in more detail in the accompanying National Report, Wilson *et al.* (2005).

deep-seated and persistent. Key features of change for the countries and regions of the UK include:

- The three regions of south-eastern England, London, the South East and the East of England, emerge as the fastest growing regions, in terms of employment and output, in the UK. They are characterised by greater than average shares of employment in high level non-manual occupations. Together, the whole of London and most of the South East and East of England regions may be thought of as a London-dominated “mega-city-region”.

- The South West is expected to experience employment and output growth at rates similar to the UK average. In this region part-time employees and the self-employed account for larger than average shares of total employment.

- The East Midlands and West Midlands have the largest shares of employment in manufacturing and are projected to experience some of the fastest rates of job loss over the period to 2014. However, an increase in employment in services is expected: the West Midlands has the fastest projected increase in non-marketed services in the UK over the period to 2014. These two regions display the fastest projected rates of job loss in skilled trades occupations and elementary occupations over the medium-term.

- Yorkshire & the Humber is projected to experience employment growth at the same rate as the UK over the period to 2014, but projected output growth is slower than average. The region is characterised by smaller than average shares of employment in professional and associate professional occupations and projected growth is slower than average. Contrary to the UK trend, a modest increase in employment for administrative, clerical & secretarial occupations is projected.

- In the North West projected output and employment growth are slower than the UK average. This projected slower than average employment growth is apparent in all service sectors and in all occupations where employment growth is expected with the exception of personal service occupations.

- In Wales employment is projected to grow at the same rate as the UK average over the period to 2014, but projected output growth is slower than average. Non-marketed services are projected to continue to account for a much larger share of total employment in Wales than across the UK as a whole. Projected employment growth for females is confined to part-time employees and Wales displays the fastest rate of projected growth for male part-time employees.

- Northern Ireland displays slightly more modest employment and output growth than the UK average. A loss in male full-time employees is expected, but projected growth rates for male part-time employees and for female employees exceed the UK average.

- Scotland and the North East display the slowest projected output growth and employment growth of any part of the UK over the period to 2014.

1. OVERVIEW

1.1 Background

This document is part of a series of volumes that present ***Working Futures 2004-2014***. This is the second in a series of detailed projections of employment, by sector and region. It was commissioned jointly by the Sector Skills Development Agency (SSDA) and the Learning and Skills Council (LSC). The results are intended to provide a sound statistical foundation for the deliberations of all those with an interest in the supply of and demand for skills, including individuals, employers, education and training providers as well as the various agencies and departments of government. The latter include the Treasury, the Department for Education and Skills (DfES), the Sector Skills Councils (SSCs), Regional Development Agencies (RDAs) and Local Learning and Skills Councils (LLSCs), as well as the report's main sponsors the SSDA and LSC.

This volume focuses on the situation in the constituent countries within the UK and the English Regions. The new set of forecasts updates the *Working Futures* work commissioned in 2003.[1] The 1st volume focuses on the National (UK) picture. It provides an overview of prospects for the whole of the UK and detailed results by the SSDA's sector matrix industries. This is complemented by a separate Sectoral Report, presenting results by SSC sectors and a Technical Report.

This first chapter provides an overview and summary of the projections of sectoral and occupational employment over the period to 2014 for the areas covered by Regional Development Agencies (RDAs) in England, and for Wales, Scotland and Northern Ireland. Note that the term 'region' is used here as a shorthand to cover all the English regions (as covered by the RDAs); together with Wales, Scotland and Northern Ireland. Information is also presented for two national comparators: England and the UK.

The results incorporate the latest sectoral employment data from ONS, including the 2003 Annual Business Inquiry. They also take account of information from the 2001 Census and subsequent revisions to the LFS (2004). These new data provide insights into recent trends in sectoral employment as well as other aspects of employment structure such as the gender status mix of employment and changing occupational shares.

Section 1.2 provides a summary account of the general approach to the projections. More specific details relating to the occupational employment projections and replacement demands are presented in Section 1.3. Further information about sources and methods is presented in Annex A of the present document and in greater detail in the separate *Technical Report*.[2]

The rationale for, and structure of this *Spatial Report* is presented in Section 1.4. Section 1.5 outlines overall prospects in the regions and countries within the UK. Section 1.6 summarises aggregate labour supply and demand trends, including prospects for unemployment. Sectoral prospects are described in more detail in Section 1.7. Developments by gender and employment status (full-time, part-time and self-employment) are covered in Section 1.8. Occupational employment prospects are described in Section 1.9, while Section 1.10 concludes by outlining implications for replacement demands.

[1] See Wilson *et al.* (2004a and b). In some places these results are referred to as *Working Futures 2002-2012*.

[2] For further discussion see the *Technical Report* (Wilson *et al.,* 2006b).

1.2 General Approach

The future cannot be predicted with precision or certainty. Individuals and organisations all make plans for the future (even if it is simply that the future will be little different from the present and recent past). In doing so they adopt (implicitly at least) assumptions about what it might be like. Hence, the question is not whether projections and forecasts need to be undertaken but rather how this should be done. The rationale behind *Working Futures* is that a comprehensive, systematic, consistent and transparent set of projections provides useful information for all the actors in the labour market.

It is important to emphasise that the views presented here are not the only possible future. They represent a benchmark for debate and reflection. The detailed spatial projections presented a carefully considered view of what the future might look like, if past patterns of behaviour and performance are continued. They are not intended to be prescriptive. Particular sectors and groups may consider alternative scenarios more realistic, but the results presented here raise questions about how such alternatives might be achieved.

The sectoral projections are based on the use of the Cambridge Econometrics (CE) multi-sectoral, regional macroeconomic model (RMDM), which provides the general economic scenario. The use of a multi-sectoral, multi-regional macroeconomic model, built around a full input-output matrix, provides a sound foundation for assessing detailed employment prospects. Further information about the models is given in Annex A and, in more detail, in a separate *Technical Report*.[3] The demand for labour is therefore seen as a derived demand which depends critically on developments in the markets for goods and services and the technologies used to produce them.

This information is combined with occupational employment and the replacement demand models developed by the Institute for Employment Research (IER) to generate the occupational projections (as detailed below).

The detailed results presented here should be regarded as indicative of general trends and orders of magnitude, given the assumptions of a continuation of past patterns of behaviour and performance. They should not be regarded as precise forecasts of what will necessarily happen.[4] They are not intended to be prescriptive. If policies and patterns of behaviour are changed then alternative futures might be achieved. The present results are intended to provide a consistent and systematic benchmark view that can form the basis for ongoing dialogue and debate.

Results are also drawn out for individual local Learning and Skills Council areas. These are based on a detailed sector by sector analysis that assumes a continuation of past patterns of performance compared to the region within which the area sits. Note that this means that no specific account is taken of any specific circumstances in the local area, including any major construction projects that might have implications for employment and skills at that level.

1.3 Occupational Employment Projections and Replacement Demands

The report provides projections of **industrial** and **occupational employment levels**. At its most detailed level, the occupational model is built around a series of employment matrices distinguishing 67 industries (SIC92/2003) and 25 sub-major occupational groups taken from the SOC 2000 occupational classification. These are defined for each country and region of the UK. Consistent results are also generated for each local Learning and Skill Council area. Some details of the methods used to generate these projections are given below. Further

[3] Wilson *et al.* (2006b).

[4] See Wilson and Briscoe (2002) for further discussion.

technical information on sources and methods can be found in the supporting Annex and in the separate *Technical Report*.[5]

Changes in occupational employment levels between years are also analysed to show changes due to **replacement demand**. This takes into account the need to replace those who leave their jobs because of retirement or other reasons. These replacement demands need to be added to any **structural change** (or so called ***expansion demand***) that is projected, in order to obtain an estimate of the overall recruitment requirement. These estimates are based on quite limited data on age structures and flow rates from the LFS. Note that they do not take account of geographical mobility. Hence, they should again be regarded as indicative rather than precise indications of the likely scale of replacement demands. The key message here is that replacement demands are likely to be much more significant in terms of education and training requirements than expansion demand, even where the latter is quite large.

1.4 A Spatial Perspective

Background

A spatial focus is important given policy concerns about significant and persistent spatial variations in productivity and employment. Moreover, skills have been identified as a key driver underlying such regional differentials, and are a key focus of the work of Regional Skills Partnerships in England and of economic development agencies elsewhere in the UK.

Along with a greater territoriality and greater regional and local devolution in policy making, it is recognised that regional averages mask intra-regional variations in experience. Some commentary on such local variations at the LLSC area level within England is presented.

Structure

This overview provides details of:

(a) overall prospects for the regions - long-term changes in GVA and employment;
(b) labour supply and demand – projected changes in the population, labour force, economic activity rates, unemployment and employment;
(c) prospects for employment change by sector, at the level of six broad sectors;
(d) the changing composition of employment by gender and employment status;
(e) trends in occupational employment – at the level of nine SOC Major Groups[6];
(f) projections of replacement demand.

The emphasis in the overview is on the range and patterns of regional differentiation across the UK over the period to 2014. Hence, the overview sets the context for more detailed accounts in the subsequent chapters of this volume, which present analyses of changing patterns of employment structure and likely future developments, for each of the 9 regions in England and the other constituent countries within the UK.[7]

1.5 Overall Spatial Prospects

Aggregate trends

Table 1.1 shows recent and projected trends in GVA and employment across the UK.

---

[5] Wilson *et al.* (2006b).

[6] More detailed information at the 25 SOC Sub-Major Group level is presented in the separate regional commentaries.

[7] The detailed spatial analysis also presents data by 14 more detailed sector matrix industries. These are not co-terminus with SSC footprints. The full definitions used are given in Annex A.

At the England and UK levels, the trends are for a reduction in the rate of output growth over the period from 2004 to 2014 compared to that recorded over the previous decade. A more marked reduction in the rate of employment growth is apparent from 1.2 per cent per annum in the UK and England between 1994 and 2004 to 0.4 per cent per annum and 0.5 per cent per annum for the UK and England, respectively, between 2004 and 2014.

Relative to the period from 1994 to 2004, projected rates of output growth are expected to hold up more strongly in parts of northern Britain (such as Scotland, the North West and the North East (in the latter region a modest increase in output is projected), in Wales and the midlands than in southern England. Nevertheless, rates of output growth remain higher in southern (the South East [2.8 per cent per annum], London [2.7 per cent per annum], the East of England [2.6per cent per annum] and the South West [2.4 per cent per annum]) than in other parts of the UK. Scotland is expected to record the slowest GVA growth of any region of the UK over the period to 2014 (1.9 per cent per annum), followed by the North East and Yorkshire & the Humber (both 2 per cent per annum).

Between 1994 and 2004 Northern Ireland, London, the East of England and the South East saw the greatest relative employment increases of any part of the UK. The South West region also recorded employment increase at a rate in excess of the UK average. Over the period to 2014 a slowing in the rates of employment growth is projected for all regions, but the South East, London and the East of England are projected to record the fastest rates of employment growth (in the range 0.5 -0.7 per cent per annum). The South West, Yorkshire & the Humber and Wales display the next highest annual average rate of employment growth, which, at 0.4 per cent, is the same as that for the UK. Scotland and the North East record the slowest rates of employment growth (0.2 per cent per annum).

Table 1.1: Long-term Changes in Macroeconomic Indicators

% p.a.

Region/Countries	GVA		Employment	
	1994-2004	2004-2014	1994-2004	2004-2014
London	3.7	2.7	1.6	0.6
South East	3.7	2.8	1.5	0.7
East of England	3.3	2.6	1.6	0.5
South West	3.2	2.4	1.3	0.4
West Midlands	2.7	2.2	0.9	0.3
East Midlands	2.5	2.1	0.8	0.3
Yorks & the Humber	2.8	2.0	0.9	0.4
North West	2.4	2.1	1.2	0.3
North East	1.9	2.0	0.5	0.2
England	3.1	2.4	1.2	0.5
Wales	2.4	2.1	0.5	0.4
Scotland	2.1	1.9	0.6	0.2
Northern Ireland	3.2	2.3	2.1	0.3
United Kingdom	3.0	2.4	1.2	0.4

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.1).
Notes: GVA (output) is measured on a residence basis, employment is on an establishment (workplace /jobs) basis. Under the European System of Accounts 1995 (ESA95), the term GVA is used to denote estimates that were previously known as gross domestic product (GDP) at basic prices. Under ESA95 the term GDP denotes GVA plus taxes (less subsidies) on products, i.e. at market prices. The Regional Accounts are currently only published at basic prices, so the figures are referred to as GVA rather than GDP.

Output by broad sector

Table 1.2 shows recent and projected trends in GVA by broad sector.

The overall picture is one of increases in output in all regions and countries for all broad sectors over the period from 2004 to 2014 (with the exception of construction in Northern Ireland where a very modest decrease is projected).

Relative to the previous decade, marked increases in output are confined to manufacturing and non-marketed services. Decrease relative to this earlier period is most apparent for business & other services, although projected increases in output remain higher in this broad sector than in others.

Northern Ireland, Wales, the North East and the South East are expected to see the greatest projected growth in output in the *primary sector & utilities* over the period to 2014, while Scotland and Yorkshire & the Humber are projected to record a modest increase of 0.1 per cent per annum.

In *manufacturing* projected output growth is highest in the South East (2.1 per cent per annum), with Wales, Northern Ireland, the East of England, the North West and the North East also displaying projected growth in excess of the UK rate. The East Midlands (the region with the largest share of total employment in manufacturing) records the slowest rate of increase of any region (1.2 per cent per annum).

Projected rates of output growth over the period to 2014 in *construction* are highest in southern regions. In Northern Ireland a modest decrease is projected.

Likewise, in *distribution, transport, etc*, the southern regions are expected to experience the fastest rates of growth in output, while Wales, Scotland, Northern Ireland and the three northernmost regions of England record the slowest projected growth rates.

In *business & other services* all southern regions, together with Northern Ireland, are projected to experience output growth in excess of the UK average. In this broad sector the slowest rate of output growth is in the North East at 2 per cent per annum, compared with the UK average of 2.9 per cent per annum.

The East Midlands, the West Midlands and the South East are expected to record the fastest gains in output for non-marketed services. Slowest rates of output growth are projected for Northern Ireland and the North East.

Table 1.2: Long-term Changes in GVA by Broad Sector

% p.a.

Regions/Countries	Primary sector & utilities		Manufacturing		Construction	
	1994-2004	2004-2014	1994-2004	2004-2014	1994-2004	2004-2014
London	-0.1	0.3	0.4	1.6	2.8	1.5
South East	-0.5	1.1	1.1	2.1	2.5	1.7
East of England	-0.9	0.8	0.3	1.7	2.4	1.6
South West	0.5	1.2	0.8	1.6	1.8	1.7
West Midlands	2.2	0.9	-0.1	1.3	1.9	1.5
East Midlands	-0.8	0.2	-0.4	1.2	2.4	1.2
Yorks & the Humber	1.2	0.1	0.6	1.3	2.5	1.4
North West	1.4	0.6	-0.2	1.7	1.2	0.9
North East	2.9	1.3	-0.6	1.7	1.9	1.2
England	0.5	0.8	0.3	1.6	2.2	1.4
Wales	1.4	1.3	-0.1	1.9	3.0	0.8
Scotland	0.9	0.1	-0.6	1.4	1.2	1.1
Northern Ireland	-0.2	1.8	1.7	1.8	-0.1	-0.1
United Kingdom	0.6	0.7	0.2	1.6	2.2	1.4
Regions/Countries	**Distribution, transport etc**		**Business & other services**		**Non-marketed services**	
	1994-2004	**2004-2014**	**1994-2004**	**2004-2014**	**1994-2004**	**2004-2014**
London	2.6	2.8	5.4	3.1	1.4	2.5
South East	3.7	3.1	5.8	3.2	1.4	2.6
East of England	3.5	2.8	5.5	3.3	1.7	2.5
South West	4.0	2.6	4.6	3.1	2.2	2.5
West Midlands	3.3	2.5	4.9	2.8	2.2	2.7
East Midlands	3.1	2.5	4.7	2.6	2.9	2.6
Yorks & the Humber	3.1	2.3	4.0	2.5	2.4	2.4
North West	2.9	2.2	3.9	2.5	2.2	2.4
North East	2.4	2.3	2.6	2.0	1.7	2.1
England	3.2	2.7	5.1	3.0	1.9	2.5
Wales	2.7	2.1	3.4	2.5	2.2	2.5
Scotland	2.5	2.1	3.4	2.3	1.7	2.3
Northern Ireland	4.8	2.2	4.9	3.6	0.8	2.0
United Kingdom	3.2	2.6	4.9	2.9	1.9	2.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.2)

Employment by broad sector

Table 1.3 shows recent and projected trends in employment by broad sector.

The overall picture is one of a continuing transformation in the structure of employment, with increases in employment in broad service sectors in all regions and of declines in the primary sector & utilities and in manufacturing. At national level a modest decline in construction employment is projected, although there is growth in employment in some regions and decline in others.

Projected rates of employment decline in the *primary sector & utilities* range from 3.2 per cent per annum in London and 2.4-2.5 per cent per annum in the East of England, the West Midlands and Yorkshire & the Humber to 0.7 per cent per annum in the South East and 0.8 per cent per annum in Northern Ireland.

In *manufacturing* Wales (0.4 per cent per annum), the South East (0.7 per cent per annum) and Yorkshire & the Humber record the slowest rates of employment decline. Conversely, the South West, the West Midlands and the East Midlands are projected to see the fastest rates of job loss.

Construction presents a more mixed picture, with fastest projected rates of decline in Northern Ireland, Wales, the West Midlands and Yorkshire & the Humber, contrasting with modest projected employment gains in London, the South West and the South East.

In *distribution, transport, etc* projected rates of annual average employment growth range from 0.3 per cent in Scotland and the North West to 0.8 per cent per annum in the South East. Elsewhere, projected growth rates are similar to the UK average (0.5 per cent per annum).

In *business & other services* projected employment growth rates range from 0.9 per cent per annum in the North East to 1.5 per cent per annum in the West Midlands and Yorkshire & the Humber. Regional differentials in projected employment growth in business & other services are much narrower over the period to 2014 than they were over the decade to 2004.

The West Midlands is also projected to see the fastest rate of employment growth in *non-marketed services* (0.8 per cent per annum), with the South East, the South West and East Midlands registering the next fastest rates of increase (0.7 per cent per annum). By contrast in the North East the projected growth rate is 0.1 per cent per annum. Scotland, Yorkshire & the Humber and the North West also record slower projected employment growth rates than the UK average.

Overview of prospects by region

On the basis of the macroeconomic indicators presented in Tables 1.1-1.3, the three regions of south-eastern England, London, the South East and the East of England, emerge as the fastest growing regions, in terms of employment and output, in the UK. Together, the whole of London and most of the South East and East of England regions may be thought of as a London-dominated “mega-city-region”. The South West is expected to experience employment and output growth at rates similar to the UK average. Scotland and the North East display the slowest projected output growth and employment growth of any part of the UK over the period to 2014. The general trends identified here are deep-seated and persistent.

Table 1.3: Long-term Changes in Employment by Broad Sector

% p.a.

Regions/Countries	Primary sector & utilities		Manufacturing		Construction	
	1994-2004	2004-2014	1994-2004	2004-2014	1994-2004	2004-2014
London	-6.4	-3.2	-1.9	-1.2	2.9	0.3
South East	-2.6	-0.7	-1.2	-0.7	2.2	0.1
East of England	-3.7	-2.5	-1.3	-1.0	2.8	-0.1
South West	-3.6	-1.5	-0.9	-1.5	1.8	0.2
West Midlands	-3.5	-2.4	-2.1	-1.4	1.5	-1.4
East Midlands	-3.3	-1.8	-2.1	-1.4	0.8	-0.5
Yorks & the Humber	-3.1	-2.4	-1.8	-0.8	1.6	-1.3
North West	-5.1	-1.1	-2.2	-1.2	0.8	-0.5
North East	-0.2	-1.5	-2.5	-1.2	0.0	-0.3
England	-3.4	-1.7	-1.8	-1.1	1.8	-0.3
Wales	-4.3	-1.8	-1.9	-0.4	0.7	-1.8
Scotland	-1.8	-2.0	-2.7	-1.6	0.0	-0.9
Northern Ireland	-1.5	-0.8	-1.1	-1.0	3.5	-1.8
United Kingdom	-3.2	-1.7	-1.8	-1.1	1.6	-0.4

Regions/Countries	Distribution, transport etc		Business & other services		Non-marketed services	
	1994-2004	2004-2014	1994-2004	2004-2014	1994-2004	2004-2014
London	1.3	0.5	2.6	1.1	1.5	0.5
South East	1.8	0.8	3.4	1.0	0.6	0.7
East of England	1.9	0.6	3.5	1.2	1.2	0.6
South West	1.8	0.5	2.7	1.1	1.4	0.7
West Midlands	1.1	0.5	2.6	1.5	2.0	0.8
East Midlands	1.1	0.5	2.6	1.2	2.2	0.7
Yorks & the Humber	1.0	0.6	2.7	1.5	1.3	0.4
North West	1.5	0.3	3.0	1.1	1.9	0.4
North East	0.2	0.7	2.0	0.9	1.5	0.1
England	1.4	0.6	2.9	1.2	1.4	0.6
Wales	0.5	0.5	2.1	1.4	1.5	0.6
Scotland	0.5	0.3	2.5	1.1	1.3	0.4
Northern Ireland	3.4	0.6	4.8	1.4	1.5	0.6
United Kingdom	1.3	0.5	2.9	1.2	1.4	0.6

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.3)

1.6 Labour Supply and Demand

Summary statistics on labour supply and demand are presented in *Table 1.4.*

Some data in the table relating to the supply-side (e.g. economic activity rates) are residence-based, including the number of employed residents, while other data (e.g. workplace employment [jobs]) relate to the place where people actually work. Part (but not all) of the difference between these measures of employment reflects commuting flows. The latter are especially significant in London and the neighbouring regions of the South East and East of England. Other factors include double jobbing and various statistical and measurement errors. The various indicators and measures used are defined in detail in Box 2.1 in Chapter 2 (page 39).

The UK *total population* is expected to increase by nearly 2.4 million over the period to 2014. In Scotland the population level is projected to remain virtually stable and in the North East population growth is quite modest (0.1 per cent per annum). Projected population gains are greatest in London (around 360 thousand), the South East, the South West and the East of England. Projected rates of growth over the period to 2014 are higher than the UK average (0.4 per cent per annum) in the South West (0.6 per cent per annum) and London, the East of England and Yorkshire & the Humber (all 0.5 per cent per annum).

The *population aged 16+* is projected to grow even faster, rising by almost 3 million. This reflects the aging of the population. The patterns across the UK are rather different to those for the total population. Scotland, the North West and the North East are projected to see significantly larger increases compared to the changes expected for the total population, In contrast, in London the growth in the 16+ population is almost identical to that expected for the total population (reflecting the important role played by natural increase in London).

The projected gain in *working age population* is greater in London (around 380 thousand) than for the population as a whole, and this is also the case in Scotland. However, in the East of England the projected net increase in working age population (nearly 125 thousand) is considerably smaller than for the aggregate population. Annual average rates of growth in working age population range from 0.1 per cent per annum in Scotland to 0.9 per cent per annum in the South West. London and Northern Ireland display the next highest annual average growth rates (0.7 per cent per annum).

The *economic activity rate* (defined as the labour force as a percentage of the population aged 16 years and over) is projected to remain relatively steady over the period to 2014, at around 61 per cent. However, there is regional variation around this average. The only projected increase is in London (with a 1.0 percentage point increase). Decreases are projected for all other areas, with especially large reductions in the South West, the East Midlands, Wales and Scotland. (Note that the ageing of the population is an important factor in these reductions.) The North East and Wales are expected to continue to record the lowest economic activity rates.

In the UK as a whole, the *workforce* (workplace employment plus claimant unemployment plus those on government raining schemes) is projected to increase by around 1.5 million (a rate of 0.5 per cent per annum) to reach almost 33 million by 2014. All parts of the UK are expected to share in this increase, with London, the South East, the South West and the East of England recording the largest expected gains. Faster than UK average growth is expected in London and the South East rate (0.7 per cent per annum). The North East and Scotland display the slowest projected growth rate (0.3 per cent per annum).

The labour force (employed residents plus ILO unemployment) exhibits a similar profile. The overall increase projected between 2004 and 2014 is around 1½ million. The patterns of change are similar to those of the workforce, with the largest and fastest increases in London and the South East.

ILO unemployment measures the number of people actively searching for work regardless of whether or not they are registered as claimants. A slight increase is expected in the short term, although the scale and rate are both expected to decline again in the second half of the decade. By 2014 the overall level is projected to be around 1.6 million compared to 1.4 million in 2004. The projected ILO unemployment rate (i.e. ILO unemployment as a percentage of the labour force) varies in 2014 from around 7 per cent in London to below 3 per cent in the South East.

Claimant unemployment is projected to increase by around 210 thousand across the UK over the period to 2014, to reach just over 1 million. A modest increase in the UK unemployment rate of 0.4 percentage points is expected, reaching almost 3 per cent in 2014. All areas share in the modest projected increases in claimant rates, with the West Midlands and Scotland recording the largest percentage point increases. London registers the largest absolute gain of any region. Regional variations in claimant rates are expected to alter little changed, with London, Northern Ireland, Scotland and Northern Ireland displaying the highest rates, followed by the West Midlands.

The number of *employed residents* (heads) is projected to increase by around 1.3 million across the UK as a whole. London and the South East are projected to show the largest absolute increases, but all areas are expected to see some growth. The fastest increases are again in London and the South East (0.7 per cent per annum or more), with the East Midlands and Scotland showing the slowest growth (0.2 per cent per annum).

Workplace employment measures the total number of jobs. This is projected to rise at a similar rate to the number of employed residents. This is the main measure used to assess the changing patterns of employment by sector occupation, gender and status throughout *Working Future 2004-2014*. Again it is London and the South East that are projected to show the largest increases, workplace employment growing between 2004 and 2014 by around 0.3 million jobs in both cases. The North East and Northern Ireland are projected to show the smallest gains and the slowest rate of increase.

Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is "double jobbing" (some people have more that one job). In total there are around 2 million second (or third) jobs. At a more disaggregated level, net commuting across geographical boundaries plays a significant role. The latter is especially significant for the London and the South East. Statistical errors and other differences in measurement between data from different sources also contribute to the residual.

Table 1.4: Changes in Population, Economic Activity Rates and Unemployment

Region/Countries	Total	Population	Working	Labour	Workforce	Economic	Unemployment				Employment		Labour
		16+	Working	Force		activity	ILO	ILO	Claimant	Claimant	Employed	Workplace	Market
	Total		age			rate	level	rate	level	rate	residents	employment	Residual
	000s	000s	000s	000s	000s	%	000s	%	000s	%	000s	000s	
Changes, 2004 levels-2014 levels													
London	405	403	381	320	318	1.2	51	0.7	32	0.4	269	289	16
South East	369	431	207	208	299	-1.0	12	0.1	5	0.0	196	287	98
East of England	293	320	127	154	150	-1.1	29	0.8	15	0.4	125	134	10
South West	404	430	273	219	110	-0.9	18	0.4	9	0.2	201	101	-101
West Midlands	226	269	189	98	120	-1.4	51	1.7	32	0.8	46	90	41
East Midlands	217	258	125	117	63	-1.2	24	0.8	13	0.4	93	52	-44
Yorks & the Humber	185	249	162	142	114	-0.2	-2	-0.4	-2	-0.2	144	96	-30
North West	111	223	112	102	127	-0.6	37	1.0	24	0.5	65	101	37
North East	11	64	26	28	36	-0.3	12	0.9	8	0.5	16	27	12
England	2,221	2,647	1,602	1,387	1,337	-0.6	232	0.6	138	0.3	1,155	1,176	38
Wales	107	147	79	38	59	-1.8	32	2.1	20	1.0	6	47	33
Scotland	18	125	46	-1	74	-1.8	36	1.4	23	0.7	-38	50	88
Northern Ireland	24	67	23	24	37	-1.1	11	1.2	10	0.8	13	28	15
United Kingdom	2,371	2,986	1,750	1,447	1,507	-0.7	311	0.8	190	0.4	1,136	1,300	174
2004 levels													
London	7,424	5,982	4,944	3,694	4,686	61.7	260	7.0	163	3.3	3,434	4,496	1,073
South East	8,128	6,545	4,989	4,194	4,351	64.1	161	3.8	71	1.4	4,033	4,227	241
East of England	5,501	4,422	3,352	2,816	2,839	63.7	104	3.7	55	1.6	2,712	2,751	64
South West	5,049	4,115	3,021	2,507	2,641	60.9	79	3.2	42	1.4	2,428	2,545	166
West Midlands	5,341	4,267	3,259	2,573	2,705	60.3	142	5.5	88	2.7	2,431	2,599	176
East Midlands	4,274	3,447	2,633	2,122	2,074	61.6	95	4.5	52	2.0	2,027	2,004	-12
Yorks & the Humber	5,028	4,038	3,090	2,442	2,544	60.5	118	4.8	74	2.4	2,324	2,444	134
North West	6,809	5,461	4,178	3,254	3,476	59.6	153	4.7	99	2.4	3,101	3,358	261
North East	2,540	2,060	1,565	1,150	1,149	55.8	68	5.9	46	3.0	1,082	1,093	13
England	50,093	40,336	31,032	24,752	26,463	61.4	1,180	4.8	691	2.2	23,572	25,517	2,117
Wales	2,961	2,386	1,784	1,377	1,324	57.7	65	4.7	40	2.3	1,312	1,271	-36
Scotland	5,061	4,128	3,161	2,549	2,641	61.7	149	5.8	93	2.9	2,400	2,522	140
Northern Ireland	1,707	1,325	1,048	772	838	58.3	35	4.5	31	2.9	737	789	63
United Kingdom	59,823	48,174	37,025	29,450	31,266	61.1	1,429	4.9	854	2.3	28,021	30,099	2,284

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.4).

(continued)

Table 1.4 : Changes in Population, Economic Activity Rates and Unemployment (continued)

Region/Countries	Total	Population		Labour	Workforce	Economic	Unemployment				Employment		Labour
		16+	Working	Force		activity	ILO	ILO	Claimant	Claimant	Employed	Workplace	Market
	Total		age			rate	level	rate	level	rate	residents	employment	Residual
	000s	000s	000s	000s	000s	%	000s	%	000s	%	000s	000s	
							2014 levels						
London	7,829	6,385	5,325	4,014	5,004	62.9	311	7.8	195	3.7	3,703	4,785	1,089
South East	8,497	6,976	5,197	4,402	4,650	63.1	173	3.9	76	1.5	4,229	4,514	339
East of England	5,795	4,742	3,479	2,970	2,989	62.6	133	4.5	70	2.0	2,837	2,885	74
South West	5,452	4,545	3,295	2,726	2,751	60.0	97	3.6	51	1.6	2,629	2,646	65
West Midlands	5,566	4,537	3,448	2,671	2,824	58.9	193	7.2	120	3.5	2,477	2,689	217
East Midlands	4,491	3,704	2,757	2,239	2,137	60.4	119	5.3	66	2.4	2,120	2,056	-56
Yorks & the Humber	5,214	4,287	3,252	2,584	2,658	60.3	116	4.5	72	2.2	2,468	2,540	105
North West	6,920	5,684	4,290	3,356	3,602	59.0	190	5.7	123	2.9	3,166	3,459	298
North East	2,551	2,123	1,591	1,178	1,185	55.5	80	6.8	54	3.4	1,098	1,120	25
England	52,315	42,983	32,634	26,139	27,800	60.8	1,412	5.4	828	2.5	24,727	26,694	2,155
Wales	3,069	2,532	1,863	1,415	1,384	55.9	97	6.9	60	3.2	1,318	1,318	-3
Scotland	5,079	4,254	3,207	2,548	2,714	59.9	185	7.3	115	3.6	2,362	2,572	228
Northern Ireland	1,731	1,391	1,072	796	875	57.2	46	5.8	40	3.8	750	816	78
United Kingdom	62,193	51,160	38,775	30,897	32,773	60.4	1,740	5.6	1,044	2.7	29,157	31,399	2,458

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.4).

Table 1.5: Total Employment by Country and Region

Regions/Countries	Total employment (000s)				% share of UK total				Change 1994-2004			Change 2004-2014		
	1984	1994	2004	2014	1984	1994	2004	2014	000s	%	% p.a.	000s	%	% p.a.
London	4063	3818	4496	4785	15.8	14.3	14.9	15.2	678	17.8	1.6	289	6.4	0.6
South East	3328	3638	4227	4514	13.0	13.6	14.0	14.4	589	16.2	1.5	287	6.8	0.7
East of England	2217	2354	2751	2885	8.6	8.8	9.1	9.2	397	16.8	1.6	134	4.9	0.5
South West	1964	2233	2545	2646	7.6	8.3	8.5	8.4	312	14.0	1.3	101	4.0	0.4
West Midlands	2331	2384	2599	2689	9.1	8.9	8.6	8.6	215	9.0	0.9	90	3.5	0.3
East Midlands	1711	1842	2004	2056	6.7	6.9	6.7	6.5	162	8.8	0.8	52	2.6	0.3
Yorks & the Humber	2114	2241	2444	2540	8.2	8.4	8.1	8.1	203	9.0	0.9	96	3.9	0.4
North West	2992	2994	3358	3459	11.7	11.2	11.2	11.0	364	12.1	1.2	101	3.0	0.3
North East	1032	1045	1093	1120	4.0	3.9	3.6	3.6	48	4.6	0.5	27	2.5	0.2
England	21754	22550	25517	26694	84.7	84.2	84.8	85.0	2968	13.2	1.2	1176	4.6	0.5
Wales	1117	1214	1271	1318	4.4	4.5	4.2	4.2	57	4.7	0.5	47	3.7	0.4
Scotland	2235	2369	2522	2572	8.7	8.8	8.4	8.2	153	6.5	0.6	50	2.0	0.2
Northern Ireland	570	643	789	816	2.2	2.4	2.6	2.6	146	22.7	2.1	28	3.5	0.3
United Kingdom	25676	26775	30099	31399	100.0	100.0	100.0	100.0	3324	12.4	1.2	1300	4.3	0.4

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.5)

Information on regional employment shares and changes over recent (1994 to 2004) and projection (2004 to 2014) periods is presented in *Table 1.5.*

All regions are projected to see an increase in total employment over the period to 2014.

The largest absolute increases in employment are expected in London and the South East (both around 290 thousand), followed by the East of England (around 135 thousand). Together these regions account for around 55 per cent of the projected gain in employment between 2004 and 2014. These are the only regions with projected rates of employment growth in excess of the UK average over the period to 2014 (0.4 per cent per annum).

The South West, Yorkshire & the Humber and Wales are expected to experience growth in employment at a rate akin to the UK average (0.4 per cent per annum).

Scotland and the North East display the slowest employment growth rates.

1.7 Sectoral Prospects

Information on projected employment change by broad sector over the period to 2014 is presented in *Table 1.6.* (Similar statistics disaggregated by gender presented in Table 1.7 [for males] and Table 1.8 [for females], but only limited reference is made to these tables in the commentary.)

At the broad sectoral level, projected job losses over the period to 2014 are concentrated in manufacturing (with an expected loss of over 380 thousand jobs across the UK). Smaller losses are projected for the primary sector & utilities (95 thousand jobs) and construction (just over 90 thousand jobs). In relative terms the projected losses in the primary sector & utilities are greater (a contraction of employment of nearly 16 per cent between 2004 and 2014) than in manufacturing (nearly 11 per cent) and construction (over 4 per cent). The largest job gains are projected for business & other services, with an expected gain of over 950 thousand jobs across the UK. This represents a projected growth rate of 1.2 per cent per annum. Smaller, but still substantial, gains of around 500 thousand jobs (a projected increase of 0.5 per cent per annum) in distribution, transport, etc, and nearly 420 thousand (representing a growth rate of 0.6 per cent per annum) in non-marketed services.

All regions share in the projected decline in employment in the *primary sector & utilities*. Males account for nearly all of this decrease. The South East and Northern Ireland record the slowest projected rates of employment decline (at 0.7 and 0.8 per cent per annum, respectively). Projected rates of loss of at least 2.4 per cent per annum are expected in London, the East of England, the West Midlands and Yorkshire & the Humber. Scotland is projected to lose the largest number of jobs in this broad sector (15 thousand), followed by the East of England (13 thousand), the West Midlands (12 thousand) and the South West (11 thousand).

The largest regional job losses in *manufacturing* employment are expected in the West Midlands (nearly 60 thousand), the North West (50 thousand), and in the East Midlands, the South West and Scotland (all around 40 thousand). Wales is expected to see the smallest loss of manufacturing jobs (7 thousand) of any part in the UK. This represents the slowest rate of decline (0.4 per cent per annum) in manufacturing employment of any region or country of the UK. The South East and Yorkshire & the Humber record the next slowest rates of loss at 0.7 per cent per annum and 0.8 per cent per annum, respectively. Across the UK males account for slightly more of the projected job losses in manufacturing (200 thousand) than females (over 180 thousand). However, in the South East, North West and Wales females are projected to suffer a larger number of job losses than males.

Projected increases in employment in *construction* are confined to London, the South East and the South West. However, in all of these instances projected gains are very modest: 3 thousand in the South West, 4 thousand in the South East and 8 thousand in London. The largest projected job losses (over 20 thousand in each case) are expected in the West Midlands and Yorkshire & the Humber. Scotland, Wales, Northern Ireland and the North West also display projected losses of at least 10 thousand jobs over the period to 2014. Since, males account for the vast majority of employment in construction; they also dominate the picture of employment change.

Regional variations in projected employment growth rates in *distribution, transport, etc* are limited, ranging from 0.3 per cent per annum in Scotland and the North West to 0.8 per cent per annum in the South East (over 110 thousand jobs) and 0.7 per cent per annum in the North East. Elsewhere rates of growth are similar to the UK average (0.5 per cent per annum). Across the UK females account for around 280 thousand of the net projected increase in jobs, compared with a projected net gain of around 220 thousand for females. However, there are some regional variations in patterns of employment gains by gender – for instance, in London nearly all of the projected gains are accounted for by females, whereas in the North East males account for most of the expected gains.

London is projected to experience the largest absolute increase in employment in *business & other services* over the period to 2014 with a net gain of over 195 thousand jobs. This is indicative of London's role as a global financial and business services centre. The next largest projected gain (135 thousand jobs) is expected in the South East. Except in the North East (where the projected increase in jobs in distribution, transport, etc, is similar) this broad sector dominates employment gains in every region over the period to 2014. Yorkshire & the Humber and the West Midlands record the highest rates of employment growth for this broad sector (1.5 per cent per annum). Other parts of the UK recording projected growth rates in excess of the UK average are Northern Ireland and Wales. The North East displays the slowest projected growth rate (0.9 per cent per annum). Males account for about two-thirds of the projected job gains in this broad sector, and except in Scotland, they dominate projected employment increases in this broad sector in all regions and country of the UK.

The West Midlands displays the highest rate (0.8 per cent per annum) of projected employment growth in *non-marketed services* over the period to 2014, followed by the South East, the South West and the East Midlands (0.7 per cent per annum). The North East displays the slowest growth rate of 0.1 per cent per annum. The South East records the largest expected absolute increase of 70 thousand jobs. Females account for nearly two-thirds of job gains in this sector across the UK. In the South West and Northern Ireland females are expected to constitute all of the gains.

Table 1.6: Projected Employment Growth by Broad Sector, 2004-2014

a) change in thousands

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-4	-31	8	71	196	49
South East	-6	-28	4	112	135	70
East of England	-13	-31	-2	53	90	37
South West	-11	-40	3	39	66	45
West Midlands	-12	-58	-22	40	90	52
East Midlands	-8	-43	-8	27	49	34
Yorks & the Humber	-11	-29	-21	44	87	26
North West	-4	-50	-10	36	90	38
North East	-3	-17	-2	22	22	5
England	-71	-328	-51	445	826	355
Wales	-6	-7	-14	16	37	21
Scotland	-15	-38	-17	23	71	26
Northern Ireland	-3	-9	-10	14	21	14
United Kingdom	-95	-383	-92	498	955	417

b) per cent change

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-27.9	-11.7	2.8	5.5	11.3	5.3
South East	-6.6	-7.0	1.4	8.8	10.9	7.6
East of England	-22.5	-9.6	-1.1	6.3	12.7	6.5
South West	-13.9	-14.0	1.7	5.0	11.0	7.1
West Midlands	-21.3	-13.3	-12.9	5.4	15.7	8.3
East Midlands	-16.3	-12.8	-5.4	4.7	12.2	6.9
Yorks & the Humber	-21.9	-8.1	-12.0	6.1	16.0	4.5
North West	-10.4	-11.1	-4.8	3.6	11.4	4.4
North East	-13.9	-11.1	-3.0	7.5	9.6	1.4
England	-15.7	-10.9	-2.9	5.9	12.1	6.0
Wales	-16.7	-4.0	-16.5	4.7	15.0	5.8
Scotland	-18.3	-15.0	-8.8	3.2	11.5	3.9
Northern Ireland	-7.3	-9.9	-16.9	6.6	15.3	5.7
United Kingdom	-15.6	-10.8	-4.4	5.6	12.2	5.8

c) per cent per annum change

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-3.2	-1.2	0.3	0.5	1.1	0.5
South East	-0.7	-0.7	0.1	0.8	1.0	0.7
East of England	-2.5	-1.0	-0.1	0.6	1.2	0.6
South West	-1.5	-1.5	0.2	0.5	1.1	0.7
West Midlands	-2.4	-1.4	-1.4	0.5	1.5	0.8
East Midlands	-1.8	-1.4	-0.5	0.5	1.2	0.7
Yorks & the Humber	-2.4	-0.8	-1.3	0.6	1.5	0.4
North West	-1.1	-1.2	-0.5	0.3	1.1	0.4
North East	-1.5	-1.2	-0.3	0.7	0.9	0.1
England	-1.7	-1.1	-0.3	0.6	1.2	0.6
Wales	-1.8	-0.4	-1.8	0.5	1.4	0.6
Scotland	-2.0	-1.6	-0.9	0.3	1.1	0.4
Northern Ireland	-0.8	-1.0	-1.8	0.6	1.4	0.6
United Kingdom	-1.7	-1.1	-0.4	0.5	1.2	0.6

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.6)

Table 1.7: Projected Male Employment Growth by Broad Sector, 2004-2014

a) change in thousands

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-3	-19	6	6	153	16
South East	-12	-9	1	52	84	19
East of England	-12	-19	-4	24	57	-5
South West	-9	-26	3	22	47	22
West Midlands	-9	-39	-21	22	62	8
East Midlands	-9	-21	-7	6	37	20
Yorks & the Humber	-9	-10	-20	18	70	16
North West	-5	-23	-9	26	59	32
North East	-2	-8	-3	14	12	6
England	-70	-172	-55	190	582	134
Wales	-5	-1	-13	12	21	18
Scotland	-13	-21	-16	13	31	5
Northern Ireland	-2	-5	-9	4	14	-5
United Kingdom	-90	-200	-93	219	647	151

b) per cent change

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-24.2	-10.6	2.5	0.7	15.7	5.3
South East	-18.6	-2.9	0.4	7.7	12.5	7.0
East of England	-31.1	-7.7	-2.1	5.3	15.1	-3.0
South West	-15.1	-12.0	1.6	5.4	14.8	11.6
West Midlands	-21.1	-11.8	-13.6	5.4	20.6	4.6
East Midlands	-24.7	-8.6	-5.7	1.9	17.2	16.4
Yorks & the Humber	-23.4	-3.5	-12.8	4.5	24.1	9.6
North West	-19.5	-6.5	-5.0	4.7	13.9	13.0
North East	-8.4	-6.8	-4.1	9.1	9.9	5.8
England	-20.6	-7.7	-3.5	4.6	15.7	7.8
Wales	-17.0	-0.8	-16.9	7.1	15.9	15.7
Scotland	-18.0	-11.6	-9.3	3.4	9.6	2.6
Northern Ireland	-5.8	-7.1	-16.3	3.6	18.8	-6.9
United Kingdom	-19.0	-7.6	-5.0	4.6	15.3	7.2

c) per cent per annum change

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-2.7	-1.1	0.3	0.1	1.5	0.5
South East	-2.0	-0.3	0.0	0.7	1.2	0.7
East of England	-3.7	-0.8	-0.2	0.5	1.4	-0.3
South West	-1.6	-1.3	0.2	0.5	1.4	1.1
West Midlands	-2.3	-1.2	-1.4	0.5	1.9	0.4
East Midlands	-2.8	-0.9	-0.6	0.2	1.6	1.5
Yorks & the Humber	-2.6	-0.4	-1.4	0.4	2.2	0.9
North West	-2.1	-0.7	-0.5	0.5	1.3	1.2
North East	-0.9	-0.7	-0.4	0.9	0.9	0.6
England	-2.3	-0.8	-0.4	0.4	1.5	0.8
Wales	-1.8	-0.1	-1.8	0.7	1.5	1.5
Scotland	-2.0	-1.2	-1.0	0.3	0.9	0.3
Northern Ireland	-0.6	-0.7	-1.8	0.4	1.7	-0.7
United Kingdom	-2.1	-0.8	-0.5	0.4	1.4	0.7

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.7)

Table 1.8: Projected Female Employment Growth by Broad Sector, 2004-2014

a) change in thousands

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-1	-12	2	65	43	32
South East	6	-19	3	59	50	52
East of England	0	-13	2	29	34	42
South West	-2	-14	0	17	19	23
West Midlands	-3	-19	-1	18	27	44
East Midlands	1	-22	0	21	13	13
Yorks & the Humber	-1	-20	-1	26	17	10
North West	1	-28	-1	10	31	5
North East	-1	-9	0	8	10	-1
England	-1	-155	4	255	244	221
Wales	-1	-6	-1	4	16	3
Scotland	-3	-17	-1	10	40	21
Northern Ireland	-1	-4	-1	10	8	20
United Kingdom	-5	-183	2	279	308	265

b) per cent change

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-39.5	-14.0	5.1	12.6	5.7	5.2
South East	19.0	-18.6	10.6	10.0	9.1	7.9
East of England	-2.3	-14.7	7.6	7.4	10.1	9.9
South West	-9.5	-20.2	2.5	4.6	6.7	5.2
West Midlands	-22.1	-18.5	-7.3	5.4	10.2	9.7
East Midlands	10.4	-23.8	-2.8	7.9	6.6	3.7
Yorks & the Humber	-15.0	-23.1	-5.0	7.9	6.8	2.5
North West	14.8	-26.3	-2.6	2.2	8.4	0.9
North East	-45.1	-27.1	7.4	5.8	9.3	-0.4
England	-1.0	-20.3	2.4	7.5	7.8	5.3
Wales	-15.4	-13.3	-11.5	2.2	14.1	1.4
Scotland	-20.4	-23.6	-4.4	3.0	13.6	4.4
Northern Ireland	-23.5	-19.2	-24.8	10.1	11.5	11.1
United Kingdom	-3.9	-20.2	0.8	6.9	8.6	5.2

c) per cent per annum change

Regions/Countries	Primary & utilities	Manufacturing	Construction	Distribution, transport etc	Business & other services	Non-marketed services
London	-4.9	-1.5	0.5	1.2	0.6	0.5
South East	1.8	-2.0	1.0	1.0	0.9	0.8
East of England	-0.2	-1.6	0.7	0.7	1.0	1.0
South West	-1.0	-2.2	0.3	0.5	0.7	0.5
West Midlands	-2.5	-2.0	-0.8	0.5	1.0	0.9
East Midlands	1.0	-2.7	-0.3	0.8	0.6	0.4
Yorks & the Humber	-1.6	-2.6	-0.5	0.8	0.7	0.2
North West	1.4	-3.0	-0.3	0.2	0.8	0.1
North East	-5.8	-3.1	0.7	0.6	0.9	0.0
England	-0.1	-2.2	0.2	0.7	0.8	0.5
Wales	-1.7	-1.4	-1.2	0.2	1.3	0.1
Scotland	-2.3	-2.7	-0.5	0.3	1.3	0.4
Northern Ireland	-2.6	-2.1	-2.8	1.0	1.1	1.1
United Kingdom	-0.4	-2.2	0.1	0.7	0.8	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.8)

1.8 Employment by Gender and Status

Table 1.9 shows the shares of total employment accounted for by gender and employment status, distinguishing:

- (a) males,
- (b) females,
- (c)-(e) full-time employees (disaggregated by gender),
- (f)-(h) part-time employees (disaggregated by gender), and
- (i) self-employment.

Gender

In 1984, females comprised 43 per cent of those in employment in the UK. There was a considerable increase in the number of females in employment over the following decade, and by 1994 females accounted for 47.5 per cent of those in employment. Since then male and female shares of total employment have remained, and are projected to remain, relatively stable, with females accounting for around 47 per cent of total employment, as both males and females share in employment gains.

In 1984 the North West, the South East Scotland and the North East recorded the largest proportions (at least 44 per cent) of total employment accounted for by females, while the West Midlands, Wales and Northern Ireland displayed the smallest proportions (less than 42 per cent). All regions shared in the increase in total employment accounted for by females during the 1980s. By 2004 shares of total employment accounted for by females ranged from around 45 per cent in London to over 48 per cent in Scotland. By 2014 projected shares are expected to range from around 45 per cent in London and Yorkshire & the Humber to 49 per cent in Scotland and Northern Ireland.

The shares of total employment accounted for by females are projected to decline in the three northernmost regions of England and Wales between 2004 and 2014, while projected percentage point increases in shares for females are most pronounced in the East of England and the West Midlands.

Full-time and part-time employees by gender

In 1984 66 per cent of employees in the UK worked full-time. By 1994 this share had decreased to 60 per cent. There was a modest reduction over the subsequent decade to 2004 and over the period to 2014 the share of employees working full-time is projected to remain stable at around 59.5 per cent.

The proportion of total employment accounted for by full-time employees fell steadily in all regions between 1984 and 1994. Regions bucking the trend of a further, albeit more modest, increase in the share of full-time employees in the period from 1994 to 2004 included the South East, the North East and Wales, while continuing decline was most pronounced in Northern Ireland and the East Midlands. Over the period to 2014 the North West and South East are projected to see increases in the share of employees working full-time, while projected decreases are particularly pronounced in Northern Ireland and Wales.

The share of employees working full-time ranged from under 54 per cent in the South West in 2004 to over 65 per cent in London. Throughout the period under consideration here, a distinctive feature of London is the higher than average share of employees working on a full-time basis. By 2014 it is expected that less than 53 per cent of employees in the South West will be working full-time, compared with 65 per cent in London and 63 per cent in the North East. Along with the South West, regions with smaller than average projected shares of full-time employees in 2014 are Northern Ireland, Wales, the East of England, the Eat Midlands and the South East.

Across the UK the share of total employment accounted for by male full-time employees is projected to decline very slightly to just over 37 per cent of total employment in 2014, compared with 38 per cent in 1994 and over 44 per cent in 1982. The decline in the share of male full-time employees over the long-term has been most marked in Northern Ireland and Scotland. At regional level the share of total employment accounted for by male full-time employees is highest in the West Midlands and London (over 39 per cent) and lowest in the South West (less than 34 per cent). London also displays the highest proportion of female full-time employees (26 per cent) and the South West the lowest share (less than 20 per cent).

All regions have shared in the national increase of total employment accounted for by male part-time employees: at UK level male part-time employees comprised 7 per cent of all employees in the UK in 2004, up from less than 4 per cent in 1984. This share is projected to rise to nearly 8 per cent by 2014 across the UK and to 9 per cent in Wales, Northern Ireland and the South West. Female part-time employees are projected to account for over 21 per cent of total employment in 2014 – a similar proportion to 1994, but slightly up from 2004. London, the North West and the North East are projected to record slightly smaller shares of female part-time employees in 2014 than in 2004. By 2014 female part-time employees are expected to account for around 24 per cent of total employment in Northern Ireland and the South West, but a mere 14 per cent in London.

Self-employed

The overall share of self employment in the UK rose from a 12 per cent in 1984 to 14 per cent share in 1994. This then fell to 13 per cent in 2004. By 2014 this share is expected to have contracted further to just over 11 per cent – representing a contraction from 3.87 million to 3.58 million across the UK between 2004 and 2014. When interpreting trends in self-employment it should be borne in mind that changes reflect a number of different factors, including tax treatment, the balance of incentives and disincentives to becoming self-employed, and different motivations: some individuals make a positive decision to become self-employed, while others feel ‘pushed’ into self-employment.

In 2004 the share of total employment accounted for by the self-employed ranged from less than 9 per cent in the North East and West Midlands to around 14 per cent in the East of England and the South West. These inter-regional differentials are projected to persist over the period to 2014, with all southern regions displaying shares of self-employed in excess of the UK average, along with Northern Ireland and Wales.

Table 1.9: Employment by Gender and Employment Status, 1984-2014

a) males

Regions/Countries	1984 000s	1984 %	1994 000s	1994 %	2004 000s	2004 %	2014 000s	2014 %
London	2,351	57.9	2,036	53.3	2,482	55.2	2,642	55.2
South East	1,856	55.8	1,904	52.4	2,256	53.4	2,392	53.0
East of England	1,279	57.7	1,248	53.0	1,468	53.4	1,508	52.3
South West	1,113	56.7	1,144	51.2	1,342	52.8	1,400	52.9
West Midlands	1,367	58.6	1,284	53.9	1,406	54.1	1,430	53.2
East Midlands	977	57.1	982	53.3	1,067	53.3	1,093	53.2
Yorks & the Humber	1,214	57.4	1,161	51.8	1,329	54.4	1,394	54.9
North West	1,670	55.8	1,564	52.2	1,790	53.3	1,871	54.1
North East	578	56.0	529	50.6	578	52.9	597	53.4
England	12,405	57.0	11,852	52.6	13,720	53.8	14,328	53.7
Wales	650	58.2	638	52.5	672	52.9	704	53.4
Scotland	1,250	55.9	1,209	51.0	1,303	51.7	1,302	50.6
Northern Ireland	332	58.2	353	54.9	420	53.2	416	51.0
United Kingdom	14,637	57.0	14,052	52.5	16,115	53.5	16,749	53.3

b) females

Regions/Countries	1984 000s	1984 %	1994 000s	1994 %	2004 000s	2004 %	2014 000s	2014 %
London	1,713	42.1	1,782	46.7	2,014	44.8	2,143	44.8
South East	1,472	44.2	1,733	47.6	1,971	46.6	2,122	47.0
East of England	937	42.3	1,106	47.0	1,283	46.6	1,377	47.7
South West	851	43.3	1,089	48.8	1,202	47.2	1,246	47.1
West Midlands	964	41.4	1,100	46.1	1,193	45.9	1,260	46.8
East Midlands	734	42.9	861	46.7	937	46.7	962	46.8
Yorks & the Humber	901	42.6	1,080	48.2	1,115	45.6	1,146	45.1
North West	1,322	44.2	1,430	47.8	1,568	46.7	1,588	45.9
North East	455	44.0	516	49.4	515	47.1	522	46.6
England	9,349	43.0	10,698	47.4	11,798	46.2	12,366	46.3
Wales	467	41.8	576	47.5	599	47.1	614	46.6
Scotland	985	44.1	1,160	49.0	1,219	48.3	1,270	49.4
Northern Ireland	238	41.8	290	45.1	369	46.8	400	49.0
United Kingdom	11,039	43.0	12,723	47.5	13,985	46.5	14,650	46.7

Continued

Table 1.9: Employment by Gender and Employment Status, 1984-2014 (continued)

c) total full time employees

Regions/Countries	1984		1994		2004		2014	
	000s	%	000s	%	000s	%	000s	%
London	2,923	71.9	2,536	66.4	2,945	65.5	3,106	64.9
South East	2037	61.2	2,057	56.5	2,408	57.0	2,618	58.0
East of England	1,370	61.8	1,334	56.7	1,556	56.6	1,625	56.3
South West	1,190	60.6	1,218	54.6	1,362	53.5	1,398	52.8
West Midlands	1,588	68.1	1,476	61.9	1,593	61.3	1,633	60.7
East Midlands	1,133	66.2	1,105	60.0	1,157	57.7	1,181	57.5
Yorks & the Humber	1,369	64.7	1,332	59.4	1,447	59.2	1,505	59.3
North West	1,938	64.8	1,829	61.1	2,035	60.6	2,136	61.7
North East	699	67.7	643	61.5	683	62.5	705	63.0
England	14,247	65.5	13,530	60.0	15,184	59.5	15,908	59.6
Wales	711	63.7	697	57.4	734	57.8	747	56.7
Scotland	1,538	68.8	1,489	62.8	1,561	61.9	1,580	61.4
Northern Ireland	381	66.8	396	61.6	444	56.3	446	54.6
United Kingdom	16,877	65.7	16,111	60.2	17,924	59.6	18,681	59.5

d) male full time employees

Regions/Countries	1984		1994		2004		2014	
	000s	%	000s	%	000s	%	000s	%
London	1,905	46.9	1,500	39.3	1,765	39.3	1,835	38.4
South East	1,360	40.8	1,294	35.6	1,509	35.7	1,629	36.1
East of England	947	42.7	865	36.7	985	35.8	1,013	35.1
South West	814	41.5	767	34.4	858	33.7	881	33.3
West Midlands	1,089	46.7	962	40.3	1,026	39.5	1,045	38.8
East Midlands	773	45.2	720	39.1	744	37.1	767	37.3
Yorks & the Humber	959	45.3	869	38.8	952	38.9	993	39.1
North West	1,305	43.6	1,167	39.0	1,285	38.3	1,366	39.5
North East	476	46.1	405	38.8	433	39.6	449	40.1
England	9,628	44.3	8,549	37.9	9,555	37.4	9,977	37.4
Wales	485	43.5	444	36.6	461	36.2	482	36.6
Scotland	1,010	45.2	930	39.3	960	38.1	972	37.8
Northern Ireland	239	42.0	239	37.2	268	34.0	257	31.5
United Kingdom	11,363	44.3	10,163	38.0	11,244	37.4	11,688	37.2

Continued

Table 1.9: Employment by Gender and Employment Status, 1984-2014 (continued)

e) female full time employees

Regions/Countries	1984		1994		2004		2014	
	000s	%	000s	%	000s	%	000s	%
London	1,018	25.1	1,036	27.1	1,180	26.2	1,270	26.5
South East	677	20.3	763	21.0	899	21.3	990	21.9
East of England	423	19.1	469	19.9	571	20.8	613	21.2
South West	376	19.1	451	20.2	504	19.8	517	19.5
West Midlands	500	21.4	514	21.6	567	21.8	589	21.9
East Midlands	359	21.0	385	20.9	413	20.6	415	20.2
Yorks & the Humber	410	19.4	462	20.6	495	20.3	512	20.2
North West	633	21.2	663	22.1	751	22.3	770	22.3
North East	223	21.6	238	22.8	250	22.9	256	22.9
England	4,619	21.2	4,981	22.1	5,629	22.1	5,931	22.2
Wales	226	20.2	253	20.8	274	21.5	265	20.1
Scotland	528	23.6	558	23.6	602	23.9	608	23.7
Northern Ireland	142	24.8	157	24.4	176	22.3	188	23.0
United Kingdom	5,514	21.5	5,949	22.2	6,680	22.2	6,993	22.3

f) total part time employees

Regions/Countries	1984		1994		2004		2014	
	000s	%	000s	%	000s	%	000s	%
London	754	18.6	777	20.4	985	21.9	1,078	22.5
South East	795	23.9	968	26.6	1,185	28.0	1,328	29.4
East of England	515	23.2	637	27.1	774	28.1	864	29.9
South West	463	23.6	613	27.5	784	30.8	870	32.9
West Midlands	490	21.0	609	25.5	715	27.5	816	30.3
East Midlands	388	22.7	494	26.8	593	29.6	643	31.3
Yorks & the Humber	505	23.9	633	28.2	711	29.1	785	30.9
North West	684	22.8	799	26.7	938	27.9	986	28.5
North East	241	23.3	293	28.1	308	28.2	318	28.4
England	4,834	22.2	5,823	25.8	6,994	27.4	7,687	28.8
Wales	230	20.6	319	26.3	374	29.4	430	32.6
Scotland	492	22.0	628	26.5	701	27.8	756	29.4
Northern Ireland	113	19.9	161	25.1	234	29.7	269	32.9
United Kingdom	5,669	22.1	6,931	25.9	8,302	27.6	9,142	29.1

Continued

Table 1.9: Employment by Gender and Employment Status, 1984-2014 (continued)

g) male part time employees

Regions/Countries	1984		1994		2004		2014	
	000s	%	000s	%	000s	%	000s	%
London	167	4.1	179	4.7	321	7.1	388	8.1
South East	151	4.6	175	4.8	296	7.0	347	7.7
East of England	88	4.0	106	4.5	184	6.7	214	7.4
South West	82	4.2	99	4.4	198	7.8	235	8.9
West Midlands	80	3.4	97	4.0	161	6.2	195	7.3
East Midlands	63	3.7	81	4.4	139	6.9	155	7.6
Yorks & the Humber	76	3.6	91	4.1	164	6.7	203	8.0
North West	101	3.4	126	4.2	234	7.0	275	8.0
North East	32	3.1	44	4.2	67	6.2	73	6.5
England	841	3.9	997	4.4	1,764	6.9	2,084	7.8
Wales	34	3.1	49	4.0	91	7.1	118	9.0
Scotland	77	3.4	93	3.9	154	6.1	160	6.2
Northern Ireland	28	4.8	39	6.1	61	7.7	72	8.9
United Kingdom	980	3.8	1178	4.4	2,071	6.9	2,435	7.8

h) female part time employees

Regions/Countries	1984		1994		2004		2014	
	000s	%	000s	%	000s	%	000s	%
London	587	14.4	598	15.7	664	14.8	690	14.4
South East	643	19.3	793	21.8	889	21.0	982	21.7
East of England	427	19.2	531	22.6	590	21.5	650	22.5
South West	381	19.4	514	23.0	586	23.0	635	24.0
West Midlands	410	17.6	512	21.5	554	21.3	620	23.1
East Midlands	324	19.0	413	22.4	454	22.7	488	23.7
Yorks & the Humber	429	20.3	542	24.2	547	22.4	582	22.9
North West	583	19.5	674	22.5	705	21.0	711	20.5
North East	209	20.2	249	23.8	241	22.0	245	21.9
England	3,993	18.4	4,825	21.4	5,229	20.5	5,603	21.0
Wales	196	17.5	270	22.3	283	22.3	312	23.7
Scotland	415	18.6	535	22.6	546	21.7	596	23.2
Northern Ireland	86	15.1	122	19.0	173	21.9	196	24.1
United Kingdom	4,689	18.3	5,752	21.5	6,232	20.7	6,707	21.4

Continued

Table 1.9: Employment by Gender and Employment Status, 1984-2014 (continued)

i) total self employed

Regions/Countries	**1984**		**1994**		**2004**		**2014**	
	000s	**%**	**000s**	**%**	**000s**	**%**	**000s**	**%**
London	387	9.5	505	13.2	566	12.6	601	12.6
South East	497	14.9	613	16.9	634	15.0	567	12.6
East of England	332	15.0	383	16.3	421	15.3	396	13.7
South West	311	15.8	401	18.0	399	15.7	378	14.3
West Midlands	252	10.8	299	12.5	292	11.2	241	8.9
East Midlands	191	11.2	244	13.2	254	12.7	231	11.3
Yorks & the Humber	240	11.4	277	12.4	286	11.7	250	9.9
North West	370	12.4	366	12.2	385	11.5	337	9.8
North East	92	8.9	109	10.4	103	9.4	97	8.6
England	2,672	12.3	3,197	14.2	3,340	13.1	3,099	11.6
Wales	176	15.8	198	16.3	163	12.8	140	10.6
Scotland	206	9.2	252	10.7	260	10.3	236	9.2
Northern Ireland	75	13.2	86	13.3	110	14.0	102	12.5
United Kingdom	3,130	12.2	3,733	13.9	3873	12.9	3577	11.4

All employment

Regions/Countries	**1984**		**1994**		**2004**		**2014**	
	000s	**%**	**000s**	**%**	**000s**	**%**	**000s**	**%**
London	4,063	100.0	3,818	100.0	4,496	100.0	4,785	100.0
South East	3,328	100.0	3,638	100.0	4,227	100.0	4,514	100.0
East of England	2,217	100.0	2,354	100.0	2,751	100.0	2,885	100.0
South West	1,964	100.0	2,233	100.0	2,545	100.0	2,646	100.0
West Midlands	2,331	100.0	2,384	100.0	2,599	100.0	2,689	100.0
East Midlands	1,711	100.0	1,842	100.0	2,004	100.0	2,056	100.0
Yorks & the Humber	2,114	100.0	2,241	100.0	2,444	100.0	2,540	100.0
North West	2,992	100.0	2,994	100.0	3,358	100.0	3,459	100.0
North East	1,032	100.0	1,045	100.0	1,093	100.0	1,120	100.0
England	21,754	100.0	22,550	100.0	25,517	100.0	26,694	100.0
Wales	1,117	100.0	1,214	100.0	1,271	100.0	1,318	100.0
Scotland	2,235	100.0	2,369	100.0	2,522	100.0	2,572	100.0
Northern Ireland	570	100.0	643	100.0	789	100.0	816	100.0
United Kingdom	25,676	100.0	26,775	100.0	30,099	100.0	31,399	100.0

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.9)

Table 1.10 shows projected change in full-time employees, part-time employees and the self-employed by gender.

Between 2004 and 2014 increases of 840 thousand part-time employees and nearly 760 thousand full-time employees are expected across the UK. Over the same period self-employment in projected to decline by nearly 300 thousand.

All regions and countries of the UK are expected to share in the increases in full-time employees and part-time employees. Projected increase in self-employment is confined to London.

The South East and the North West are expected to see the largest net gains in *male full-time employees* (120 thousand and 80 thousand, respectively) and the fastest growth rates (0.8 per cent and 0.6 per cent, respectively). Projected rates of increase in *male part-time employees* range from less than 1 per cent per annum in Scotland and the North East to in excess of 2 per cent per annum in Scotland and Yorkshire & the Humber. In the East of England, the South West, the West Midlands, Wales and Northern Ireland absolute gains in male part-time employees exceed gains in male full-time employees (or loss of male full-time employees in the Northern Ireland case).

Except in London, the North West and the North East, projected gains in *female part-time employees* exceed those in *female full-time employees.* The South East, London, the East of England and Northern Ireland display the fastest projected rates of growth in female full-time employees. In Wales a small loss of female full-time employees is expected, while in the East Midlands the number of female full-time employees is projected to remain fairly stable. All parts of the UK are projected to share in gains in female full-time employees, with Northern Ireland, the West Midlands, the South East, the East of England and Wales recording projected annual rates of increase of at least 1 per cent (compared with a projected 0.7 per cent per annum growth rate across the UK).

Projected rates of decline in self-employment are greatest than average in the West Midlands (1.9 per cent per annum), Wales (1.5 per cent per annum) and Yorkshire & the Humber and the North West (1.3 per cent per annum). The East of England, the South West and the North East record the slowest rates of projected decline in self-employment (at 0.6 per cent per annum). In all parts of the UK, except London, both males and females share in the decline in numbers of self-employed.

Table 1.10: Change in Employment Status by Gender, 2004-2014

a) change in thousands

Regions/Countries	Males			Females			Total		
	FT	PT	SE	FT	PT	SE	FT	PT	SE
London	70	67	23	91	26	12	161	92	35
South East	119	50	-34	91	93	-33	210	143	-67
East of England	28	30	-18	41	60	-7	69	90	-25
South West	23	37	-2	14	50	-20	36	86	-21
West Midlands	18	34	-29	22	66	-22	41	100	-51
East Midlands	23	16	-13	2	34	-10	25	50	-23
Yorks & the Humber	41	39	-16	17	35	-21	58	74	-36
North West	81	42	-42	19	6	-5	101	48	-48
North East	17	5	-2	6	4	-3	23	10	-6
England	421	320	-133	303	374	-108	724	694	-241
Wales	22	27	-17	-9	29	-6	13	56	-23
Scotland	12	6	-19	7	49	-5	18	55	-24
Northern Ireland	-11	11	-4	12	23	-4	1	35	-8
United Kingdom	444	364	-173	313	475	-123	756	840	-296

b) per cent change

Regions/Countries	Males			Females			Total		
	FT	PT	SE	FT	PT	SE	FT	PT	SE
London	4.0	20.7	5.7	7.7	3.9	7.2	5.5	9.4	6.2
South East	7.9	17.0	-7.5	10.1	10.4	-17.9	8.7	12.1	-10.5
East of England	2.8	16.3	-5.9	7.2	10.1	-6.0	4.4	11.6	-5.9
South West	2.7	18.5	-0.6	2.7	8.5	-17.4	2.7	11.0	-5.4
West Midlands	1.8	21.2	-13.3	3.9	11.9	-30.0	2.5	14.0	-17.5
East Midlands	3.1	11.5	-7.0	0.4	7.4	-14.1	2.1	8.4	-9.0
Yorks & the Humber	4.3	23.8	-7.3	3.4	6.4	-28.5	4.0	10.4	-12.6
North West	6.3	17.9	-15.5	2.6	0.8	-4.6	4.9	5.1	-12.4
North East	3.9	7.8	-3.1	2.4	1.9	-13.3	3.3	3.2	-5.5
England	4.4	18.1	-5.5	5.4	7.1	-11.5	4.8	9.9	-7.2
Wales	4.7	29.9	-14.1	-3.1	10.3	-13.2	1.8	15.0	-13.9
Scotland	1.2	3.8	-10.0	1.1	9.0	-7.0	1.2	7.9	-9.2
Northern Ireland	-4.1	18.5	-4.3	6.9	13.5	-21.5	0.3	14.8	-7.5
United Kingdom	3.9	17.6	-6.2	4.7	7.6	-11.4	4.2	10.1	-7.6

c) per cent per annum change

Regions/Countries	Males			Females			Total		
	FT	PT	SE	FT	PT	SE	FT	PT	SE
London	0.4	1.9	0.6	0.7	0.4	0.7	0.5	0.9	0.6
South East	0.8	1.6	-0.8	1.0	1.0	-1.9	0.8	1.1	-1.1
East of England	0.3	1.5	-0.6	0.7	1.0	-0.6	0.4	1.1	-0.6
South West	0.3	1.7	-0.1	0.3	0.8	-1.9	0.3	1.1	-0.6
West Midlands	0.2	1.9	-1.4	0.4	1.1	-3.5	0.3	1.3	-1.9
East Midlands	0.3	1.1	-0.7	0.0	0.7	-1.5	0.2	0.8	-0.9
Yorks & the Humber	0.4	2.2	-0.8	0.3	0.6	-3.3	0.4	1.0	-1.3
North West	0.6	1.7	-1.7	0.3	0.1	-0.5	0.5	0.5	-1.3
North East	0.4	0.8	-0.3	0.2	0.2	-1.4	0.3	0.3	-0.6
England	0.4	1.7	-0.6	0.5	0.7	-1.2	0.5	1.0	-0.7
Wales	0.5	2.6	-1.5	-0.3	1.0	-1.4	0.2	1.4	-1.5
Scotland	0.1	0.4	-1.1	0.1	0.9	-0.7	0.1	0.8	-1.0
Northern Ireland	-0.4	1.7	-0.4	0.7	1.3	-2.4	0.0	1.4	-0.8
United Kingdom	0.4	1.6	-0.6	0.5	0.7	-1.2	0.4	1.0	-0.8

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.10)

1.9 Occupational Prospects

This section concentrates on employment projections for the nine SOC Major Groups. *Table 1.11* presents details of projected change in total employment by occupation by region over the period to 2014. (Similar statistics disaggregated by gender are presented in Table 1.12 (for males) and Table 1.13 (for females). These tables are included for reference purposes only). The statistics presented relate to structural demand (i.e. 'expansion demand' changes). For a fuller picture of the changing demand for different occupations it is necessary to bear in mind the impacts of retirements, inter-occupational moves, etc, as captured by 'replacement demand', (as discussed in the next section).

Overview

There are some quite marked differences in occupational structure across regions. These reflect their different industrial employment structures. For example, the concentration of business services in London and the South East is a key factor behind their above average employment shares in managerial, professional and associate professional occupations. Similarly, the concentration of skilled trades in certain regions reflects the importance of manufacturing in these regions. Despite these differences, the main changes in occupational structure within industries are common across all regions.

At the level of SOC Major Groups, the largest increases in occupational employment *across the UK* between 2004 and 2014 are projected for professional occupations (a gain of nearly 700 thousand) and Managers & senior officials (a gain of nearly 620 thousand jobs). The next largest increases are projected for Associate professional & technical occupations (a gain of nearly 460 thousand jobs), personal service occupations (nearly 424 thousand extra jobs) and Sales & customer service occupations (375 thousand additional jobs are expected). Elementary occupations dominate the picture of projected losses, with a decline of 675 thousand jobs expected across the UK. The next largest loss is projected for Administrative, clerical & secretarial occupations (around 325 thousand jobs). Losses of around 150 thousand jobs in skilled trades occupations and of 120 thousand in Machine & transport operatives are expected.

The main dimensions of employment change by region in each Major Group are outlined in the remainder of this section.

Managers & senior officials

In 2004 managers & senior officials accounted for just over 15 per cent of total employment in the UK, but for about 18 per cent of the total in London and the South East. The East of England was the only other region to display a share of employment in this Major Group in excess of the UK average. By contrast, managers & senior officials accounted for only around 12 per cent of total employment in Northern Ireland, Wales and the North East.

The south-eastern regions (London, the South East and the East of England) dominate employment gains for managers & senior officials in absolute terms, and are the only parts of the UK where the projected annual average growth rate in employment for the period to 2014 exceeds the UK average of 1.3 per cent per annum. Hence, the above average representation of managers & senior officials in total employment is projected to become even more pronounced in southern England. All regions are expected to experience a projected increase in employment over the period to 2014. The slowest rates of increase (slightly less than 1 per cent per annum) are expected the North West and the North East.

Professional occupations

London has easily the largest share of total employment accounted for by professional occupations (over 14 per cent in 2004, compared with the UK average of nearly 12 per cent). The South East and Scotland London and Scotland are the only other regions with a greater than UK average share of such employment. With 150 thousand extra jobs expected, by 2014 the share of total employment in London accounted for by professional occupations is projected to increase to over 20 per cent. Yorkshire & the Humber, the West Midlands and the East Midlands display the lowest shares of employment accounted for by professional occupations. The share of employment in professional occupations is projected to increase across all regions over the period to 2014.

London displays the largest projected employment gains (nearly 170 thousand jobs) and has easily the fastest rate of projected employment growth (2.3 per cent per annum, compared to the UK average of 1.8 per cent per annum). This serves to reinforce the occupational distinctiveness of London. Scotland is the only other part of the UK where the annual average growth rate (2.0 per cent) exceeds that for the UK. The North East and the South East display the slowest projected rates of annual average employment increase (1.4 per cent and 1.5 per cent, respectively). Other regions display rates of employment growth close to the UK average for professional occupations.

Associate professional & technical occupations

The share of employment in associate professional & technical occupations is above average in London (nearly 19 per cent of total employment) and the South East (15 per cent of total employment) relative to the UK (just over 14 per cent of the total). By contrast, in the East Midlands, Yorkshire & the Humber and Wales less than 13 per cent of total employment is accounted for by those in associate professional & technical occupations.

As for professional occupations, so for associate professional & technical occupations, easily the fastest rate of employment growth is expected in London (1.8 per cent per annum, compared with the UK average of 1.0 per cent per annum). The West Midlands, the East of England and Northern Ireland are the only other regions where projected employment growth rates match or exceed the UK average. Scotland, the North West and the North East record the slowest projected growth rates for this occupational group (0.5 per cent per annum).

Administrative, clerical & secretarial occupations

There is less inter-regional variation in the proportion of total employment accounted for by administrative, clerical & secretarial occupations than in the case of higher level non-manual occupations. As for managerial, professional and associate professional & technical occupations, administrative, clerical & secretarial occupations accounted for a larger share of total employment (around 13 per cent) in London and the South East than in other parts of the UK (just under 13 per cent), although Scotland and the North West display equally higher or higher shares. Wales and the East Midlands display the lowest shares of such employment (11.5 per cent in 2004).

The regional pattern of projected employment change is markedly different from that for the higher level non-manual occupations. Employment in administrative, clerical & secretarial occupations is projected to decline by around 325 thousand across the UK. With the exception of the West Midlands and Yorkshire & the Humber where employment levels are projected to remain fairly stable, all parts of the UK are expected to share in this decrease. However, there is a stark contrast between greater than average rates of projected employment loss in London (3.1 per cent per annum) and the South East and South West (1.2 per cent per annum), coupled with similar to average rates of employment decrease in the East Midlands and East of England, and slower than average rates of employment decline in Wales and northern parts of the UK. This regional pattern of projected employment losses is indicative of a shift of such functions away from the London and south-eastern England.

Skilled trades occupations

Northern Ireland and the West Midlands display the highest shares of total employment accounted for by skilled trades occupations (more than 13 per cent in 2004). London and the South East, along with the North West, are the only regions with lower than UK average proportions of total employment for skilled trades occupations.

Across the UK employment in skilled trades occupations is projected to decline by 0.4 per cent per annum over the period to 2014. All parts of the UK with the exception of the South East (where a growth rate of 0.2 per cent per annum is projected) and the South West (where employment levels are expected to remain stable) are projected to share in employment losses. The other ‘southern’ regions – the East of England and London – display projected rates of employment loss slower than are similar to the UK average. In absolute terms, the two midlands regions display the greatest projected job losses, with at least 25 thousand jobs expected to be shed in each of the West Midlands and East Midlands, as projected rates of loss (1.1. per cent per annum in the East Midlands and 0.9 per cent per annum in the West Midlands) exceed those in all other parts of the UK. Northern parts of the UK display projected rates of employment loss slightly greater than the UK average.

Personal service occupations

This Major Group accounts for a smaller proportion of total employment (7.5 per cent) than any of the others in 2004. Across the UK the share of total employment in personal service occupations ranges from just over 6 per cent in London to 9.5 per cent in Northern Ireland (which is markedly higher than any other region). Alongside London, Scotland, the East of England and the South East display smaller shares of employment in personal service occupations than the UK average.

At 1.7 per cent per annum, the projected growth rate for personal service occupations at UK level is second only to that expected for professional occupations. The West Midlands and South East display the fastest projected growth rates (2.3 and 2.2 per cent per annum, respectively). This represents a gain of over 50 thousand jobs in the West Midlands and 75 thousand jobs in the South East. By contrast, for London and Scotland the projected rate of growth is a mere 0.8 per cent per annum, followed by the North East (0.9 per cent per annum). All other parts of the UK display projected growth rates in the range 1.8 to 2.0 per cent per annum.

Sales & customer service occupations

The North East, South West and Yorkshire & the Humber record the largest shares of total employment in this occupational group in 2004 (around 9 per cent). London records easily the smallest share (just over 6 per cent of total employment), followed by the West Midlands and the South East with less than 8 per cent (which is the UK average share).

All regions are projected to share in the employment growth in this SOC Major Group over the period to 2014. The North East and South East display the fastest rates of growth (1.8 per cent per annum), followed by the East Midlands (1.7 per cent per annum) and South West (1.6 per cent per annum). The UK average projected annual average growth rate is 1.5 per cent. Projected employment rates are slowest in Wales and Scotland.

Machine & transport operatives

There are marked inter-regional disparities in the share of total employment accounted for by this occupational group. London and the South East display the greatest under-representation of such employment in 2004, with only 5 per cent and 6 per cent, respectively, of total employment accounted for by Machine & transport operatives, compared with 8 per cent across the UK. The South West and East of England, along with Northern Ireland, also display lower than average shares. By contrast, in Wales, the West Midlands, the East Midlands and Yorkshire & the Humber, this occupational group accounts for around 10 per cent of total employment.

All parts of the UK, except Wales, are projected to experience job loss for Machine & transport operatives over the period to 2014. Hence, in Wales over-representation of Machine & transport operatives becomes relatively more pronounced vis-à-vis the UK average is set to become even more pronounced. The South East, the North East and Yorkshire & the Humber record slower than average projected rates of employment loss; (the projected rate of decline across the UK is 0.5 per cent per annum). Northern Ireland and the West Midlands are projected to experience the fastest rates of loss (at 1.1 and 0.9 per cent per annum, respectively).

Elementary occupations

London has the smallest proportion of employment in elementary occupations (around 10 per cent), followed by the South East (10.5 per cent) in 2004. By contrast, in Scotland, Wales and the North East elementary occupations account for about 13 per cent of total employment, compared with just over 11 per cent across the UK.

More jobs are projected to be lost in elementary occupations across the UK than in any other occupational group. This is also apparent in all regions except London and the South East (where administrative, secretarial & clerical occupations are expected to see greater losses). Across the UK employment in elementary occupations is expected to contract at a rate of 2.2 per cent per annum over the period to 2014. The fastest rates of job loss are projected for the West Midlands and the East Midlands (2.9 per cent per annum). Northern Ireland, Yorkshire & the Humber and the North West record the next fastest rates of employment decline. Slower than annual average rates of employment decline are recorded for the South East, East of England, the North East, London and the South West.

Table 1.11: Projected Change in Total Employment by Occupation, 2004-2014

a) change in thousands

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	151	167	170	-156	-17	23	45	-13	-81	289
South East	121	80	61	-63	8	75	64	-2	-57	287
East of England	66	57	39	-29	-9	44	30	-10	-54	134
South West	40	54	27	-35	0	45	39	-13	-55	101
West Midlands	43	51	39	1	-28	52	25	-22	-71	90
East Midlands	37	41	23	-20	-25	38	31	-14	-59	52
Yorks & the Humber	43	45	20	2	-15	39	35	-7	-67	96
North West	39	72	25	-7	-20	52	41	-17	-84	101
North East	13	17	7	-6	-8	8	21	-2	-24	27
England	553	584	412	-312	-114	374	331	-100	-551	1176
Wales	17	28	16	-4	-9	22	10	1	-34	47
Scotland	35	67	17	-8	-18	14	24	-13	-68	50
Northern Ireland	12	18	12	-2	-8	14	10	-6	-22	28
United Kingdom	617	697	457	-326	-150	424	375	-118	-675	1300

b) per cent change

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	18.4	25.8	20.1	-26.8	-4.3	8.5	15.6	-5.9	-18.3	6.4
South East	16.1	15.8	9.7	-11.4	1.7	24.3	19.4	-0.8	-12.8	6.8
East of England	14.5	18.6	10.2	-8.2	-2.8	22.3	13.5	-4.7	-17.6	4.9
South West	10.4	18.9	8.0	-11.7	-0.1	21.7	17.3	-6.7	-18.8	4.0
West Midlands	12.0	18.4	11.5	0.3	-8.2	25.3	12.5	-8.5	-25.1	3.5
East Midlands	12.2	19.1	9.2	-8.6	-10.4	22.2	18.6	-7.2	-25.8	2.6
Yorks & the Humber	12.6	17.7	6.7	0.7	-4.8	20.4	16.2	-3.0	-23.2	3.9
North West	8.4	18.3	5.6	-1.7	-5.4	19.2	14.3	-5.8	-21.8	3.0
North East	9.4	14.5	5.1	-4.3	-5.8	9.0	20.1	-1.9	-17.1	2.5
England	13.7	19.4	11.2	-9.7	-4.0	19.7	16.2	-5.1	-19.6	4.6
Wales	11.0	19.9	9.6	-2.7	-5.8	20.2	9.2	0.9	-20.8	3.7
Scotland	10.5	22.0	5.1	-2.5	-6.3	8.5	12.0	-6.3	-20.0	2.0
Northern Ireland	12.5	19.8	10.7	-2.0	-8.0	19.3	15.8	-10.6	-23.8	3.5
United Kingdom	13.4	19.7	10.6	-8.6	-4.4	18.9	15.6	-5.0	-19.8	4.3

c) per cent per annum change

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	1.7	2.3	1.8	-3.1	-0.4	0.8	1.5	-0.6	-2.0	0.6
South East	1.5	1.5	0.9	-1.2	0.2	2.2	1.8	-0.1	-1.4	0.7
East of England	1.4	1.7	1.0	-0.8	-0.3	2.0	1.3	-0.5	-1.9	0.5
South West	1.0	1.7	0.8	-1.2	0.0	2.0	1.6	-0.7	-2.1	0.4
West Midlands	1.1	1.7	1.1	0.0	-0.9	2.3	1.2	-0.9	-2.9	0.3
East Midlands	1.2	1.8	0.9	-0.9	-1.1	2.0	1.7	-0.7	-2.9	0.3
Yorks & the Humber	1.2	1.6	0.6	0.1	-0.5	1.9	1.5	-0.3	-2.6	0.4
North West	0.8	1.7	0.5	-0.2	-0.5	1.8	1.3	-0.6	-2.4	0.3
North East	0.9	1.4	0.5	-0.4	-0.6	0.9	1.8	-0.2	-1.9	0.2
England	1.3	1.8	1.1	-1.0	-0.4	1.8	1.5	-0.5	-2.2	0.5
Wales	1.1	1.8	0.9	-0.3	-0.6	1.9	0.9	0.1	-2.3	0.4
Scotland	1.0	2.0	0.5	-0.3	-0.7	0.8	1.1	-0.6	-2.2	0.2
Northern Ireland	1.2	1.8	1.0	-0.2	-0.8	1.8	1.5	-1.1	-2.7	0.3
United Kingdom	1.3	1.8	1.0	-0.9	-0.4	1.7	1.5	-0.5	-2.2	0.4

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.11)

Occupational groups:
1 Managers & senior officials
2 Professional
3 Associate professional & technical
4 Administrative, clerical & secretarial
5 Skilled trades
6 Personal service
7 Sales & customer service
8 Machine & transport operatives
9 Elementary

Table 1.12: Projected Change in Male Employment by Occupation, 2004-2014

a) change in thousands

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	55	93	91	-43	-11	1	28	-2	-53	160
South East	42	42	31	-16	11	6	30	12	-22	136
East of England	18	25	18	-11	-6	2	15	4	-25	40
South West	12	28	19	-5	5	2	17	0	-21	58
West Midlands	11	21	21	10	-22	1	9	-2	-27	23
East Midlands	18	27	16	-4	-22	3	5	4	-23	26
Yorks & the Humber	12	23	17	19	-10	1	17	10	-23	65
North West	11	41	17	22	-13	3	20	6	-27	81
North East	2	7	3	3	-5	1	8	6	-6	20
England	182	307	234	-25	-73	19	150	40	-227	608
Wales	9	10	12	4	-7	1	4	10	-11	32
Scotland	0	17	0	11	-12	1	8	1	-27	-1
Northern Ireland	2	5	1	3	-6	-1	5	-2	-10	-4
United Kingdom	193	340	247	-7	-97	20	167	49	-276	635

b) per cent change

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	10.7	25.1	20.3	-28.0	-3.0	2.3	23.5	-1.0	-19.6	6.4
South East	8.8	13.9	9.2	-13.8	2.7	13.4	28.7	5.5	-9.0	6.0
East of England	6.3	13.5	9.3	-15.4	-2.1	5.8	23.7	2.5	-14.7	2.7
South West	4.9	17.6	11.2	-7.9	1.7	6.3	27.3	0.2	-12.8	4.3
West Midlands	4.9	13.1	12.1	14.4	-7.1	4.1	16.5	-0.9	-17.5	1.7
East Midlands	9.3	21.8	12.8	-7.4	-9.9	15.2	12.2	2.6	-18.7	2.4
Yorks & the Humber	5.3	16.3	10.5	24.1	-3.6	2.0	26.2	5.1	-14.2	4.9
North West	3.7	18.3	7.5	20.9	-3.9	7.2	24.3	2.4	-12.8	4.5
North East	2.7	10.6	4.6	10.3	-4.1	4.7	31.4	6.5	-7.4	3.4
England	7.1	17.7	12.2	-3.3	-2.8	6.7	24.0	2.4	-14.4	4.4
Wales	8.6	14.1	15.0	11.0	-4.5	7.0	13.1	9.3	-12.3	4.7
Scotland	-0.2	11.2	-0.3	14.5	-4.6	2.6	16.9	0.8	-14.7	-0.1
Northern Ireland	3.4	10.5	2.4	10.2	-6.4	-6.7	21.4	-4.3	-17.8	-0.8
United Kingdom	6.6	16.9	11.2	-0.8	-3.1	5.9	23.0	2.4	-14.4	3.9

c) per cent per annum change

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	1.0	2.3	1.9	-3.2	-0.3	0.2	2.1	-0.1	-2.2	0.6
South East	0.8	1.3	0.9	-1.5	0.3	1.3	2.6	0.5	-0.9	0.6
East of England	0.6	1.3	0.9	-1.7	-0.2	0.6	2.1	0.2	-1.6	0.3
South West	0.5	1.6	1.1	-0.8	0.2	0.6	2.4	0.0	-1.4	0.4
West Midlands	0.5	1.2	1.1	1.4	-0.7	0.4	1.5	-0.1	-1.9	0.2
East Midlands	0.9	2.0	1.2	-0.8	-1.0	1.4	1.2	0.3	-2.1	0.2
Yorks & the Humber	0.5	1.5	1.0	2.2	-0.4	0.2	2.4	0.5	-1.5	0.5
North West	0.4	1.7	0.7	1.9	-0.4	0.7	2.2	0.2	-1.4	0.4
North East	0.3	1.0	0.5	1.0	-0.4	0.5	2.8	0.6	-0.8	0.3
England	0.7	1.6	1.2	-0.3	-0.3	0.7	2.2	0.2	-1.5	0.4
Wales	0.8	1.3	1.4	1.0	-0.5	0.7	1.2	0.9	-1.3	0.5
Scotland	0.0	1.1	0.0	1.4	-0.5	0.3	1.6	0.1	-1.6	0.0
Northern Ireland	0.3	1.0	0.2	1.0	-0.7	-0.7	2.0	-0.4	-1.9	-0.1
United Kingdom	0.6	1.6	1.1	-0.1	-0.3	0.6	2.1	0.2	-1.5	0.4

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.12)

Occupational groups:
1 Managers & senior officials
2 Professional
3 Associate professional & technical
4 Administrative, clerical & secretarial
5 Skilled trades
6 Personal service
7 Sales & customer service
8 Machine & transport operatives
9 Elementary

Table 1.13: Projected Change in Female Employment by Occupation, 2004-2014

a) change in thousands

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	95	73	79	-113	-6	21	18	-11	-28	129
South East	79	38	31	-47	-3	68	34	-14	-34	151
East of England	48	33	20	-17	-3	42	15	-14	-29	94
South West	28	26	8	-30	-5	43	22	-13	-34	44
West Midlands	32	30	18	-9	-6	51	16	-20	-44	67
East Midlands	19	14	7	-16	-3	34	26	-19	-35	26
Yorks & the Humber	32	22	4	-16	-5	39	18	-18	-44	31
North West	28	30	8	-30	-7	49	21	-23	-57	20
North East	11	10	4	-9	-3	7	13	-8	-18	7
England	371	276	178	-288	-41	355	181	-140	-324	568
Wales	9	18	4	-8	-3	21	6	-9	-22	15
Scotland	36	50	18	-20	-6	13	16	-15	-41	51
Northern Ireland	10	13	11	-4	-2	15	5	-4	-12	31
United Kingdom	424	357	210	-319	-53	404	208	-167	-399	665

b) per cent change

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	31.5	26.7	19.8	-26.4	-16.7	10.3	10.2	-48.5	-16.3	6.4
South East	29.0	18.7	10.2	-10.8	-7.0	26.2	15.2	-40.8	-17.7	7.7
East of England	28.6	25.9	11.2	-6.3	-9.0	25.0	9.3	-42.3	-21.1	7.3
South West	19.9	20.5	4.8	-12.8	-17.1	24.0	13.4	-43.9	-26.2	3.6
West Midlands	24.4	25.6	10.8	-3.7	-19.8	28.2	10.9	-47.5	-34.1	5.6
East Midlands	17.7	15.3	5.4	-8.9	-14.8	23.3	20.9	-50.4	-34.2	2.7
Yorks & the Humber	25.8	19.5	2.5	-7.3	-16.7	23.3	12.0	-47.2	-34.7	2.8
North West	16.9	18.3	3.6	-9.0	-19.3	21.1	10.2	-54.8	-32.6	1.3
North East	20.2	19.5	5.6	-8.6	-22.8	9.7	16.3	-54.4	-28.8	1.4
England	25.4	21.8	10.1	-11.7	-14.9	21.9	12.8	-47.6	-26.3	4.8
Wales	15.5	26.0	4.6	-7.0	-18.1	22.1	7.9	-38.6	-31.6	2.5
Scotland	27.9	32.9	9.8	-7.5	-22.3	10.0	10.4	-47.6	-26.4	4.2
Northern Ireland	29.0	29.8	17.7	-6.0	-29.8	23.5	12.7	-57.0	-32.8	8.4
United Kingdom	25.3	23.3	10.0	-11.0	-16.0	21.2	12.3	-47.1	-26.7	4.8

c) per cent per annum change

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	All
London	2.8	2.4	1.8	-3.0	-1.8	1.0	1.0	-6.4	-1.8	0.6
South East	2.6	1.7	1.0	-1.1	-0.7	2.4	1.4	-5.1	-1.9	0.7
East of England	2.5	2.3	1.1	-0.6	-0.9	2.3	0.9	-5.4	-2.3	0.7
South West	1.8	1.9	0.5	-1.4	-1.9	2.2	1.3	-5.6	-3.0	0.4
West Midlands	2.2	2.3	1.0	-0.4	-2.2	2.5	1.0	-6.2	-4.1	0.5
East Midlands	1.6	1.4	0.5	-0.9	-1.6	2.1	1.9	-6.8	-4.1	0.3
Yorks & the Humber	2.3	1.8	0.2	-0.8	-1.8	2.1	1.1	-6.2	-4.2	0.3
North West	1.6	1.7	0.4	-0.9	-2.1	1.9	1.0	-7.6	-3.9	0.1
North East	1.9	1.8	0.5	-0.9	-2.6	0.9	1.5	-7.6	-3.3	0.1
England	2.3	2.0	1.0	-1.2	-1.6	2.0	1.2	-6.3	-3.0	0.5
Wales	1.4	2.3	0.4	-0.7	-2.0	2.0	0.8	-4.8	-3.7	0.2
Scotland	2.5	2.9	0.9	-0.8	-2.5	1.0	1.0	-6.3	-3.0	0.4
Northern Ireland	2.6	2.6	1.6	-0.6	-3.5	2.1	1.2	-8.1	-3.9	0.8
United Kingdom	2.3	2.1	1.0	-1.2	-1.7	1.9	1.2	-6.2	-3.1	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional.xls (Table R.13)

Occupational groups:
1 Managers & senior officials
2 Professional
3 Associate professional & technical
4 Administrative, clerical & secretarial
5 Skilled trades
6 Personal service
7 Sales & customer service
8 Machine & transport operatives
9 Elementary

1.10 Replacement Demands

Table 1.14 shows expansion demands, replacement demands and overall requirements by occupation for the regions and countries of the UK.

The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counter-balance some of the losses.

Despite projected job losses for elementary occupations, skilled trades occupations, Machine & transport operatives and administrative, clerical & secretarial occupations, the net requirements are positive for ***all*** SOC Major Groups in ***all*** countries and regions.

Net requirements tend to be particularly large for associate professional & technical occupations, managers & senior officials and professional occupations. These three occupational groups account for the largest net requirements in all regions, except in the North East where the requirement for sales & customer service occupations is at a similar level. The dominance of the higher level occupations (SOC Major Groups 1-3) in the pattern of overall net requirements in the south-eastern England is greater than elsewhere, and underlines the continuing south-eastern bias of the 'knowledge economy'.

At UK level the next largest net requirements are for personal service occupations and sales & customer service occupations, followed by skilled trades occupations and administrative, clerical & secretarial occupations. In London and the South East requirements for skilled trades occupations exceed those for administrative, clerical & secretarial occupations.

In most, but not all, regions, the smallest net requirement over the decade to 2014 is projected for elementary occupations. However, in London and the South East the smallest net requirements are for administrative, clerical & secretarial occupations and Machine & transport operatives, respectively.

Table 1.14: Replacement Demand by Occupation, 2004-2014

a) expansion demand (000s)

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	all occs.
London	151	167	170	-156	-17	23	45	-13	-81	289
South East	121	80	61	-63	8	75	64	-2	-57	287
East of England	66	57	39	-29	-9	44	30	-10	-54	134
South West	40	54	27	-35	0	45	39	-13	-55	101
West Midlands	43	51	39	1	-28	52	25	-22	-71	90
East Midlands	37	41	23	-20	-25	38	31	-14	-59	52
Yorks & the Humber	43	45	20	2	-15	39	35	-7	-67	96
North West	39	72	25	-7	-20	52	41	-17	-84	101
North East	13	17	7	-6	-8	8	21	-2	-24	27
England	553	584	412	-312	-114	374	331	-100	-551	1176
Wales	17	28	16	-4	-9	22	10	1	-34	47
Scotland	35	67	17	-8	-18	14	24	-13	-68	50
Northern Ireland	12	18	12	-2	-8	14	10	-6	-22	28
United Kingdom	617	697	457	-326	-150	424	375	-118	-675	1300

b) replacement demand (000s)

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	all occs.
London	262	208	264	183	128	84	96	72	149	1446
South East	240	162	197	172	150	97	109	87	147	1360
East of England	146	99	118	111	107	62	73	69	102	885
South West	123	92	104	95	107	65	74	62	97	820
West Midlands	115	89	106	103	114	65	66	87	93	837
East Midlands	96	69	78	72	80	53	55	66	75	645
Yorks & the Humber	110	81	94	96	100	60	71	81	96	789
North West	149	126	140	138	124	84	95	99	127	1082
North East	43	38	44	41	44	27	34	35	46	352
England	1283	964	1145	1010	953	596	673	658	933	8217
Wales	50	45	50	46	53	34	35	45	53	410
Scotland	106	97	107	107	95	51	66	70	113	811
Northern Ireland	30	29	34	31	35	24	22	19	31	254
United Kingdom	1469	1136	1336	1194	1136	704	795	792	1131	9692

c) overall requirement (000s)

Regions/Countries	Occupational Group 1	2	3	4	5	6	7	8	9	all occs.
London	412	375	434	27	112	107	141	60	68	1735
South East	360	243	258	110	157	171	173	84	91	1647
East of England	212	156	157	82	98	105	103	59	48	1020
South West	163	147	131	60	107	109	113	50	42	921
West Midlands	158	140	145	104	85	117	91	65	22	927
East Midlands	133	110	101	52	55	91	86	52	17	697
Yorks & the Humber	153	126	115	98	85	99	107	74	29	885
North West	188	198	165	130	104	136	136	82	44	1183
North East	56	55	52	36	37	35	54	33	22	379
England	1836	1548	1557	698	839	970	1004	558	382	9393
Wales	67	73	65	42	43	55	44	46	20	457
Scotland	141	164	124	98	77	65	90	57	45	861
Northern Ireland	41	47	45	29	27	38	32	13	9	282
United Kingdom	2086	1833	1792	868	986	1128	1170	673	456	10992

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, Replacement Demands.xls (Regional Summary)

Occupational groups:
1 Managers & senior officials
2 Professional
3 Associate professional & technical
4 Administrative, clerical & secretarial
5 Skilled trades
6 Personal service
7 Sales & customer service
8 Machine & transport operatives
9 Elementary

2. LONDON

2.1 Overview

London has a highly successful, productive economy that makes a substantial contribution to the whole of the UK. It is attractive to skilled workers not only from neighbouring regions, but also from the rest of the UK and other parts of the world. It has a relatively young and very diverse population. London is a powerhouse of the knowledge economy and is easily the most distinctive region within the UK. However, alongside the wealth generated in London, there are large numbers of jobless people and there are pockets of deprivation. The ability of the housing market and of the transport infrastructure to cope with growth pressures is an ongoing matter for concern.

London's population and especially working age population are projected to grow at rates in excess of the UK average. The unemployment is expected to remain well above the UK average. Workplace employment (jobs) is projected to grow at a rate in excess of the UK average, although somewhat more slowly than in the neighbouring region of the South East.

Over the period to 2014 the projected loss of 30 thousand jobs in manufacturing represents a faster rate of decline than expected across the UK as a whole. A gain of 70 thousand jobs is expected in distribution, transport, etc, which is the highest of all the countries and regions of the UK, with the exception of the South East. To an even greater extent than in other regions of the UK, the business & other services sector dominates projected employment gains in London between 2004 and 2014. Employment in other non-marketed services is expected to expand at a slightly slower rate than across the UK as a whole.

London is characterised by a greater share of total employment accounted for by males than in any other region of the UK. The share of total employment accounted for by full-time employees has also been consistently greater than the UK average.

In occupational terms, the largest absolute gain in employment is expected for associate professional & technical occupations, over the period to 2014. The 'professionalisation' of London's employment structure is illustrated by the fact that professional occupations and managers & senior officials also display large projected increases in employment.

The over-representation relative to the national average of London's employment structure in favour of high level non-manual occupations is expected to be reinforced over the decade. One of the most distinctive features of occupational change in London is the projected loss of over 155 thousand jobs in administrative, clerical & secretarial occupations. Employment in personal service occupations is expected to grow at a slower rate than across the UK as a whole.

London has relatively small shares of employment in skilled trades occupations and amongst Machine & transport operatives. Employment in these two occupations is projected to continue to decline at a rate similar to the national average. Employment in elementary occupations is expected to contract at a slower rate than across the UK as a whole, with the loss of about 80 thousand jobs over the decade to 2014.

An examination of replacement demands reveals that requirements are positive in all SOC Major Groups, although they are greatest in the high level, non-manual occupations.

The Success of the Olympic Bid

In July 2005 the success of the London 2012 Olympics bid was announced. Two main issues arise when attempting to estimate the scale of the economic impact of the Games: distinguishing what should rightly be attributed to the Games as opposed to what would have happened anyway; and estimating the extent to which the identified spending will be displaced or brought forward in time.

Economic activity will be boosted by the infrastructure spending itself, (with effects principally on construction activity); by the spending associated with running the Games (partly financed by ticket sales and media rights); by the spending of athletes, officials, media staff and tourists (other than ticket sales) associated with the Games; by the stimulus given to tourism before and after the event thanks to the higher profile of London; and, in the longer term, by the attraction of activities and residents to occupy the facilities.

Substantial sums are being spent on improving London's transport infrastructure. However, these are part of London's general transport development and would have gone ahead in any case. For example, the Thames Gateway had been earmarked for development under the Sustainable Communities Plan prior to the success of the Olympic bid. Such developments are already factored in to government expenditure and investment plans. Part of the spending on ticket sales, catering and accommodation will also come from UK residents, who might otherwise have spent their income in other ways. Their spending is therefore diverted from other products and localities, and does not increase UK GVA, although it may well increase economic activity in London at the expense of other areas, although some of the spending on both infrastructure and on the venue will be outside London. Some £1.5bn of the £3.9bn estimated cost of building facilities and running the Games is expected to come from a special Olympic Lottery, and purchasers of Lottery tickets would otherwise have spent the money in other ways. With regard to the lottery funds generated, spending may also be diverted from the normal Lottery causes, as the Department of Culture, Media and Sport expects. A further £250m is due to come from the London Development Agency, whose budget for other activity is thereby reduced, and up to £550m is to come from an increase in Council Tax in London, again diverting spending from other activities.

The British Hospitality Association suggested that there could be an extra 500 thousand foreign visitors to the UK in 2012. If each one spent £1000 this would generate £½bn. Other estimates suggest a larger impact. The London bid assured the provision of 40 thousand rooms for the period of the Games in hotels and universities.

For London, the net benefit will be larger, because some of the investment and consumption spending associated with staging the Games will be diverted from elsewhere in the UK. Following the same logic, the net benefit will be much larger for the Lea Valley, in which much of the infrastructure spending will take place.

The main elements here are: the £2.4bn to be spent on new facilities (the bulk of which, but not all, is at the Olympic Park in Stratford, including the athletes' village) and the estimated £0.8bn to be spent on redevelopment in the Lower Lea Valley outside of the Olympic budget. Assuming phasing over five years, with a peak in 2011, there could be 7 thousand additional jobs (annual full-time equivalents) in construction in 2011 and a boost to value added in that sector of some £400m in that year. Spending on the inputs to construction will generate further jobs and value added, but much of this would flow outside of London, (some of this going outside the UK). For comparison, gross value added in the whole construction industry in London was £6.6bn in 2002.

The potential effects are therefore large (perhaps as much as a 10 per cent boost to construction activity at certain times) but not sufficient to completely change long-term trends. Clearly, there are likely to be significant demand pressures for particular skills over this period. However, the timing coincides to some degree with the running down of other major developments such as Heathrow Terminal 5, so the main impact may be on the geographical focus of such pressures rather than their scale.

Box 2.1: Definitions of Employment and Related Labour Market Indicators

Alternative Definitions

There are various ways of looking at employment. For example, a distinction can be made between the number of people in employment (head count) and the number of jobs. These two concepts represent different things, as one person may hold more than one job. In addition, a further distinction can be made between area of residence and area of workplace. Similarly there are various different definitions of unemployment, the labour force, workforce and population. In *Working Futures 2004-2014* the following definitions are used:

Residence basis: measured at place of residence (as in the Labour Force Survey (LFS)).
Workplace basis: measured at place of work (as in the Annual Business Inquiry (ABI)).

Workplace employment (number of jobs): these are typically estimated using surveys of employers, such as the ABI, focussing upon the numbers of jobs in their establishments. In this report references to employment relate to the number of jobs unless otherwise stated.

Employed residents (head count): the number of people in employment. These estimates are based primarily on data collected in household surveys, e.g. the LFS. People are classified according to their main job. Some have more than one job.

ILO unemployment: covers people who are out of work, want a job, have actively sought work in the previous four weeks and are available to start work within the next fortnight (or out of work and have accepted a job that they are waiting to start in the next fortnight).

Claimant Unemployed: measures people claiming Job Seeker’s Allowance benefits.

Workforce: the total number of workforce jobs is obtained by summing workplace employment (employee jobs and self-employment jobs), HM Forces, government-supported trainees and claimant unemployment.

Labour Force: employed residents plus ILO unemployment.

Labour market participation or **Economic activity rate**: the number of people who are in employment or (ILO) unemployed as a percentage of the total population aged 16 and over.

Labour Market Accounts Residual: workplace employment minus Residence employment. The main cause of the residual at national level is “double jobbing”. At a more disaggregated spatial level, net commuting across geographical boundaries is also very significant. The difference will also reflect data errors and other minor differences in data collection methods in the various sources.

Total Population: the total number of people resident in an area (residence basis).

Population 16+: the total number of people aged 16 and above (residence basis).

Working-age population: the total number of people aged 16-65 (males) or 16-60 (females), (residence basis).

2.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 describes these in detail. Table 2.1 provides a general overview, while Figure 2.1 presents a graphical summary of the supply side. Figures 2.2 and 2.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population
The total population in London is expected to increase by around 400 thousand between 2004-2014, to 7.8 million. This projected increase is similar to both that for the UK and England.

Population 16+
Over the period 1999-2004 the growth of the 16+ population in London, at 5.2 per cent, was greater than that for the UK. Over 2004-09 the 16+ population in London is expected to increase by the same percentage as the UK 16+ population, before outpacing the UK rate over 2009-14 as growth of the UK 16+ population weakens, (see Table 2.1 and Figure 2.1)

Working-age Population
The working age population is projected to increase by around half a million between 2004 and 2014, to reach 5.3 million. This rate of increase is easily faster than the 0.5 per cent projected for England and the UK over the same period.

Labour Force
The labour force is expected to increase by over 8 per cent over the period 2004-14, well ahead of the increase for the UK (5.1 per cent). As a result the overall activity rate in London is expected to increase over the forecast period while the UK rate is expected to see a decline.

Workforce
London's workforce is projected to increase by over 300 thousand between 2004-2014. This is in line with the projections for the United Kingdom and England. This is the measure used in most of the remaining detailed tables and charts.

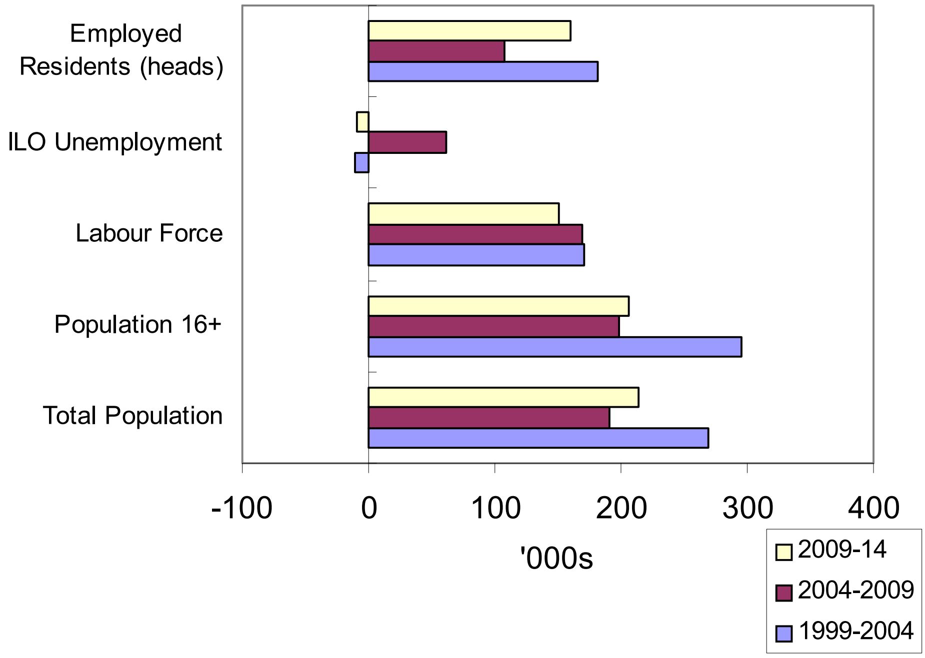
ILO Unemployment
After falling slightly between 1999 and 2004, ILO unemployment in London is expected to increase by a modest 25 thousand between 2004 and 2009, before falling again by about 4 thousand between 2009 and 2014. Overall, the rate of unemployment is projected to change only very slightly.

Claimant Unemployment
Between 1994 and 2004 claimant unemployment in London fell by 260 thousand. Between 2004 and 2014, however, claimant unemployment is expected to rise by around 30 thousand to reach 195 thousand by 2014.

Employed Residents
Over the period 2004-09 the number of employed residents in London is expected to grow at a faster rate than for the UK as a whole:. This is expected to be repeated over the period 2009-14 and overall, the number of employed residents is expected to increase by over a quarter of a million between 2004 and 2014. Male and female employment levels are expected to increase by broadly similar rates.

Workplace Employment
Workplace Employment (jobs) in London is projected to increase by almost 290 thousand between 2004 and 2014. This represents an increase of 0.6 per cent per annum, which is higher than both the averages projected for the UK (0.4 per cent per annum) and England (0.5 per cent per annum). Within London, the London Central LSC area displays the highest projected growth rates for the period from 2002-2014 at 0.7 per cent per annum. The slowest growth rate, in terms of percentage change is projected for London West (5.9 per cent).

Figure 2.1: Changes in Population and the Labour Force in London



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Labour Market Residual

Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is "double jobbing" (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In London the residual is quite large, with the capital providing almost a million more jobs than its number of employed residents.

Table 2.1: Population and Labour Force in London [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	3,479	3,673	3,799	3,931	5.6	3.4	3.5
Population 16+	2,731	2,938	3,069	3,197	7.6	4.5	4.2
Labour Force	1,896	2,059	2,152	2,243	8.6	4.5	4.2
Activity Rate	69.4	70.1	70.1	70.2	0.7	0.0	0.1
ILO Unemployment	161	152	188	182	-5.6	23.5	-3.0
ILO Unemployment rate (%)	8.5	7.4	8.7	8.1	-1.1	1.3	-0.6
Employed Residents (heads)	1,733	1,903	1,964	2,061	9.8	3.2	4.9
Labour Market Residual (2)	595	589	607	589			
Female							
Total Population	3,675	3,750	3,815	3,898	2.1	1.7	2.2
Population 16+	2,956	3,045	3,111	3,189	3.0	2.2	2.5
Labour Force	1,627	1,635	1,712	1,772	0.5	4.7	3.5
Activity Rate	55.0	53.7	55.0	55.6	-1.3	1.3	0.6
ILO Unemployment	110	108	133	129	-1.8	23.5	-3.0
ILO Unemployment rate (%)	6.8	6.6	7.8	7.3	-0.2	1.2	-0.5
Employed Residents (heads)	1,519	1,531	1,578	1,642	0.8	3.1	4.0
Labour Market Residual (2)	447	484	497	500			
Total							
Total Population	7,154	7,424	7,615	7,829	3.8	2.6	2.8
Population 16+	5,687	5,982	6,180	6,385	5.2	3.3	3.3
Working-age Population	4,633	4,944	5,113	5,325	6.7	3.4	4.2
Labour Force	3,523	3,694	3,863	4,014	4.9	4.6	3.9
Workforce	4,509	4,686	4,867	5,004	3.9	3.9	2.8
Activity Rate	62.0	61.7	62.5	62.9	-0.3	0.8	0.4
ILO Unemployment	271	260	321	311	-4.1	23.5	-3.0
ILO Unemployment rate (%)	7.7	7.0	8.3	7.8	-0.7	1.3	-0.6
Claimant Unemployment	203	163	201	195	-19.7	23.5	-3.0
Claimant Unemployment rate	4.4	3.3	3.9	3.7	-1.1	0.6	-0.3
Employed Residents (heads)	3,252	3,434	3,542	3,703	5.6	3.2	4.5
Workplace employment (jobs)	4,149	4,475	4,605	4,751	7.9	2.9	3.2
Labour Market Residual[2]	1,042	1,073	1,104	1,089			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

2.3 Industrial Employment Structure

Overview of broad sectors

At the broad sectoral level, the picture projected for London is one of employment losses in the primary sector & utilities, and manufacturing. Employment gains are projected for the remaining four sectors: construction, distribution, transport etc., business & other services and non-marketed services between 2004 and 2014 (see Figure 2.1).

Primary sector & utilities

The long-term decline in employment for this sector is projected to involve a further 28 per cent decline over the period 2004 and 2014 (this represents the loss of under 5 thousand jobs). Such a rate of decrease is far higher than in all other English regions, as well as Scotland, Wales and Northern Ireland. The projected UK rate of decline is 15.5 per cent over the same period. The majority of the 5 thousand jobs lost are projected to be in the electricity gas and water category.

At the local LSC levels, the greatest percentage decreases in employment in this broad sector between 2004 and 2014 are projected for London East (35 per cent) and London South (30 per cent).

Projected job losses are projected to affect mainly male employment (3 thousand). Both male and female job losses are projected to occur at faster rates than the England and UK average.

Manufacturing

Employment in manufacturing in London is projected to fall by 1.2 per cent per annum between 2004 and 2014. This is marginally faster than for England and the United Kingdom. Food drink & tobacco and engineering are projected to lose 8 thousand and 6 thousand jobs respectively, but the bulk of the 30 thousand job losses in the broad sector are projected in the rest of manufacturing (17 thousand).

At the local LSC area level, both London North and London West are projected to lose around see a 15 per cent reduction in jobs between 2004 and 2014. Of the other areas, only London Central is expected to see an employment contraction of less than 10 per cent.

Most job losses are projected to affect males (19 thousand) rather more than females (12 thousand).

Construction

Construction employment in London between 2004 and 2014, is projected to increase by 0.3 per cent per annum, resulting in an additional 8 thousand jobs in the region.

London Central is projected to see the rate of increase (0.6 per cent per annum between 2004 and 2014). All the local LSC areas in London are projected to share in the projected increase in employment, which is in contrast to the 0.3 per cent per annum reduction projected for England.

Around three-quarters of the additional jobs are projected to be filled by males.

Distribution, transport etc.

An additional 70 thousand jobs are expected in this broad sector between 2004 and 2014. At 0.5 per cent per annum, the projected rate of increase is slightly slower than the England average (0.6 per cent per annum). Retail distribution is projected to see the majority of job gains in this broad sector. In absolute terms, employment in hotels and restaurants was just under 200 thousand in 1984, but is projected to increase to 340 thousand by 2014. Employment in transport storage & communication is expected to increase by 2 thousand jobs (representing a slower rate of increase than the national average).

The vast majority of additional jobs are projected to be filled by females.

Business & other services

Business & other services are projected to generate an additional 200 thousand jobs between 2004 and 2014. This is by far the most significant employment increase in London in terms of projected absolute gains, although the projected annual average growth rate of 1.1 per cent, is below that for England and the UK (1.2 per cent).

London North and London West display the highest rates of projected employment growth (1.3 per cent per annum).

Over 150 thousand of the additional jobs are expected to be filled by males. This represents a similar rate of increase to that projected for England and for the UK.

Non-marketed services

Employment in non-marketed services is projected to increase by over 5 per cent between 2004 and 2014, representing an additional 50 thousand jobs. At 0.5 per cent per annum the projected rate of increase is slower than that for all the other southern regions and across England as a whole (0.6 per cent per annum).

Within London, a slower than national average rate of employment increase is evident across all local LSC areas, with the exception of London Central. In the London Central LSC area is expected to increase by 0.6 per cent per annum, which is in line with the change projected for England.

Around twice as many women as men are projected to occupy the projected additional jobs.

2.4 Change in Employment by Gender and Employment Status

Males

Between 2004 and 2014 a gain of around 70 thousand male full-time jobs in London is projected, and over 90 thousand full-time jobs are projected for females. This increase is in line with changes more broadly in England and the United Kingdom.

At the local LSC area level within London the projected increase in male employment is highest in London East (7 per cent). In absolute terms London Central is, by far, the biggest provider of male jobs: approaching 950 thousand jobs by 2014. The largest percentage increase in full-time male employment is expected to occur in London Central (4.4 per cent) and the lowest in London North (2.9 per cent).

Females

In 1984 females comprised 42 per cent of those in employment in London, compared with a UK proportion of 43 per cent. By 1994, women accounted for nearly 47 per cent of total employment, compared with a UK average of 47.5 per cent. In 2004 this percentage had fallen to just under 45 per cent and this share is projected to remain unchanged over the period to 2014.

The projected percentage increase in female full-time jobs (nearly 8 per cent) exceeds the expected increases for both England and the UK (around 5 per cent).

2.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such ‘structural demand’ provides only part of the overall picture of occupational change. For a fuller picture of the changing requirement for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by ‘replacement demand’ (see Section 2.6). Taking the occupations gains and losses collectively, from the period 2004 and 2014, London is expected to increase its total employment by almost 290 thousand jobs.

At the level of SOC Major Groups, the largest increase in occupational employment between 2004 and 2014 is projected for associate professional & technical occupations, with an expected increase of 170 thousand jobs. Professional occupations are expected to record the next largest increase with a projected increase of 167 thousand jobs (see Table 2.2).

Projected job losses are expected in skilled trade occupations, machine & transport operatives, elementary occupations, and - most severely - for administrative, clerical & secretarial occupations.

Most male job losses are projected to occur in elementary occupations (almost 55 thousand) and administrative, clerical & secretarial occupations (almost 45 thousand). Largest gains are expected in professional occupations and associate professional & technical occupations (each over 90 thousand). For females, huge job losses are projected for administrative, clerical & secretarial occupations (almost 115 thousand). Significant female job gains are projected for managers & senior officials (95 thousand), professional occupations (nearly 75 thousand) and associate professional & technical occupations (80 thousand).

1. Managers & senior officials

London is projected to gain over 150 thousand jobs for this SOC Major Group. This represents an increase of around a fifth over the period from 2004 and 2014 (representing a rate of increase of 1.7 per cent per annum). This rate of increase is higher than in all other countries and regions of the UK.

Corporate managers are expected to account for all the employment gains for this group (over 155 thousand), and are expected to account for nearly 17 per cent of total jobs in London by 2014. Managers & proprietors are projected to lose up to 5 thousand jobs by 2014. This is almost a 3 per cent reduction, which is much lower than the decreases recorded for England and the UK (around 7 per cent).

London North and London East are projected to have the highest growth rates (1.9 per cent per annum) for managers & senior officials, but London Central projected to have be the largest concentration of employment for managers & senior officials in 2014 (360 thousand jobs).

Females are expected to account for 95 thousand of the additional jobs. Projected rates of increase for both males and females exceed the UK average.

2. Professional occupations

Over 165 thousand extra jobs are projected in professional occupations. At 2.3 per cent per annum this is the fastest rate of increase projected for any of the SOC Major Groups for London, and is also the highest projected increase recorded for all of the countries and regions of the UK.

Substantial increases of nearly 65 thousand jobs are expected for teaching professionals and over 50 thousand jobs for business professionals. Both health professionals, and science and technology professionals, are expected to increase in size by 20 thousand and 28 thousand jobs, respectively.

All of the local LSC regions in London are projected to have faster rates of employment increase than the UK average. The fastest rate of increase is projected for London East (2.4 per cent per annum).

90 thousand of the additional jobs are projected to be filled by males. This represents an increase of 24 per cent increase between 2004 and 2014. For both males and females projected rates of employment growth in professional occupations in London exceed increases expected in the rest of the UK.

3. Associate professional & technical occupations

With a projected 170 thousand additional jobs, associate professional & technical occupations this SOC major group is expected to experience the largest single increase in employment in London between 2004 and 2014. The 1.8 per cent per annum growth rate projected for London easily exceeds the England average (1.1. per cent per annum).

The greatest percentage employment gains are expected in culture, media & sports (64 thousand jobs), followed by business associate professionals (55 thousand jobs), and health associate professionals with 43 thousand additional jobs. Finally, a modest increase of 8 thousand jobs is projected for science & technology associate professionals. Employment in protective service occupations is projected to remain unchanged, standing at just under 70 thousand jobs between 2004 and 2014.

London Central is expected to have 400 thousand jobs in associate professional & technical occupations by 2014, a 1.8 per cent per annum increase over the period from 2004.

As with professional occupations, over half the jobs (some 90 thousand) are expected to be filled by males. This represents an increase of 20 per cent. Male employment in this occupation is projected to increase by 13 per cent, compared with 11 per cent in the UK as a whole. Just over 80 thousand jobs are projected to be filled by women. This represents a 20 per cent increase.

4. Administrative, clerical & secretarial occupations

This SOC Major Group is projected to continue to lose jobs rapidly in London, with an expected loss of over 150 thousand jobs in the decade to 2014. Employment is projected to contract by over a quarter: the largest percentage reduction of any part of the UK. These changes reflect the continued negative impact of ICT on many routine office jobs.

Both administrative & clerical occupations and secretarial & related occupations share in this employment decline, with a projected loss of almost 90 thousand jobs for the former, and almost 65 thousand jobs for the latter.

Employment in all London local LSC areas is projected to decline at a faster rate than across England. London Central has the highest projected loss at 3.5 per cent per annum.

Females are projected to suffer the vast majority of job losses (nearly 120 thousand). Males are expected to account for 35 thousand of the expected reduction in employment.

5. Skilled trades occupations

Employment in skilled trades occupations is projected to decline by 0.5 per cent per annum between 2004 and 2014. This represents a loss of around 20 thousand jobs.

The projected decline in employment is concentrated amongst skilled metal and engineering (with a projected loss of 35 thousand jobs) and other skilled trades (a projected reduction of 15 thousand jobs). There are projected employment gains in skilled constructions & building (around 30 thousand jobs) and skilled agricultural trades (4 thousand).

Males are projected to lose up to 11 thousand jobs. A loss of 6 thousand jobs is projected fro females.

6. Personal services occupations

Personal service occupations are projected to expand by 9 per cent between 2004 and 2014, resulting in around 25 thousand additional jobs in London. With the exception of Scotland, this is the smallest percentage increase of any of the regions and countries of the UK:

Some employment increases are projected for all the local LSC areas, the fastest increase being for London Central (0.9 per cent per annum), compared with 1.8 per cent per annum for England.

Of the projected 25 thousand extra jobs only 2 thousand are projected to be filled by males, with 23 thousand being filled by women.

7. Sales & customer service occupations

Sales & customer service occupations are projected to experience a 1.5 per cent per annum increase in employment from 2004 and 2014. Such a rate of change implies an additional 45 thousand jobs in London.

Sales occupations are expected to account for the bulk of new jobs (over 35 thousand) compared to the 10 thousand projected for customer service occupations.

Employment in sales & customer service occupations in London South, London East and London North are all projected to increase at slower rates than the projected England average.

Around two-thirds of the additional jobs (almost 30 thousand) are expected to be filled by females.

8. Machine & transport operatives

A loss of 15 thousand jobs is projected for this SOC Major Group. This represents a 7 per cent rate of loss over the period to 2014: which is a greater than that projected for both England (4 per cent) and the UK (5 per cent).

An increase of over 20 thousand jobs is expected for drivers & other operatives This is in stark contrast to the projected experience of process machine operatives (a loss of 35 thousand jobs is expected).

Females are projected to account for the majority of jobs lost (over 10 thousand) in this SOC major group. This represents a decline of almost 50 per cent decline between 2004 and 2014.

9. Elementary Occupations

Total employment in elementary occupations is projected to fall by over 80 thousand between 2004 and 2014. This represents a rate of loss of 2 per cent per annum, which is greater than rates of loss projected for England and the UK.

Both elementary: trades and elementary: service are expected to lose roughly equal numbers of jobs (around 40 thousand for each).

The rate of employment losses in the local LSC areas range from 1.4 per cent per annum in London Central to 2.5 per cent in London West. In England the projected rate of loss averages 2.2 per cent per annum.

The majority of job losses (53 thousand) are projected to be borne by males. This represents a fall of almost 20 per cent between 2004 and 2014, representing the greatest rate of decline in England and the UK (along with the East Midlands). Female job losses, though significant at almost 30 thousand, are projected to be lower in terms of percentage changes (16 per cent), than all other countries of the UK. The comparative projected declines are 21 per cent for England and 26 per cent for the UK.

2.6 Projections of Replacement Demands

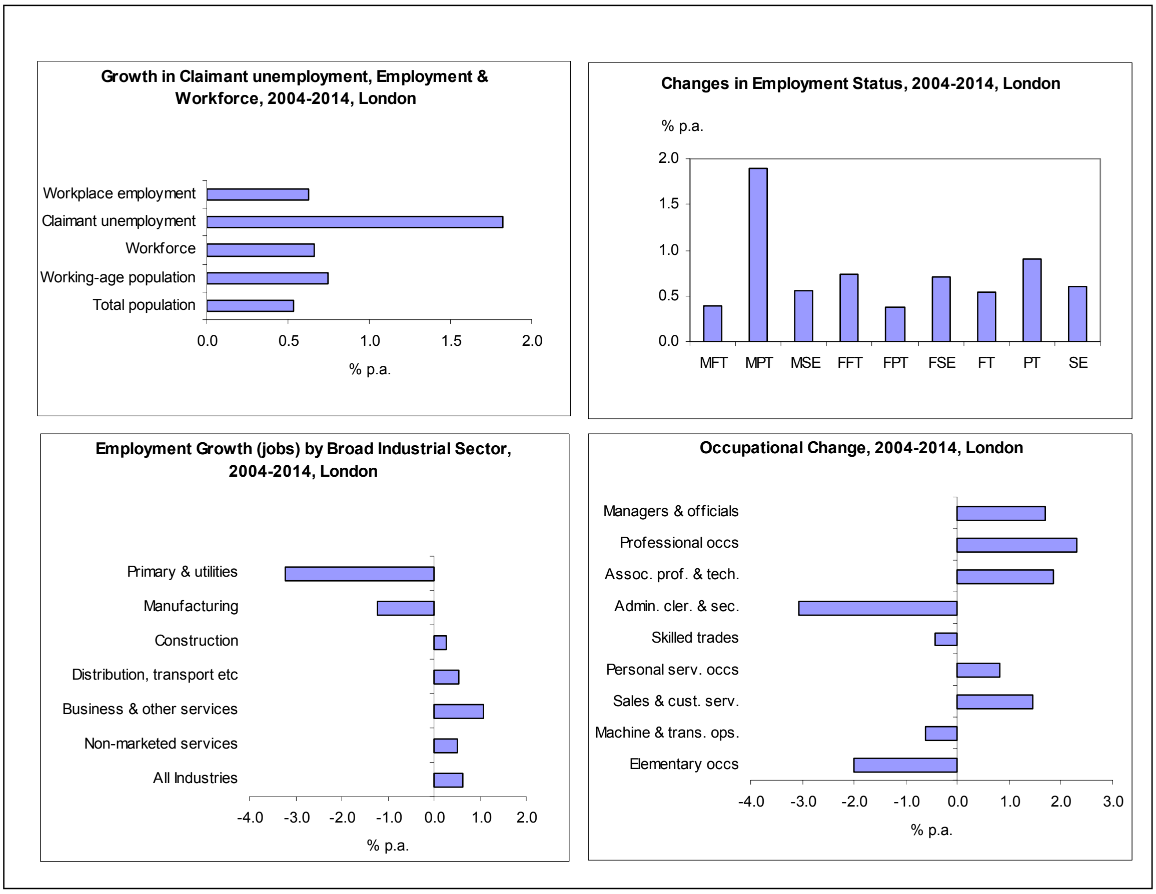
The key component of replacement demands is retirements from the workforce, especially for older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Looking at all occupations collectively, expansion demand in London is projected account for 290 thousand jobs. Replacement demands are projected to be much greater, and are expected to almost reach 1.6 million. Thus the overall requirement is projected to exceed 1.9 million. Regardless of whether expansion demand projections suggest an increase or decrease in employment levels, in all SOC major groups total requirements are positive.

In the high level non-manual occupations, where structural demand changes suggest that the largest increases in employment will be concentrated, replacement demands are even more substantial. Hence overall requirements indicate a need for nearly 500 thousand managers & senior officials, just over 400 thousand professional occupations, and just over 450 thousand associate professional & technical occupations.

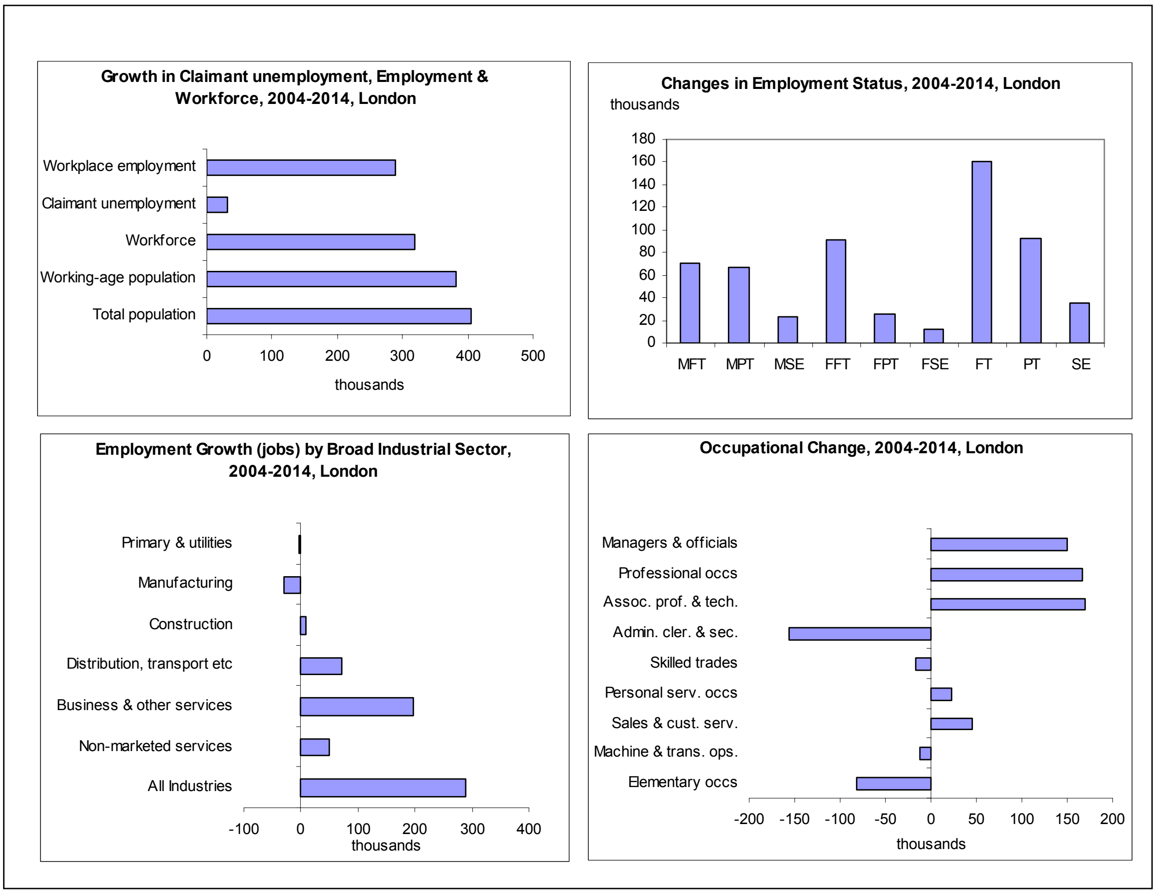
In London, the projected expansion demands for four occupational groups (administrative, clerical & secretarial occupations, skilled trades occupations, Machine & transport operatives, elementary occupations) are negative (i.e. job losses are projected). In administrative, clerical & secretarial occupations, this loss is projected at over 155 thousand jobs. However, replacement demands are such that all four groups are projected to require more workers. For example, administrative, clerical & secretarial positions are projected to need an additional 75 thousand jobs by 2014. Of all those projected to experience negative expansion demand, the biggest total requirement is projected in skilled trades occupations.

Figure 2.2: Key Changes in London, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls.
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 2.3: Key Changes in London, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls.
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees, PT = All part-time employees, SE =All self employment.

Table 2.2: Sectoral Change in London

	London											England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	4	8	6	5	0.1	0.2	0.1	0.1	-1	-16.5	-1.8	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	7	5	2	2	0.2	0.1	0.1	0.0	-1	-26.1	-3.0	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	39	16	7	4	1.0	0.4	0.2	0.1	-3	-38.0	-4.7	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*50*	*30*	*15*	*11*	*1.2*	*0.8*	*0.3*	*0.2*	*-4*	*-27.9*	*-3.2*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	63	31	30	22	1.6	0.8	0.7	0.5	-8	-26.4	-3.0	-11.5	-1.2	-10.0	-1.1
4. Engineering	119	48	31	24	2.9	1.3	0.7	0.5	-6	-20.1	-2.2	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	393	240	203	186	9.7	6.3	4.5	3.9	-17	-8.3	-0.9	-11.3	-1.2	-11.3	-1.2
Manufacturing	*575*	*319*	*264*	*233*	*14.2*	*8.4*	*5.9*	*4.9*	*-31*	*-11.7*	*-1.2*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	238	200	267	274	5.9	5.2	5.9	5.7	8	2.8	0.3	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	658	602	627	677	16.2	15.8	13.9	14.1	50	7.9	0.8	7.0	0.7	6.7	0.6
9. Hotels & restaurants	194	215	321	341	4.8	5.6	7.1	7.1	19	6.1	0.6	6.2	0.6	5.7	0.6
10. Transport & comm.	386	324	345	347	9.5	8.5	7.7	7.2	2	0.5	0.1	2.5	0.3	2.7	0.3
Distribution transport etc.	*1238*	*1141*	*1293*	*1364*	*30.5*	*29.9*	*28.8*	*28.5*	*71*	*5.5*	*0.5*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	281	304	337	345	6.9	8.0	7.5	7.2	8	2.4	0.2	3.4	0.3	2.8	0.3
12. Other business activities	573	760	1058	1224	14.1	19.9	23.5	25.6	166	15.7	1.5	15.5	1.5	15.7	1.5
16. Other services	209	270	338	360	5.1	7.1	7.5	7.5	23	6.7	0.6	8.6	0.8	9.3	0.9
Business & other services	*1063*	*1334*	*1733*	*1929*	*26.2*	*34.9*	*38.5*	*40.3*	*196*	*11.3*	*1.1*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	277	238	235	227	6.8	6.2	5.2	4.8	-7	-3.1	-0.3	-2.5	-0.3	-2.3	-0.2
14. Education	284	234	286	293	7.0	6.1	6.4	6.1	7	2.4	0.2	5.7	0.6	5.7	0.6
15. Health & social work	338	323	404	453	8.3	8.5	9.0	9.5	49	12.1	1.1	10.2	1.0	9.7	0.9
Non-marketed services	*900*	*795*	*925*	*973*	*22.1*	*20.8*	*20.6*	*20.3*	*49*	*5.3*	*0.5*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	4063	3818	4496	4785	100.0	100.0	100.0	100.0	289	6.4	0.6	4.6	0.5	4.3	0.4

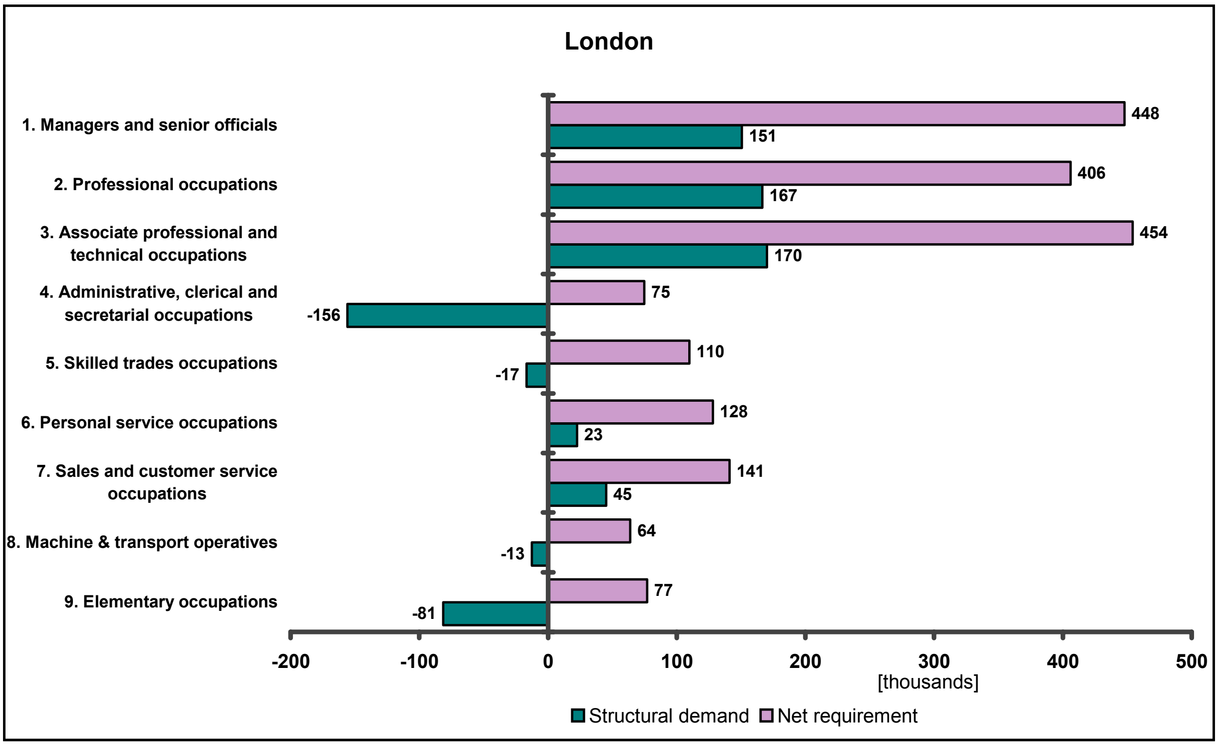
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 2.3: Occupational Change in London

	London											England		UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
Occupational sub-major group	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
Corporate managers	365	437	638	794	9.0	11.4	14.2	16.6	156	24.4	2.2	20.2	1.9	19.9	1.8
Managers / proprietors	158	162	182	176	3.9	4.2	4.0	3.7	-5	-2.9	-0.3	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	93	102	145	174	2.3	2.7	3.2	3.6	29	19.9	1.8	18.9	1.7	18.3	1.7
Health professionals	32	39	56	77	0.8	1.0	1.2	1.6	21	38.4	3.3	29.8	2.6	29.4	2.6
Teaching & res. Profs.	143	159	230	293	3.5	4.2	5.1	6.1	63	27.6	2.5	19.9	1.8	21.6	2.0
Business professionals	124	151	215	268	3.1	3.9	4.8	5.6	53	24.5	2.2	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	72	71	90	99	1.8	1.9	2.0	2.1	9	9.8	0.9	12.2	1.2	12.4	1.2
Health assoc. profs.	115	129	180	222	2.8	3.4	4.0	4.7	42	23.5	2.1	7.7	0.7	7.8	0.8
Protect. serv. occs	41	47	69	67	1.0	1.2	1.5	1.4	-2	-2.7	-0.3	0.8	0.1	0.1	0.0
Culture, med. & sports	66	104	184	247	1.6	2.7	4.1	5.2	63	34.5	3.0	24.5	2.2	23.5	2.1
Business assoc. profs.	193	229	324	381	4.7	6.0	7.2	8.0	57	17.7	1.6	10.0	1.0	9.2	0.9
Admin & clerical	520	453	421	329	12.8	11.9	9.4	6.9	-92	-21.9	-2.4	-4.2	-0.4	-3.1	-0.3
Secretarial and related	270	228	159	96	6.6	6.0	3.5	2.0	-63	-39.9	-5.0	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	16	14	21	25	0.4	0.4	0.5	0.5	5	22.0	2.0	17.3	1.6	15.5	1.5
Skilled metal & electrical	240	164	142	108	5.9	4.3	3.2	2.3	-34	-24.2	-2.7	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	152	116	139	168	3.7	3.0	3.1	3.5	29	20.8	1.9	20.2	1.9	19.4	1.8
Other skilled trades	112	92	87	71	2.7	2.4	1.9	1.5	-16	-18.2	-2.0	-14.7	-1.6	-14.6	-1.6
Caring personal service	81	106	187	211	2.0	2.8	4.1	4.4	25	13.3	1.3	23.8	2.2	22.8	2.1
Leisure occupations	87	82	80	78	2.1	2.1	1.8	1.6	-2	-2.6	-0.3	7.3	0.7	6.7	0.7
Sales occupations	197	204	229	265	4.8	5.3	5.1	5.5	36	15.7	1.5	13.0	1.2	12.0	1.1
Customer service occs.	26	32	60	69	0.6	0.8	1.3	1.5	9	15.3	1.4	31.3	2.8	32.2	2.8
Process machine ops.	206	115	73	36	5.1	3.0	1.6	0.8	-36	-50.1	-6.7	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	161	129	141	165	4.0	3.4	3.1	3.5	24	16.8	1.6	18.5	1.7	17.2	1.6
Elementary: trades	212	129	95	52	5.2	3.4	2.1	1.1	-43	-44.9	-5.8	-36.6	-4.4	-35.5	-4.3
Elementary: service	385	326	350	311	9.5	8.5	7.8	6.5	-39	-11.1	-1.2	-12.2	-1.3	-12.9	-1.4
All occupations	4063	3818	4496	4785	100.0	100.0	100.0	100.0	289	6.4	0.6	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 2.4: Replacement Demands in London



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

3. SOUTH EAST

3.1 Overview

The South East region comprises nineteen county and unitary authority districts, stretching from Milton Keynes in the north to the New Forest in the south-west and Thanet in the south-east. It covers Buckinghamshire, Oxfordshire, Berkshire, Hampshire, the Isle of the Wight, West Sussex, East Sussex and Kent. It has a population of over 8 million.

Along with the London economy, with which it has close links, the size and performance of the South East region economy is such that it is critical to the performance of the UK economy as a whole.

The South East displays similar rates of population growth but faster and labour force growth, and a higher than average economic activity rate. The South East displays the fastest projected rate of employment growth of any region over the period to 2014 (Table 3.1)

Projected job losses are confined to manufacturing and the primary & utilities. The projected rate of job loss in manufacturing is slower than the UK average. An increase in construction employment is expected, contrary to a picture of decline across the UK as a whole. The projected rate of employment increase in distribution, transport, etc, is higher than for any other region of the UK. In absolute terms, job growth in this broad sector is outstripped by the 135 thousand additional jobs expected in business and miscellaneous services. In non-marketed services employment growth in the region is expected to occur at a rate in excess of that projected across the UK as a whole.

Males account for a larger part of the increase in total employment in the South East than the UK average. For both males and females, an increase in full-time employees is projected and expected rates of change are more favourable than the national average.

Job gains are projected for managers, professional and associate professional occupations, personal service and sales & customer service occupations. The largest projected losses are for administrative, clerical & secretarial occupations, but employment decline is also expected in elementary occupations.

Once replacement demands are taken into account, the requirement for extra people in these occupations is substantially greater than the expansion demand estimates alone would suggest.

3.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 3.1 provides a general overview, while Figure 3.1 presents a graphical summary of the supply side. Figures 3.2 and 3.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population

The total population in the South East is projected to increase at a rate of 0.4 per cent per annum, which is the same projected rate for the UK. This represents an increase of almost 370 thousand between 2004 and 2014. By 2014 the population is projected to almost reach 8.5 million (see Figure 3.1).

Population 16+
The 16+ population in the South East grew by 3 per cent over 1999-2004, slightly slower than the UK average. Over 2004-09 and 2009-14 it is expected to grow by 3.6 per cent and 2.9 per cent respectively. This is slightly stronger than for the UK as a whole.

Working-age Population
The working age population is projected to increase by over 200 thousand over the period between 2004 and 2014. This represents a 0.4 per cent per annum rate, which is similar to the rate projected for both England and the UK.

***Workf*orce**
The workforce is expected to increase by around 300 thousand, to reach over 4.6 million in 2014. At an annual per annum growth rate of 0.7 per cent, this represents a marginally higher growth rate then for England and the UK (both projected at 0.5 per cent per annum).

Labour force
The labour force in the South East is expected to rise by 3.5 per cent over the period 2004-09, but by only 2.6 per cent over 2009-14 and the activity rate is expected to continue to decline but at a slower pace than historically.

ILO unemployment
Unemployment in the South East is expected to rise slightly over the period 2004-14. The overall rate is expected to rise remain at around 4 per cent, rising slightly over the period 2004-09 before falling again between 2009 and 2014.

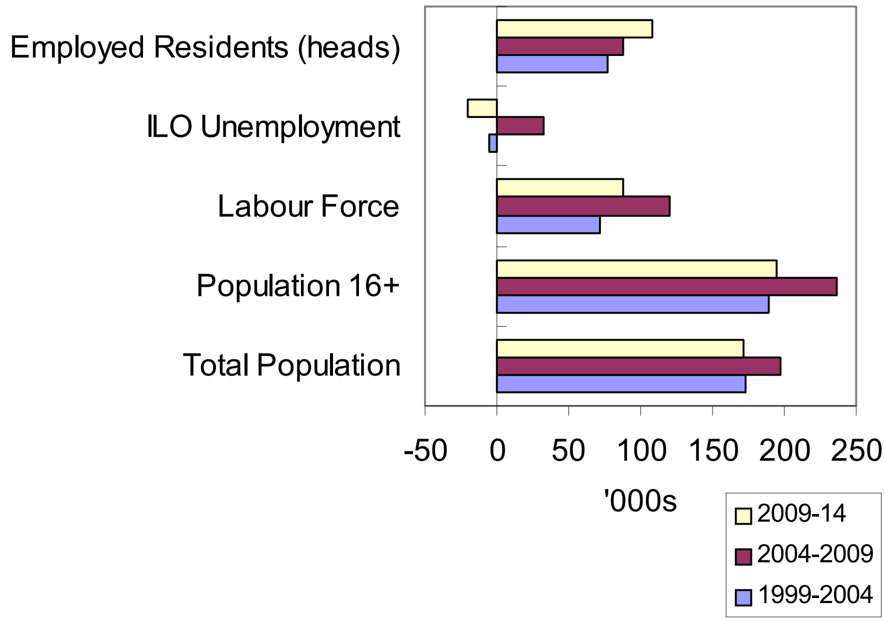
Claimant Unemployment
After falling by over 180 thousand between 1994-2004, claimant unemployment is projected to increase slightly between 2004 and 2014, thus bringing the total number of unemployed to around 75 thousand by 2014.

Employed Residents
The number of employed residents grew by 1.9 per cent in the South East over 1999-2004. Over the period 2004-09 it is expected to grow by just over 2 per cent and then by a further 3 per cent over the period 2009-14. This is stronger than the increase expected for the UK in the same forecast periods.

Workplace Employment
Total workplace employment (jobs) in the South East increased from 3.3 million in 1984 to 3.6 million in 1994, and exceeded 4.2 million in 2004. This long-term increase is projected to continue, with total employment projected to reach over 4.5 million by 2014. The projected growth rate between 2004 and 2014, at 0.7 per cent per annum, is far greater than the UK average of 0.4 per cent per annum, and is the highest rate of growth projected for any region or country of the UK. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is "double jobbing" (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In the South East, and in marked contrast to London, the labour market residual is around a ¼ of a million. This reflects the fact that many of its residents work in London. This offsets the effects of double jobbing.

Figure 3.1: Changes in Population and the Labour Force in the South East



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

CORRECT 2004-14>>2009-14 label

Table 3.1: Population and Labour Force [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	3,884	3,983	4,094	4,188	2.6	2.8	2.3
Population 16+	3,062	3,170	3,302	3,408	3.5	4.1	3.2
Labour Force	2,253	2,241	2,306	2,350	-0.5	2.9	1.9
Activity Rate	73.6	70.7	69.9	69.0	-2.9	-0.8	-0.9
ILO Unemployment	89	87	105	93	-2.2	20.3	-10.8
ILO Unemployment rate (%)	4.0	3.9	4.5	4.0	-0.1	0.7	-0.6
Employed Residents (heads)	2,162	2,169	2,202	2,257	0.3	1.5	2.5
Labour Market Residual (2)	18	132	159	178			
Female							
Total Population	4,071	4,144	4,232	4,309	1.8	2.1	1.8
Population 16+	3,293	3,375	3,480	3,568	2.5	3.1	2.5
Labour Force	1,870	1,953	2,008	2,051	4.4	2.8	2.2
Activity Rate	56.8	57.9	57.7	57.5	1.1	-0.2	-0.2
ILO Unemployment	78	74	89	80	-5.1	20.4	-10.8
ILO Unemployment rate (%)	4.2	3.8	4.4	3.9	-0.4	0.6	-0.6
Employed Residents (heads)	1,794	1,864	1,919	1,972	3.9	2.9	2.8
Labour Market Residual (2)	121	110	131	161			
Total							
Total Population	7,955	8,128	8,326	8,497	2.2	2.4	2.1
Population 16+	6,356	6,545	6,782	6,976	3.0	3.6	2.9
Working-age Population	4,864	4,989	5,070	5,197	2.6	1.6	2.5
Labour Force	4,123	4,194	4,314	4,402	1.7	2.9	2.0
Workforce	4,197	4,351	4,503	4,650	3.7	3.5	3.3
Activity Rate	64.9	64.1	63.6	63.1	-0.8	-0.5	-0.5
ILO Unemployment	167	161	194	173	-3.6	20.3	-10.7
ILO Unemployment rate (%)	4.1	3.8	4.5	3.9	-0.2	0.7	-0.6
Claimant Unemployment	95	71	85	76	-25.9	20.3	-10.8
Claimant Unemployment rate	2.0	1.4	1.7	1.5	-0.5	0.3	-0.2
Employed Residents (heads)	3,956	4,033	4,120	4,229	1.9	2.2	2.6
Workplace employment (jobs)	3,924	4,234	4,332	4,477	7.9	2.3	3.4
Labour Market Residual[2]	139	241	290	339			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

3.3 Industrial Employment Structure

Overview of Broad sectors

At the broad sectoral level, the picture for the South East is one of employment losses in the primary & utilities and manufacturing, with employment gains in distribution, transport etc., business and other services, non-marketed services. Overall almost 290 thousand jobs are expected to be created between 2004 and 2014 in the region. This represents is by far the highest absolute number of jobs expected in any of the regions and countries of the UK, with the exception of London.

Despite the projected job losses in the primary & utilities sector, females are expected to gain jobs in this sector, as well as in construction, distribution, transport etc, business and other services, and non-marketed services. Projected male employment losses are concentrated in primary & utilities and manufacturing.

Primary & utilities

The primary & utilities sector is projected to lose 6 thousand jobs, representing a 6.6 per cent decrease over the period 2004 and 2014. With the exception of Northern Ireland, this is, by far, the lowest percentage decreases of all other regions and countries of the UK.

Agriculture, hunting, forestry & fishing is expected to experience the greatest comparative loss of jobs (3 thousand) when compared alongside mining & quarrying (1 thousand) and electricity, gas & water (2 thousand). Mining & quarrying is projected to account for only 3 thousand jobs by 2014.

At local LSC area level, the fastest rate of employment decline (1.1 per cent per annum) is projected for Sussex, with Hampshire and the Isle of Wight displaying the slowest rate of decline (at 0.4 per cent per annum).

12 thousand male jobs are expected to be lost between 2004 and 2014, compared with an employment gain for females.

Manufacturing

Almost 30 thousand jobs are expected to be lost over the period from 2004 to 2014 in the South East. This represents a rate of loss of 0.7 per cent per annum. The average loss for both England and the UK is expected to be around 1.1 per cent per annum.

Engineering is projected to lose the greatest number of jobs (14 thousand), with the rest of manufacturing category losing 12 thousand, and food, drink & tobacco just 2 thousand.

Hampshire & the Isle of Wight is projected to have the fastest rate of employment decline (1 per cent per annum) over the period from 2004 to 2014.

Females are expected to account for around two-thirds of projected job losses in the region, but the projected rate of decline is slower than the England and UK average. The projected rate of loss for males is slower than in any other part of the UK except Wales.

Construction

Employment levels in construction are expected to show little change over the period from 2004 to 2014. By 2014 construction is expected to account for nearly 7 per cent of total employment. This is a lower share than in 2004, and roughly the same as in 1994.

All local LSC areas are projected to have slight increases in employment in this broad sector.

Distribution, transport etc.

Significant projected employment growth (over 110 thousand) is projected for distribution, transport etc in South East. The projected increase of 8.8 per cent between 2004 and 2014 is the highest of all the regions and countries in the UK.

The bulk of the extra jobs are expected in retail distribution (almost 80 thousand). Some 30 thousand jobs are expected to be created in the hotels & restaurants sector, representing a 0.6 per cent increase per annum. Employment in transport storage & communication is projected to increase by 5 thousand jobs.

At the local LSC level, Milton Keynes, Oxford and Buckinghamshire is projected to increase total employment in this sector by 1.1 per cent per annum: the highest of all LSC areas in the South East. Sussex is expected to show the slowest rate of increase (0.6 per cent per annum).

Distribution, transport etc. is expected to provide the main source of additional female jobs in the region (60 thousand), with a 10 per cent increase between 2004 and 2014. This is the highest in the country, outside London. The average UK increase for women is under 7 per cent. Over 50 thousand jobs are expected to be created for males.

Business & other services

Business & other services are expected to experience the greatest employment increase of any broad sector in the South East. Between 2004 and 2014, it is projected that 135 thousand jobs will be created, representing an increase of almost 11 per cent change over the period. This percentage change, however, is the lowest of all English regions with the exception of the North East.

Other business activities are projected account for 105 thousand additional jobs between 2004 and 2014. This suggests that almost 920 thousand jobs in the South East will be provided by this sector. Employment in other services is expected to increase by 0.9 per cent per annum (representing almost 20 thousand jobs). Employment in banking and insurance is expected to increase by 2.8 per cent between 2004 and 2014 (representing over 10 thousand jobs).

All local LSC areas are projected to experience an increase in employment in business & other services.

Nearly 85 thousand extra jobs for males are expected in this broad sector in the decade to 2014. Significant female employment gains are also expected (over 50 thousand). Male employment is projected to increase by 12.5 per cent, which is below the averages for England and the UK (over 15 per cent). The 9 per cent increase for women is above the levels projected for England (8 per cent) and the UK (7 per cent).

Non-Marketed Services

70 thousand jobs are expected to be created in non-marketed services in the South East. This represents a 7.6 per cent increase between 2004 and 2014, which is higher than both the average projected for England and the UK (around 6 per cent).

A reduction of around 5 thousand jobs is projected in public administration & defence between 2004 and 2014. Elsewhere in this broad sector employment gains are expected. Health and social work is projected to account for over 50 thousand additional jobs, and education almost 235 thousand.

Berkshire is projected to see a 0.9 per cent per annum increase in employment in non-marketed services between 2004 and 2014, which is the highest of all local LSC areas in the South East.

Over 50 thousand jobs in non-marketed services are expected to be filled by females, with the remaining 20 thousand extra jobs expected to be taken by males.

3.4 Change in Employment by Gender and Employment Status

Males

Falling from a peak of nearly 41 per cent in 1984, in 2014 male full-time employees are projected to account for just over 36 per cent of all jobs in the South East. Females in full-time jobs are expected to account for almost 22 per cent of total employment in 2014.

Part time employment is also expected to increase in importance for both males and females over the decade to 2014.

Females

In 1984 females accounted for around 1.5 million jobs (44 per cent of those in employment). By 1994 the female share of total employment had risen to nearly 48 per cent, only to fall back slightly by 2004. It is projected that by 2014, females will account for around 47 per cent to total employment. The number of females employed is projected to reach 2.1 million.

The projected share of total employment accounted for by females in South East in 2014 is greater than the UK average. Only the East of England, the South West and Scotland are expected to have a higher percentage of females in employment by 2014.

3.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such 'structural demand' provides only part of the overall picture of occupational change. For a fuller picture of the changing requirement for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc. as captured by 'replacement demand' (see Section 3.6).

At the level of SOC major groups, the largest single increase in occupational employment between 2004 and 2014 is projected for managers & senior officials, with an expected net gain of 120 thousand jobs. Employment in both professional occupations and personal service occupations is projected to increase by almost 80 thousand jobs, with sales & customer service occupations and associate professional & technical occupations each gaining over 60 thousand jobs. Comparatively minor job growth is projected for skilled trades occupations (8 thousand).

Net job losses are projected for administrative, clerical & secretarial occupations (over 60 thousand), elementary occupations (just under 60 thousand) and machine and transport operatives (two thousand).

1. Managers & senior officials

Employment amongst managers & senior officials is expected to increase by 120 thousand between 2004 and 2014. This represents a 1.5 per cent per annum increase over the decade to 2014. Only London records a faster projected rate of employment increase.

The substantial projected net job gains are accounted for entirely by an increase in employment for corporate managers (see Table 3.2). A small decline in employment for managers/proprietors is expected.

At the local LSC area level, Milton Keynes, Oxford & Buckinghamshire is projected to experience the highest rates of employment growth.

Of the expected 120 additional thousand jobs, almost twice as many are projected to be filled by women as by men.

2. Professional occupations

A 16 per cent increase in employment is projected for professional occupations between 2004 and 2014, leading to the creation of almost 80 thousand jobs.

Teaching & research professionals are expected to make the largest contribution to overall projected employment increase, with 30 thousand extra jobs, with science and technology professionals contributing 25 thousand additional jobs. Business professionals record the next largest projected increases, with almost 20 thousand more jobs. Almost 10 thousand jobs are expected for health professionals.

At local LSC level Hampshire & the Isle of Wight, Milton Keynes, Oxford & Buckinghamshire and Sussex are each projected to add see around 100 thousand extra jobs between 2004 and 2014.

Both men and women are projected to be beneficiaries from the expansion in jobs in professional occupations.

3. Associate professional & technical occupations

A 0.9 per cent per annum increase is projected for this SOC major group between 2004 and 2014, representing the creation of just over 60 thousand jobs. This rate is slightly higher than that expected in England and for the UK as a whole.

Business associate professionals account for the largest employment gains, with a projected increase of 25 thousand jobs. The next largest increase (20 thousand extra jobs) is expected for culture/media/sports occupations. Science & technology associate professionals are projected to increase by 8 thousand jobs. For each of health associate professionals and protective service professionals around 5 thousand extra jobs are expected.

All local LSC areas are projected to share in this employment increase.

Expected jobs gains in this SOC major group are shared evenly between males and females.

4. Administrative, clerical & secretarial occupations

Administrative, clerical & secretarial occupations are projected to account for the single largest loss of jobs (over 60 thousand) between 2004 and 2014. This represents a rate of loss of over 11 per cent which is above the average levels projected for England and the UK.

The projected net loss of jobs is a function of expected losses in both administrative and clerical occupations (almost 25 thousand) and secretarial and related occupations (around 40 thousand).

At local LSC area level, Surrey displays the share of administrative, clerical & secretarial occupations in total employment (11.5 per cent). All local LSC areas are projected to share in the projected employment decline.

Almost 50 thousand of the projected jobs losses affect females.

5. Skilled trades occupations

Employment in skilled trade occupations is projected to decline by 3 per cent in England and 4 per cent in the UK between 2004 and 2014. The South East however goes against this general trend, and is expected to increase its total employment by 8 thousand (a 1.7 per cent increase over the same period). The South East is the only part of the UK projected to show positive employment growth for this occupational group.

Skilled metal & electrical trades dominate overall projected employment decline, with a loss of around 40 thousand jobs expected. This contrasts with skilled construction and building trades with a projected increase of 40 thousand jobs. Other skilled trades are projected to lose 10 thousand jobs, but skilled agricultural trades are expected to gain around 15 thousand jobs.

A 3 thousand job loss is expected for females, whereas employment levels for males are expected to increase by over 10 thousand.

6. Personal Services occupations

After the West Midlands, the highest rates of increase in employment in personal service occupations are found in the South East, projected at 2.2 per cent per annum.

Around 75 thousand jobs are expected to be created by 2014.

The vast majority of job gains (60 thousand) are accounted for by caring personal service occupations. However, projected rates of increase for both caring personal service occupations and leisure occupations are higher than the UK average.

At local LSC area level the projected annual average rate of growth ranges from 2.0 per cent in Kent & Medway to 2.4 per cent in Hampshire & Isle of Wight and Surrey.

Females account for the vast majority of employment gains (some 70 thousand) in this SOC major group.

7. Sales & customer service occupations

An additional 65 thousand jobs are expected in this SOC major group by 2014. This represents a 1.8 per cent per annum increase over the period between 2004 and 2014, which is the highest in all the regions and countries of the UK, matched only by the North East.

Out of 65 thousand extra jobs expected, over 45 thousand are accounted for by sales occupations, with the rate of employment growth exceeding the UK average. Although the rate of projected employment growth is higher for customer service occupations, in the South East the rate of growth for this occupation group is slower than the UK average.

Within the region Berkshire displays the fastest annual average growth rate (2.1 per cent) and Kent & Medway, together with Hampshire & the Isle of Wight, the slowest (1.6 per cent per annum).

Females are expected to gain slightly more of the additional jobs than males.

8. Machine & transport operatives

Employment amongst machine & transport operatives is projected to continue to decline throughout the regions and countries of the UK. The South East, with the loss of 2 thousand jobs, is no exception. The 0.1 per cent per annum projected loss though is the slowest of all regions and countries of the UK.

The overall projected decrease in employment is a function of an expected reduction of 36 thousand jobs for process machine operatives, coupled with a gain of 34 thousand jobs for drivers & other operatives.

At local LSC area level, Surrey displays the smallest share of total employment accounted for by this SOC major group (5.1 per cent) and Kent & Medway the largest share (6.2 per cent).

Females are projected to account for all the jobs losses in this occupation (15 thousand) with males gaining just over 12 thousand jobs by 2014.

9. Elementary Occupations

The long-term decline in employment in elementary occupations in the South East is projected to continue, with a loss of almost 60 thousand jobs expected over the period to 2014. This is a 13 per cent loss compared to 2004, which is slightly lower than the 19 per cent and 16 per cent rates of loss projected for the UK, and England respectively.

Over 45 thousand jobs are expected to be lost in elementary trades occupations and over 10 thousand in elementary service occupations.

All local LSC areas share in a slower than national average rate of employment decline.

A loss of 35 thousand jobs is projected for females, compared with a projected 22 thousand loss for males.

3.6 Projections of Replacement Demands

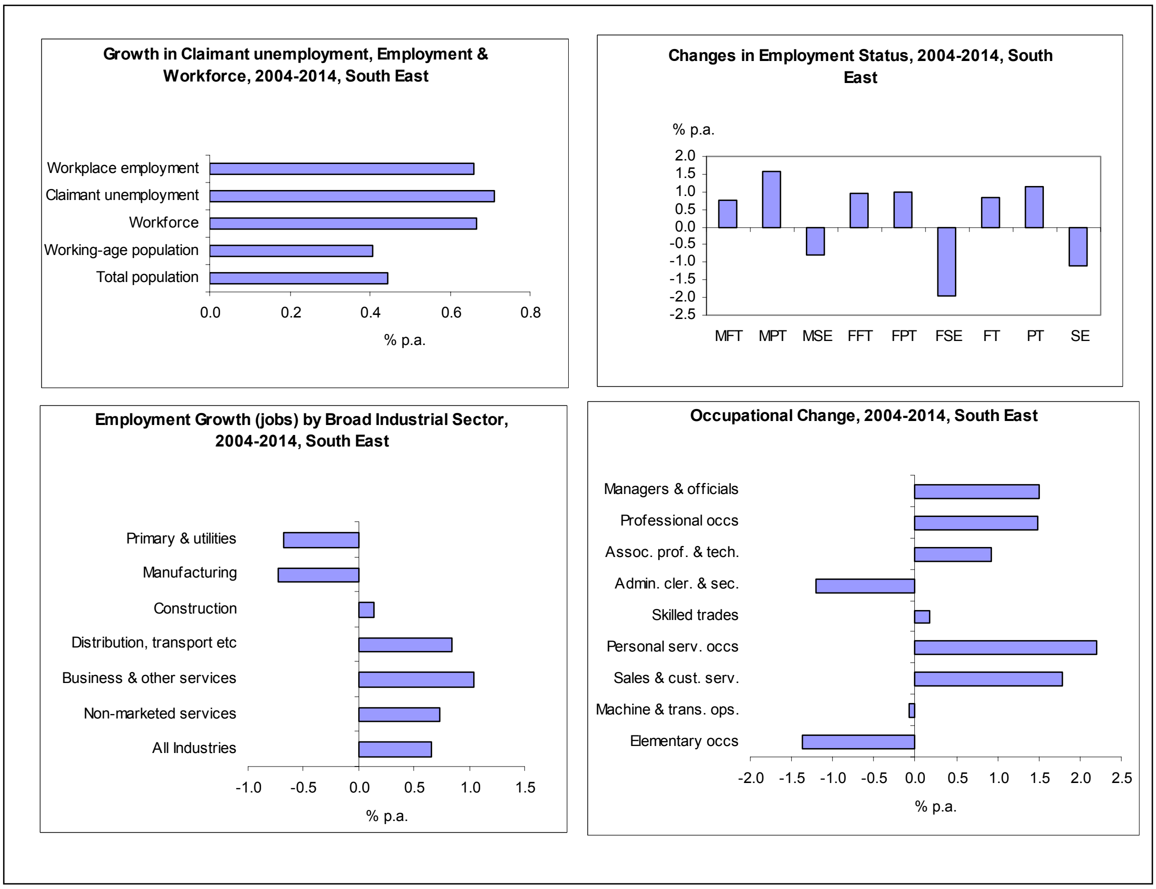
The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

- Regardless of whether expansion demand projections suggest an increase or decrease in employment levels, all SOC major groups have positive total requirements.

- The occupations with the highest expansion demands for the South East display the highest overall requirements. Thus managers & senior officials have the highest projected overall requirements (400 thousand), followed by associate professional & technical occupations (270 thousand) and professional occupations (260 thousand).

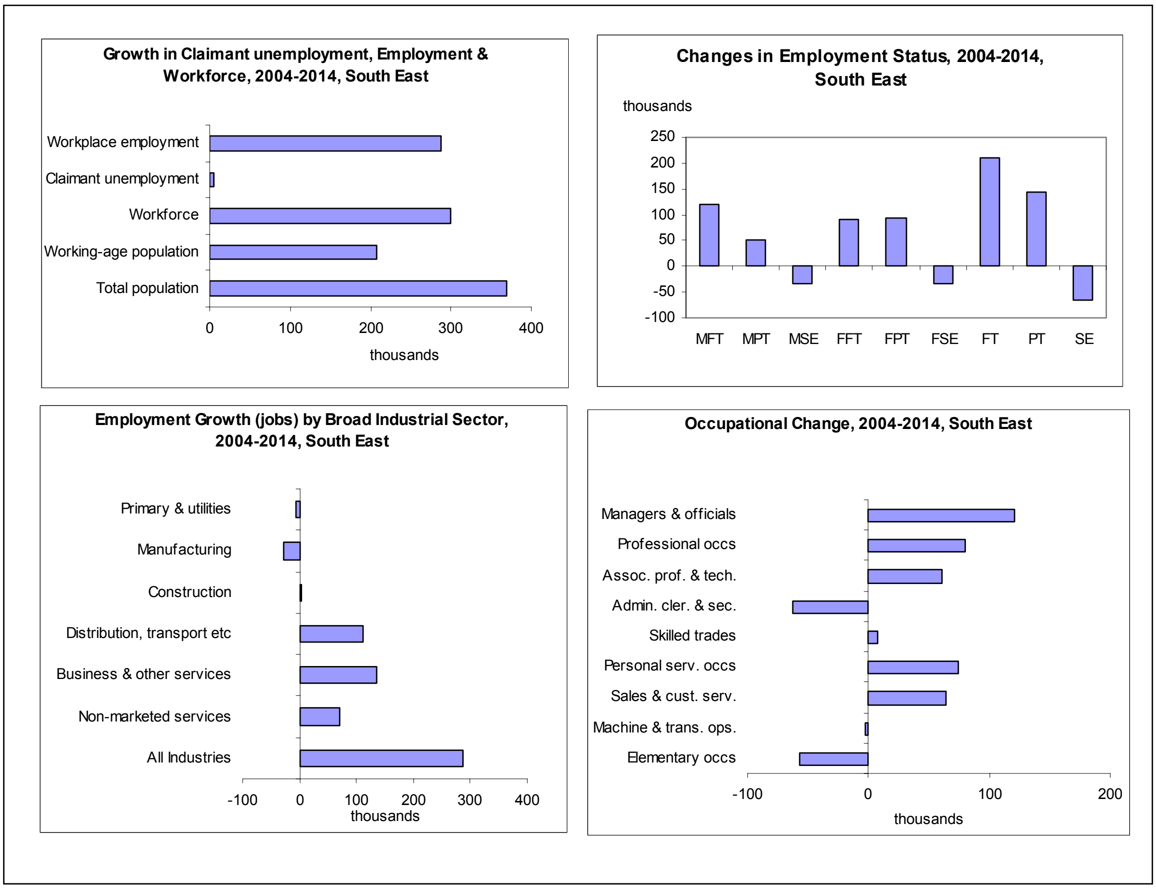
- The considerable negative expansion demand for administrative, clerical & secretarial occupations (a projected loss of over 60 thousand jobs) is overturned by the replacement demand of over 200 thousand for this occupational group. Thus, the overall requirement is for an extra 160 thousand people by 2014. Elementary occupations are the other main group where projected structural changes suggested an overall reduction in employment levels. But with a replacement demand of almost 160 thousand outweighing the projected loss, again the overall requirement is positive and considerable (over 100 thousand in the period to 2014).

Figure 3.2: Key Changes in the South East, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 3.3: Key Changes in the South East, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 3.2: Sectoral Change in the South East

	South East											England		UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	86	80	66	63	2.6	2.2	1.6	1.4	-3	-5.0	-0.5	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	18	6	4	3	0.5	0.2	0.1	0.1	-1	-13.9	-1.5	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	29	35	23	21	0.9	1.0	0.6	0.5	-2	-10.0	-1.0	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*132*	*121*	*93*	*87*	*4.0*	*3.3*	*2.2*	*1.9*	*-6*	*-6.6*	*-0.7*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	52	29	28	26	1.6	0.8	0.7	0.6	-2	-8.6	-0.9	-11.5	-1.2	-10.0	-1.1
4. Engineering	173	129	116	103	5.2	3.5	2.8	2.3	-14	-11.7	-1.2	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	381	293	254	242	11.4	8.1	6.0	5.4	-12	-4.7	-0.5	-11.3	-1.2	-11.3	-1.2
Manufacturing	*606*	*450*	*398*	*370*	*18.2*	*12.4*	*9.4*	*8.2*	*-28*	*-7.0*	*-0.7*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	267	249	309	313	8.0	6.8	7.3	6.9	4	1.4	0.1	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	585	653	754	831	17.6	17.9	17.8	18.4	78	10.3	1.0	7.0	0.7	6.7	0.6
9. Hotels & restaurants	191	202	267	297	5.7	5.5	6.3	6.6	29	11.0	1.1	6.2	0.6	5.7	0.6
10. Transport & comm.	200	214	253	258	6.0	5.9	6.0	5.7	5	1.8	0.2	2.5	0.3	2.7	0.3
Distribution transport etc.	*976*	*1068*	*1274*	*1386*	*29.3*	*29.4*	*30.1*	*30.7*	*112*	*8.8*	*0.8*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	116	145	147	158	3.5	4.0	3.5	3.5	11	7.2	0.7	3.4	0.3	2.8	0.3
12. Other business activities	332	542	814	919	10.0	14.9	19.3	20.4	105	12.9	1.2	15.5	1.5	15.7	1.5
16. Other services	179	195	270	289	5.4	5.3	6.4	6.4	19	7.1	0.7	8.6	0.8	9.3	0.9
Business & other services	*628*	*881*	*1231*	*1366*	*18.9*	*24.2*	*29.1*	*30.3*	*135*	*10.9*	*1.0*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	192	188	170	165	5.8	5.2	4.0	3.7	-5	-3.1	-0.3	-2.5	-0.3	-2.3	-0.2
14. Education	240	301	331	355	7.2	8.3	7.8	7.9	24	7.3	0.7	5.7	0.6	5.7	0.6
15. Health & social work	288	379	421	472	8.7	10.4	10.0	10.5	51	12.2	1.2	10.2	1.0	9.7	0.9
Non-marketed services	*720*	*868*	*922*	*992*	*21.6*	*23.9*	*21.8*	*22.0*	*70*	*7.6*	*0.7*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	3328	3638	4227	4514	100.0	100.0	100.0	100.0	287	6.8	0.7	4.6	0.5	4.3	0.4

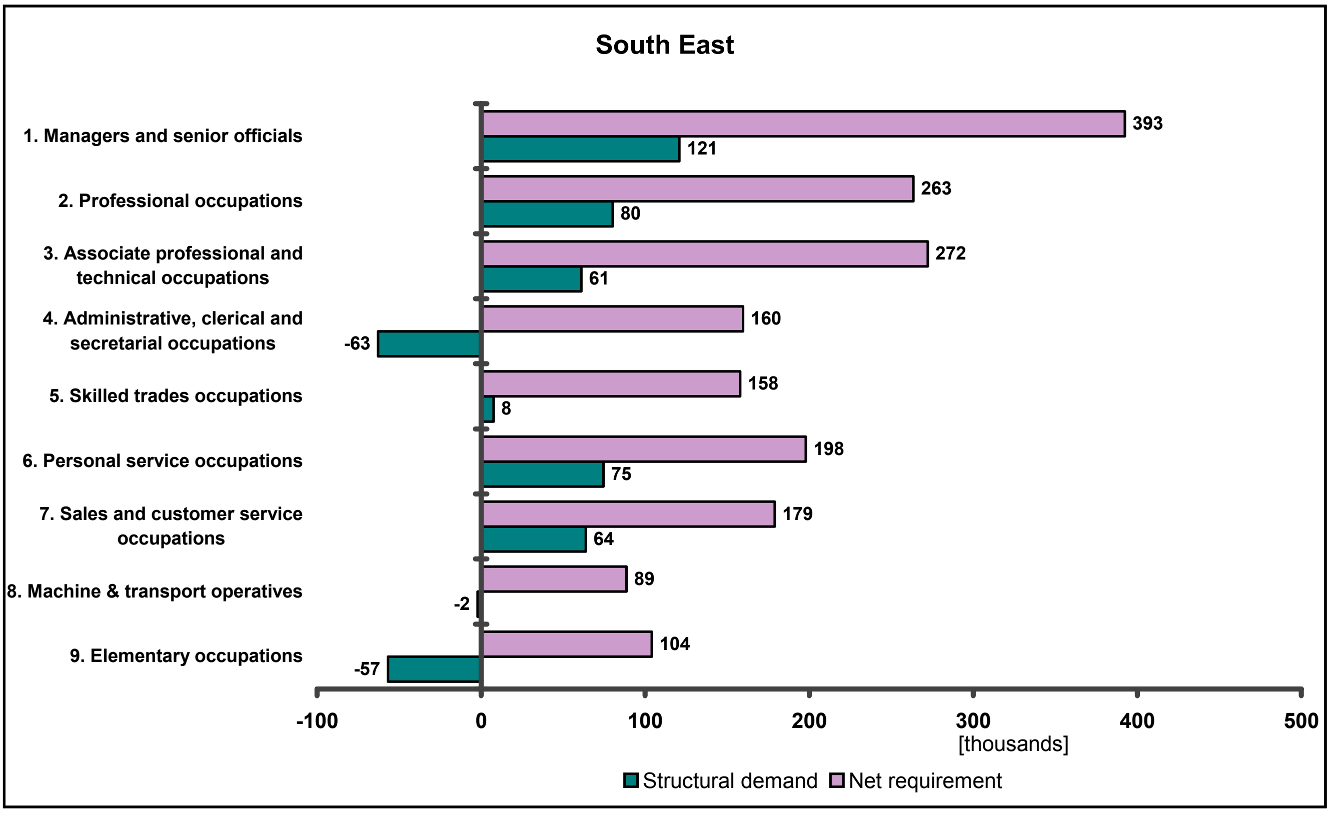
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 3.3: Occupational Change in the South East

	South East											England		UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
					% of	% of	% of	% of		%	% per	%	% per	%	% per
Occupational sub-major group	000s	000s	000s	000s	total	total	total	total	000s	change	annum	change	annum	change	annum
Corporate managers	317	415	586	714	9.5	11.4	13.9	15.8	129	22.0	2.0	20.2	1.9	19.9	1.8
Managers / proprietors	145	153	166	158	4.4	4.2	3.9	3.5	-8	-4.8	-0.5	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	101	122	167	191	3.0	3.4	3.9	4.2	24	14.4	1.4	18.9	1.7	18.3	1.7
Health professionals	19	26	34	43	0.6	0.7	0.8	1.0	9	25.4	2.3	29.8	2.6	29.4	2.6
Teaching & res. Profs.	131	160	184	213	3.9	4.4	4.4	4.7	29	15.9	1.5	19.9	1.8	21.6	2.0
Business professionals	72	93	122	140	2.2	2.5	2.9	3.1	18	15.1	1.4	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	64	72	91	99	1.9	2.0	2.2	2.2	8	8.3	0.8	12.2	1.2	12.4	1.2
Health assoc. profs.	96	117	134	138	2.9	3.2	3.2	3.0	4	2.6	0.3	7.7	0.7	7.8	0.8
Protect. serv. occs	26	38	59	64	0.8	1.0	1.4	1.4	4	7.4	0.7	0.8	0.1	0.1	0.0
Culture, med. & sports	41	61	103	124	1.2	1.7	2.4	2.7	21	20.7	1.9	24.5	2.2	23.5	2.1
Business assoc. profs.	146	186	246	270	4.4	5.1	5.8	6.0	25	10.0	1.0	10.0	1.0	9.2	0.9
Admin & clerical	368	392	394	371	11.1	10.8	9.3	8.2	-23	-5.8	-0.6	-4.2	-0.4	-3.1	-0.3
Secretarial and related	190	196	154	114	5.7	5.4	3.6	2.5	-40	-25.9	-2.9	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	37	42	50	65	1.1	1.1	1.2	1.4	15	30.4	2.7	17.3	1.6	15.5	1.5
Skilled metal & electrical	218	190	163	124	6.6	5.2	3.9	2.8	-39	-23.8	-2.7	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	144	134	157	197	4.3	3.7	3.7	4.4	40	25.5	2.3	20.2	1.9	19.4	1.8
Other skilled trades	87	86	81	72	2.6	2.4	1.9	1.6	-9	-10.6	-1.1	-14.7	-1.6	-14.6	-1.6
Caring personal service	75	131	226	287	2.2	3.6	5.3	6.4	62	27.2	2.4	23.8	2.2	22.8	2.1
Leisure occupations	62	70	82	95	1.9	1.9	1.9	2.1	13	16.1	1.5	7.3	0.7	6.7	0.7
Sales occupations	183	212	269	315	5.5	5.8	6.4	7.0	46	17.1	1.6	13.0	1.2	12.0	1.1
Customer service occs.	20	30	60	78	0.6	0.8	1.4	1.7	18	29.6	2.6	31.3	2.8	32.2	2.8
Process machine ops.	199	153	122	86	6.0	4.2	2.9	1.9	-36	-29.2	-3.4	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	113	115	136	170	3.4	3.2	3.2	3.8	34	24.7	2.2	18.5	1.7	17.2	1.6
Elementary: trades	187	153	125	80	5.6	4.2	3.0	1.8	-46	-36.5	-4.4	-36.6	-4.4	-35.5	-4.3
Elementary: service	288	291	317	306	8.6	8.0	7.5	6.8	-11	-3.4	-0.3	-12.2	-1.3	-12.9	-1.4
All occupations	3328	3638	4227	4514	100.0	100.0	100.0	100.0	287	6.8	0.7	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 3.4: Replacement Demands in the South East



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

4. EAST OF ENGLAND

4.1 Overview

The East of England includes the counties of Cambridgeshire, Norfolk, Suffolk, Essex, Hertfordshire and Bedfordshire, together with the unitary authorities of Peterborough, Luton, Southend and Thurrock.

Overall, the region is characterised by high rates of population and employment growth. Within the region there is a general north-east/south-west economic 'split'. The southern part of the region (particularly Hertfordshire and Essex) has strong links with the London economy. Some north-eastern areas (notably in Norfolk and Suffolk) tend to lag behind economically, suffering some problems of peripherality and lack of infrastructure investment, despite the region as a whole performing reasonably well in national terms on most indicators.

Across the East of England the population and labour force is expected to grow at rates in excess of the national average.

Workplace employment is projected to grow at 0.5 per cent per annum over the period to 2014, increasing in total by around 130 thousand. As in other regions, projected job losses in the East of England are concentrated in the primary sector & utilities sector and in manufacturing. The projected rates of employment decrease in the primary sector & utilities in the East of England are amongst the fastest displayed by any region. These are offset by job gains elsewhere, mostly in business and other services.

Almost 125 thousand additional jobs are projected for professional occupations and for managers & senior officials. Gains are also expected in associated professional & technical occupations, personal service occupations and sales & customer service occupations. The rate of projected loss in skilled trades occupations is slower than the UK average. A similar pattern of slower than average employment decline is also evident for Machine & transport operatives and for elementary occupations. Projections of replacement demands show that requirements are positive in all SOC major groups.

4.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 4.1 provides a general overview, while Figure 4.1 presents a graphical summary of the supply side. Figures 4.2 and 4.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population
The total population in the East of England is projected to increase by around 300 thousand between 2004 and 2014, to reach around 5.8 million.

Population 16+
The 16+ population in the East of England is expected to increase by 320 thousand over 2004-14, an increase of 7.2 per cent.

Working-age Population
The working age population is projected to increase by 130 thousand, to approach 3.5 million by 2014. This increase (0.4 per cent per annum) is marginally slower than the 0.5 per cent per annum rate projected for England and the UK.

Workforce
The workforce is projected to grow by 150 thousand to reach almost three million by 2014. At an annual growth rate of 0.5 per

cent, this represents a growth rate similar to the projected UK average.

Labour Force
The labour force is expected to increase by 160 thousand, a 5.7 per cent increase. Consequently, the activity rate is expected to decline, but this mainly reflects the falling activity rate among the male population.

ILO unemployment
Unemployment in the East of England is expected to rise by 29 thousand over 2004-14. Male unemployment is expected to rise by 16 thousand, while female unemployment increased by 13, thousand.

Claimant Unemployment
Unemployment is projected to increase between 2004 and 2014 by around 15 thousand to reach 70 thousand.

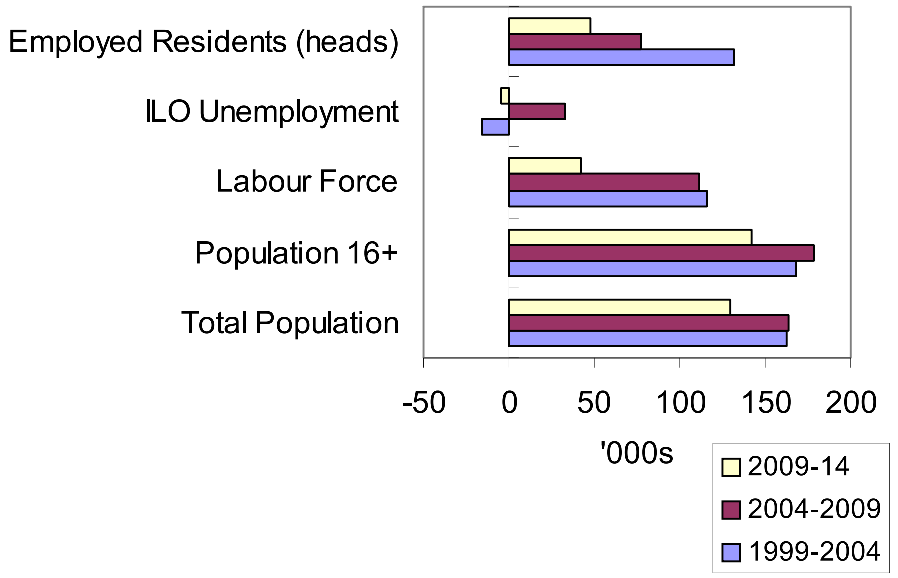
Employed Residents
The number of employed residents is expected to grow in line with the UK average over 2004-14. While male employment is expected to grow by around 2 per cent over the period 2004-09, female employment is expected to grow by well over 4 per cent.

Workplace Employment
Total workplace employment in the East of England is set to increase by 135 thousand to reach over 2.8 million by in 2014. At 0.5 per cent per annum, this projected growth rate is the same as England and marginally greater than the UK (0.4 per cent).

Cambridgeshire, with a projected increase of 0.7 per cent per annum, is projected to gain the most employment of all the local LSC areas between 2004 and 2014. Luton and Bedfordshire is expected to increase the slowest – by 0.2 per cent per annum. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is “double jobbing” (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. As in the South East, the labour market residual is very small compared with London, reflecting the fact that some residents commute into London to work. This offsets the effects of double jobbing.

Figure 4.1: Changes in Population and the Labour Force in the East of England



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 4.1: Population and Labour Force [1]

	1999	2004	2009	2014	1999-2004	2004-09	2009-14
					percentage change over period		
Male							
Total Population	2,616	2,702	2,790	2,860	3.3	3.3	2.5
Population 16+	2,061	2,149	2,247	2,325	4.3	4.6	3.5
Labour Force	1,489	1,514	1,570	1,591	1.7	3.6	1.4
Activity Rate	72.3	70.5	69.9	68.4	-1.8	-0.6	-1.5
ILO Unemployment	68	58	77	74	-14.7	32.2	-3.7
ILO Unemployment rate (%)	4.6	3.8	4.9	4.6	-0.7	1.1	-0.2
Employed Residents (heads)	1,430	1,460	1,493	1,517	2.1	2.3	1.6
Labour Market Residual (2)	-31	31	22	14			
Female							
Total Population	2,723	2,800	2,875	2,935	2.8	2.7	2.1
Population 16+	2,193	2,273	2,353	2,417	3.6	3.5	2.7
Labour Force	1,211	1,302	1,358	1,379	7.5	4.3	1.6
Activity Rate	55.2	57.3	57.7	57.1	2.1	0.4	-0.6
ILO Unemployment	52	46	61	59	-11.5	32.2	-3.6
ILO Unemployment rate (%)	4.3	3.5	4.5	4.3	-0.8	0.9	-0.2
Employed Residents (heads)	1,150	1,252	1,297	1,320	8.9	3.6	1.8
Labour Market Residual (2)	32	33	35	60			
Total							
Total Population	5,339	5,501	5,665	5,795	3.0	3.0	2.3
Population 16+	4,253	4,422	4,600	4,742	4.0	4.0	3.1
Working-age Population	3,250	3,352	3,404	3,479	3.1	1.6	2.2
Labour Force	2,700	2,816	2,927	2,970	4.3	3.9	1.4
Workforce	2,663	2,839	2,928	2,989	6.6	3.1	2.1
Activity Rate	63.5	63.7	63.6	62.6	0.2	-0.1	-1.0
ILO Unemployment	120	104	138	133	-13.3	32.2	-3.6
ILO Unemployment rate (%)	4.4	3.7	4.7	4.5	-0.8	1.0	-0.2
Claimant Unemployment	77	55	73	70	-27.7	32.2	-3.6
Claimant Unemployment rate	2.4	1.6	2.1	2.0	-0.7	0.5	-0.1
Employed Residents (heads)	2,580	2,712	2,790	2,837	5.1	2.9	1.7
Workplace employment (jobs)	2,513	2,700	2,796	2,872	7.5	3.6	2.7
Labour Market Residual[2]	1	64	57	74			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

4.3 Industrial Employment Structure

Overview of broad sectors

At the broad sectoral level, the picture for the East of England is one of projected employment losses in primary & utilities, manufacturing, and construction and employment gains in distribution, transport etc., business & other services, and non-marketed services.

Primary sector & utilities

In absolute terms, 13 thousand jobs are projected to be lost in the East of England in this sector. This represents an employment loss of 2.5 per cent per annum, which is well above the 1.7 per cent per annum lost projected for the UK.

Agriculture, hunting, forestry and fishing, is projected to lose 11 thousand jobs and account for just 1.1 per cent of the total employment by 2014. Employment in mining and quarrying is expected to stay fairly constant, whereas electricity gas and water is projected to lose a thousand jobs over the period between 2004 and 2014 (see Table 4.1).

All local LSC regions are projected to suffer employment loss in this sector, ranging from Luton & Bedfordshire at 4.1 per cent per annum to Suffolk at 2.0 per cent per annum. By 2014, only Norfolk is projected to employ over 10 thousand people in this sector.

All the projected job losses in this broad sector are expected to be concentrated amongst males. The rate of loss in the East of England for this broad sector is the highest of all the English regions and the other countries of the United Kingdom. This is concentrated in agriculture and reflects continuing rapid growth in productivity levels there.

Manufacturing

A long-term decline in this sector is projected to continue, with over 30 thousand jobs projected to be lost by 2014. This represents a loss of 1.0 per cent per annum over the decade to 2014, which is just below the average expected for England and the UK (1.1 per cent per annum). The ‘rest of manufacturing’ category is projected to account for the vast majority of lost jobs (23 thousand). Both food, drink & tobacco and engineering are expected to lose 4 thousand jobs.

Between 2004 and 2014 Luton & Bedfordshire is projected to suffer the fastest rate of employment loss (1.3 per cent per annum) and Hertfordshire the slowest rate of loss (0.7 per cent per annum).

Job losses are expected to affect both males (19 thousand) and females (13 thousand).

Construction

A small loss of 2 thousand jobs is projected between 2004 and 2014. This represents a rate of loss of 0.1 per cent per annum, which is slower than that projected for England (0.3 per cent per annum).

Employment levels in Hertfordshire and Essex are projected to remain stable between 2004 and 2014, while only Norfolk is projected to experience employment increase.

Females are projected to experience a small increase in employment (2 thousand), with males expected to account for the loss of 4 thousand jobs for the sector between 2004 and 2014.

Distribution, transport etc.

Over 50 thousand jobs in this sector are expected to be created by 2014. At 0.6 per cent per annum this growth rate is exceeded by the South East (0.8 per cent per annum) and the North West (0.7 per cent per annum). Retail distribution is expected to be the largest source of employment growth for this sector between 2004 and 2014, with an additional 35 thousand jobs – a 0.6 per cent per annum increase. However employment in hotels & restaurants is projected to increase by 0.8 per cent per annum, which is higher than the average change of 0.6 per cent per annum for England and the UK.

All local LSC areas are projected to experience employment gains between 2004 and 2014.

Female employment is projected to increase at a faster rate than for males (0.7 per cent per annum, compared with 0.5 per cent per annum). This results in an increase of almost 60 thousand jobs for females, compared with just over 50 thousand jobs for males.

Business & other services

The largest projected job growth in the region – some 90 thousand extra jobs – is expected in this sector. This represents an increase of nearly 13 per cent from 2004 to 2014, which is slightly greater than the average rates for both England and the UK (around 12 per cent).

Almost 75 thousand of the projected additional jobs are expected in other business activities. Projected employment growth in banking & insurance is much more modest, with just 3 thousand additional jobs expected, but this represents a faster rate of increase than the UK average. In other services the projected increase of nearly 15 thousand jobs represents a rate of growth akin to the average for England.

At local level Cambridgeshire and Hertfordshire display the fastest rates of projected employment growth (1.7 per cent per annum and 1.5 per cent per annum, respectively) compared with the England average of 1.2 per cent per annum.

Of the 90 thousand additional jobs projected, the majority (nearly 60 thousand) are projected to be filled by males. This represents a 15 per cent increase over the period from 2004 to 2014. This is below the rather less than expected changes in England and the UK as a whole. However, the 10 per cent increase for females over the same period is above the average levels projected for England (nearly 8 per cent).

Non-marketed services

Levels of employment in non-marketed services are projected to increase by around 35 thousand. At 0.6 per cent per annum, the annual average rate of employment growth is akin to that projected for England and the UK.

Employment increases at the local LSC level range from 1.0 per cent per annum in Norfolk to 0.3 per cent per annum in Luton & Bedfordshire.

A projected loss of 5 thousand jobs for males contrasts with an additional 42 thousand jobs expected for females.

4.4 Change in Employment by Gender and Employment Status

Males

In 1984 males accounted for 58 per cent of employment in the East of England (1.3 million jobs). Since then although the number of males in employment has steadily increased, their share of full-time work has steadily declined. By 2014, it is projected that just 52 per cent off all jobs in the region will be filled by males. Self employment is also projected to decline as a share of total employment.

By 2014 it is projected that just over a million males will be in full-time employment. In 1984 just 4 per cent of males worked in part-time jobs. By 2014 this share is projected to rise to 7.4 per cent (around 215 thousand jobs).

Females

The share of female full time employees is projected to increase slightly from 20.8 per cent in 1994 to 21.2 per cent by 2014. In absolute terms, this increase suggests that

615 thousand females will be in full-time employment in 2014.

In 1984 427 thousand (around 19 per cent) of females were in part-time employment. This figure increased to nearly 22 per cent in 1994, before falling to 21 per cent in 2004. For 2014, it is projected that 980 thousand women (nearly 22 per cent) will be in part-time employment.

The number of females in self employment is also projected to decline slightly.

4.5 Occupational Prospects

Overview

This section concentrates on employment projections for different occupations. It should be remembered that such 'structural demand' provides only part of the overall picture of occupational change. For a fuller picture of the changing requirement for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by 'replacement demand' (see Section 4.6).

Employment gains are projected for managers & senior officials (65 thousand), professional occupations (57 thousand), associate professional & technical occupations (40 thousand), personal service occupations (45 thousand), and sales & customer service occupations (40 thousand) between 2004 and 2014.

Job losses are projected in administrative, clerical & secretarial occupations (30 thousand), skilled trades occupations (10 thousand), machine & transport operatives (10 thousand) and elementary occupations (55 thousand).

1. Managers & senior officials

Managers & senior officials are projected to account for the largest single increase in jobs (65 thousand) in the East of England. This represents a 14 per cent change over the period from 2004 and 2014, which is the third highest increase in the UK, behind London (19 per cent) and the South East (16 per cent).

The projected job gains in this occupational group are accounted for solely by the increase of over 70 thousand job for corporate managers (see Table 4.2). Employment for managers & proprietors is expected to decline by over 5 thousand.

At the local LSC level all areas benefit from a projected employment increase. The rates of increase vary from 1.1 per cent per annum in Suffolk to 1.5 per cent in Cambridgeshire.

Almost 50 thousand jobs are projected to be taken by women, with 18 thousand jobs going to males.

2. Professional occupations

Over 55 thousand extra jobs are projected in professional occupations between 2004 and 2014. This represents a faster rate of growth (1.7 per cent per annum) than across the UK as a whole (1.4 per cent per annum).

Nearly 20 thousand extra teaching & research professional posts are expected, as well as 17 thousand additional jobs for science & technical professionals. Business professionals are expected to account for 10 thousand additional jobs. 10 thousand additional health professional posts are expected.

At the local level within the East of England the shares of employment in this occupation group range from 11 per cent in Suffolk to over 14 per cent in Cambridgeshire.

Males are expected account for 25 thousand of the projected employment gains.

3. Associate professional & technical occupations

Almost 40 thousand extra jobs are projected for this SOC major group between 2004 and 2014. This represents an increase of 10 per cent over the same period, which is greater than the increase projected for England as a whole (9 per cent) but slower than that expected for the UK (11 per cent).

Of the projected increase of 40 thousand jobs over the period to 2014, culture, media & sports occupations account for the largest expected employment gains (17 thousand jobs), followed by an expected increase of about 13 thousand jobs in business associate professionals. Almost 10 thousand additional jobs are expected for science & technology associate professionals. Marginal gains of 2 thousand jobs are expected for both health associate professionals and protective service occupations.

At the local level, Cambridgeshire displays the highest share of such employment (with around 15 per cent of total employment in this SOC major group in 2014), while Suffolk records the smallest share (just under 14 per cent)

Employment gains are expected to be divided equally between males and females. Just over 18 thousand of the projected additional jobs are expected to be filled by men. This represents a 0.9 per cent per annum increase from 2004 and 2014, which is above the average projected for the UK.

4. Administrative, clerical & secretarial occupations

A loss of almost 30 thousand jobs is projected for this SOC major group. This represents a loss of 0.8 per cent per annum between 2004 and 2014.

Secretarial & related occupations account for three quarters of all the projected job losses for this SOC major group. For both secretarial and related occupations and administrative & clerical occupations the projected rate of job loss is slightly slower than the UK average.

At local LSC area level, the shares of such employment range from 10.5 per cent in Norfolk to 12 per cent in Luton & Bedfordshire. Within the East of England, Essex displays the fastest rate of loss (at 1.1 per cent per annum) and Suffolk the slowest (0.4 per cent per annum).

Females account for the majority of projected job losses in this SOC major group.

5. Skilled trades occupations

A loss of almost 10 thousand jobs is projected for skilled trade occupations. This represents a fall of 0.3 per cent per annum in the East of England, which is marginally slower than the loss projected for the UK (0.4 per cent per annum).

The majority of job losses are projected to occur in skilled metal & electrical trades (30 thousand). Losses of up to 10 thousand jobs are projected for other skilled trades. Small employment gains are projected for skilled agricultural trades (6 thousand) but the majority of employment gains are expected in skilled construction and building trades (22 thousand).

With the exception of Norfolk, which is expected to show an employment increase of 0.1 per cent per annum, local LSC area projected losses range from 0.1 per cent per annum in Cambridgeshire to 0.7 per cent per annum in Suffolk.

The expected loss of jobs in skilled trades occupations falls fairly equally on both genders, with 6 thousand job losses accounted for by males and 3 thousand females.

6. Personal service occupations

Employment in personal service occupations is expected to increase by 45 thousand (2 per cent per annum) between 2004 and 2014. This is the third highest increase for any occupational group in the region, behind SOC major groups 1 and 2.

By 2014, the East of England is projected to have 40 thousand additional people employed in caring personal service occupations. With 5 thousand extra jobs expected, the increase for leisure occupations (0.9 per cent per annum), exceeds the projected UK rate of growth (0.7 per cent per annum).

At local area level the projected annual average rate of growth ranges from 1.5 per cent in Luton & Bedfordshire to 2.3 per cent in Essex and Cambridgeshire and Hertfordshire. However, Norfolk and Suffolk record the largest shares of total employment in this SOC major group.

Females are expected to account for virtually all of the extra jobs.

7. *Sales & customer service occupations*

The East of England is projected to have 30 thousand extra jobs in this SOC major group by 2014. This represents a 14 per cent increase over the period 2004 and 2014: a slower growth rate than in England and the UK (around 15 per cent).

Employment in sales occupations is expected to increase by about 18 thousand, with customer service occupations accounting for the remainder.

Within the region Hertfordshire displays the fastest annual average growth rate (1.8 per cent) and Essex the slowest (0.7 per cent per annum).

Males and females are expected to share evenly in the projected employment gains.

8. *Machine & transport operatives*

A loss of almost 10 thousand jobs is expected for machine & transport operatives between 2004 and 2014. This represents a 0.5 per cent per annum loss over the period, which is akin to the loss expected for the UK.

A projected loss of about 28 thousand jobs for process machine operatives is offset by a gain of about 18 thousand drivers & operatives.

Within the region, Suffolk and Norfolk local LSC areas display the largest shares of such employment at 7.7 and 7.3 per cent respectively. Only Cambridgeshire and Suffolk display greater projected rates of decrease than the national average (0.5 per cent per annum).

Employment for males is projected to increase slightly, while employment for females is projected to decline by nearly 15 thousand.

9. *Elementary ocupations*

The highest projected losses for any occupation in the East of England are found here, with a loss of 55 thousand jobs expected between 2004 and 2014. This represents a rate of loss of 1.9 per cent per annum between 2004 and 2014, which is slower than in the UK (2.2 per cent per annum).

Nearly 38 thousand jobs are expected to be lost in elementary trades occupations, with elementary service occupations expected to lose over 15 thousand jobs.

At local LSC area level the share of total employment accounted for by elementary occupations ranges from 8.5 per cent in Luton & Bedfordshire and Hertfordshire, to 9.6 per cent in Suffolk.

Females are expected to bear the brunt of projected employment decline. They are projected to lose 30 thousand jobs between 2004 and 2014.

4.6 Projections of Replacement Demands

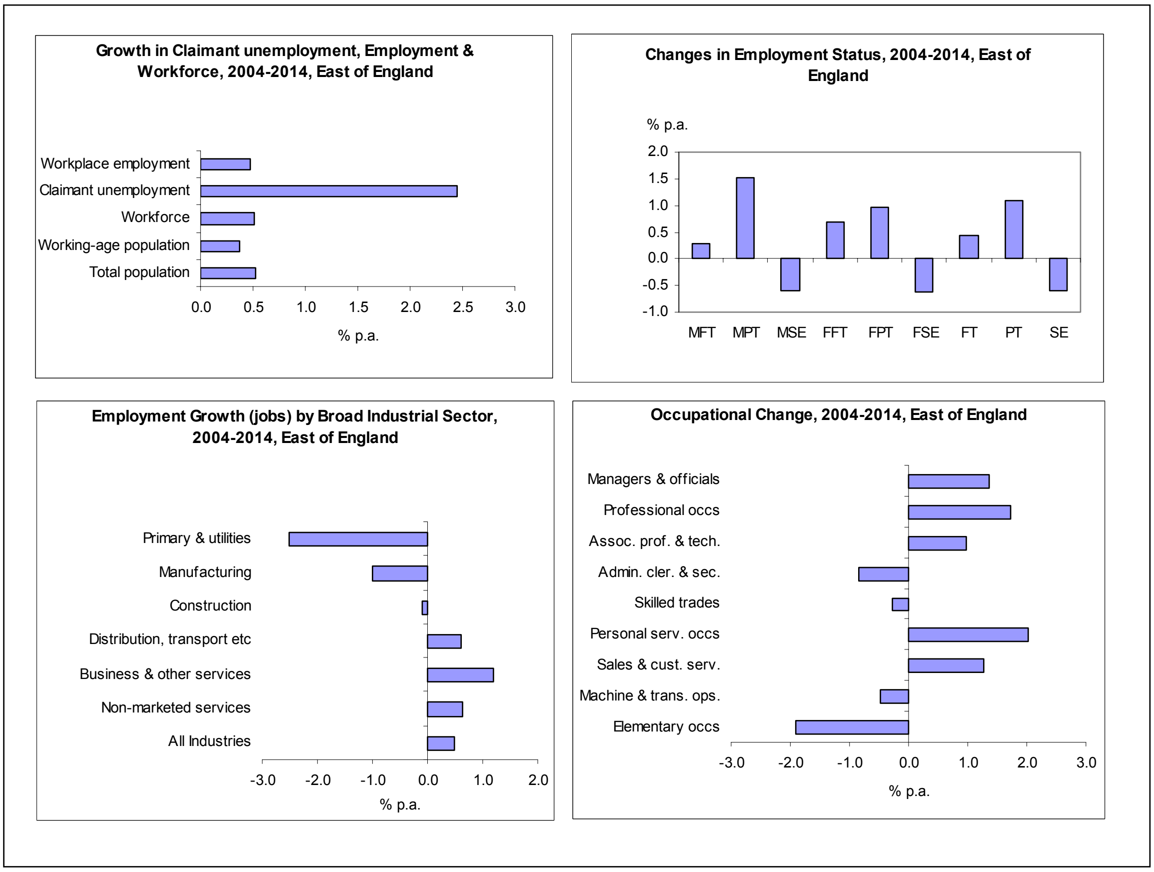
The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Regardless of whether expansion demand projections suggest an increase or decrease in employment levels, total requirements are positive for all SOC major groups. Focussing on all occupations, expansion demands are projected to total 135 thousand additional jobs. In all regions, the proportion of replacement demands between 2004 and 2014 are expected be far greater than the expansion demands, and the East of England is no exception, with almost a million replacements needed. Thus, the overall requirement exceeds 1.1 million.

In the East of England the top three SOC major groups with the largest expansion demands, have even greater replacement demands. The highest of all is for managers & senior officials, with a replacement demand of over 160 thousand jobs. This results in an overall requirement for an additional 230 thousand jobs.

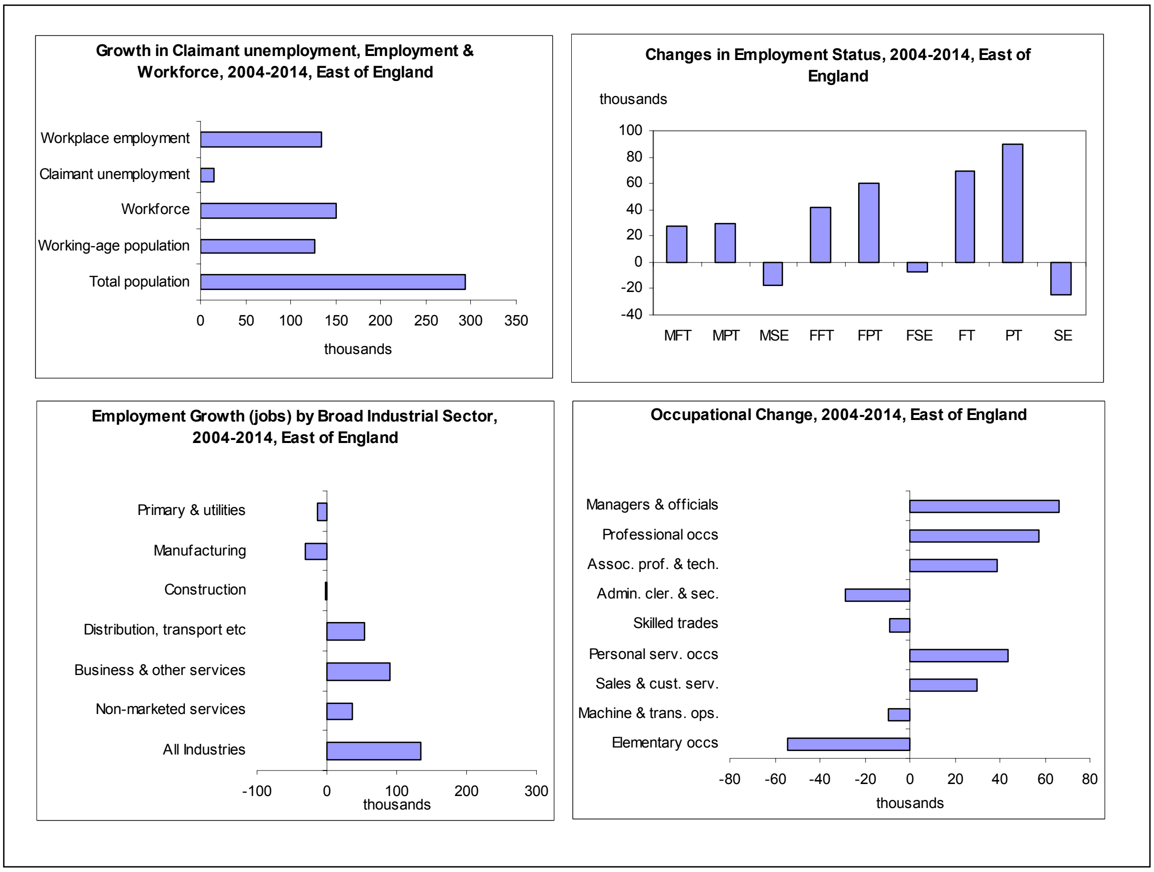
Despite a projected structural reduction in employment levels in four SOC major groups (namely administrative, clerical & secretarial occupations, skilled trades occupations, machine & transport operatives and elementary occupations) all have positive total requirement levels.

Figure 4.2: Key Changes in the East of England, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 4.3: Key Changes in the East of England, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 4.2: Sectoral Change in the East of England

	East of England											England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	81	60	44	32	3.7	2.6	1.6	1.1	-11	-25.8	-2.9	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	3	5	3	3	0.1	0.2	0.1	0.1	0	-11.2	-1.2	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	16	18	11	9	0.7	0.8	0.4	0.3	-1	-11.8	-1.3	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*100*	*83*	*57*	*44*	*4.5*	*3.5*	*2.1*	*1.5*	*-13*	*-22.5*	*-2.5*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	55	46	41	37	2.5	2.0	1.5	1.3	-4	-10.7	-1.1	-11.5	-1.2	-10.0	-1.1
4. Engineering	145	96	74	70	6.5	4.1	2.7	2.4	-4	-5.0	-0.5	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	288	229	211	188	13.0	9.7	7.7	6.5	-23	-11.0	-1.2	-11.3	-1.2	-11.3	-1.2
Manufacturing	*489*	*371*	*326*	*295*	*22.0*	*15.8*	*11.9*	*10.2*	*-31*	*-9.6*	*-1.0*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	193	178	235	232	8.7	7.6	8.5	8.0	-2	-1.1	-0.1	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	386	428	507	541	17.4	18.2	18.4	18.7	34	6.6	0.6	7.0	0.7	6.7	0.6
9. Hotels & restaurants	130	131	171	185	5.9	5.5	6.2	6.4	14	8.5	0.8	6.2	0.6	5.7	0.6
10. Transport & comm.	136	146	168	173	6.2	6.2	6.1	6.0	5	3.0	0.3	2.5	0.3	2.7	0.3
Distribution transport etc.	*652*	*704*	*846*	*899*	*29.4*	*29.9*	*30.7*	*31.2*	*53*	*6.3*	*0.6*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	66	84	90	94	3.0	3.6	3.3	3.2	3	3.7	0.4	3.4	0.3	2.8	0.3
12. Other business activities	189	306	447	520	8.5	13.0	16.2	18.0	73	16.3	1.5	15.5	1.5	15.7	1.5
16. Other services	100	113	174	188	4.5	4.8	6.3	6.5	14	8.1	0.8	8.6	0.8	9.3	0.9
Business & other services	*354*	*504*	*711*	*801*	*16.0*	*21.4*	*25.8*	*27.8*	*90*	*12.7*	*1.2*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	131	101	116	112	5.9	4.3	4.2	3.9	-4	-3.4	-0.3	-2.5	-0.3	-2.3	-0.2
14. Education	134	191	201	212	6.1	8.1	7.3	7.3	11	5.2	0.5	5.7	0.6	5.7	0.6
15. Health & social work	163	221	260	291	7.3	9.4	9.5	10.1	31	11.9	1.1	10.2	1.0	9.7	0.9
Non-marketed services	*428*	*514*	*577*	*614*	*19.3*	*21.8*	*21.0*	*21.3*	*37*	*6.5*	*0.6*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	2217	2354	2751	2885	100.0	100.0	100.0	100.0	134	4.9	0.5	4.6	0.5	4.3	0.4

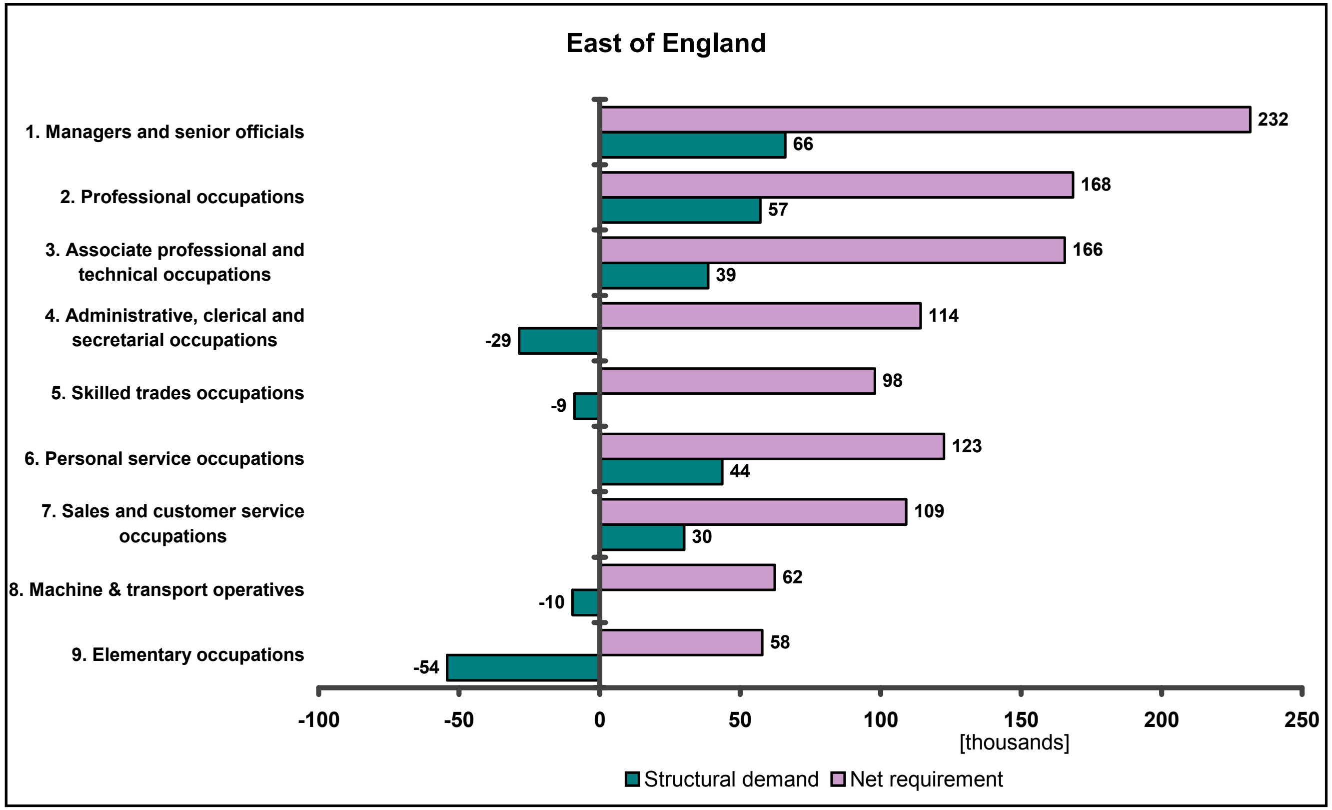
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 4.3: Occupational Change in the East of England

	East of England											England		UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
Occupational sub-major group	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
Corporate managers	198	246	351	423	8.9	10.4	12.8	14.7	72	20.5	1.9	20.2	1.9	19.9	1.8
Managers / proprietors	95	94	106	100	4.3	4.0	3.9	3.5	-6	-5.4	-0.6	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	61	74	102	119	2.8	3.1	3.7	4.1	17	17.0	1.6	18.9	1.7	18.3	1.7
Health professionals	11	15	23	32	0.5	0.6	0.8	1.1	8	36.6	3.2	29.8	2.6	29.4	2.6
Teaching & res. Profs.	76	102	112	135	3.4	4.4	4.1	4.7	22	19.8	1.8	19.9	1.8	21.6	2.0
Business professionals	43	53	70	79	1.9	2.2	2.5	2.7	9	13.1	1.2	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	40	45	57	63	1.8	1.9	2.1	2.2	6	9.9	0.9	12.2	1.2	12.4	1.2
Health assoc. profs.	56	68	81	83	2.5	2.9	3.0	2.9	2	2.2	0.2	7.7	0.7	7.8	0.8
Protect. serv. occs	15	20	34	36	0.7	0.9	1.2	1.2	2	5.2	0.5	0.8	0.1	0.1	0.0
Culture, med. & sports	23	35	62	78	1.0	1.5	2.2	2.7	17	27.3	2.4	24.5	2.2	23.5	2.1
Business assoc. profs.	89	110	146	158	4.0	4.7	5.3	5.5	13	8.7	0.8	10.0	1.0	9.2	0.9
Admin & clerical	229	238	256	249	10.3	10.1	9.3	8.6	-7	-2.9	-0.3	-4.2	-0.4	-3.1	-0.3
Secretarial and related	113	114	95	74	5.1	4.8	3.5	2.6	-21	-22.3	-2.5	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	34	30	32	38	1.5	1.3	1.2	1.3	6	19.5	1.8	17.3	1.6	15.5	1.5
Skilled metal & electrical	160	135	116	87	7.2	5.7	4.2	3.0	-29	-25.1	-2.9	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	109	97	116	137	4.9	4.1	4.2	4.8	22	18.6	1.7	20.2	1.9	19.4	1.8
Other skilled trades	64	62	59	51	2.9	2.6	2.1	1.8	-8	-12.8	-1.4	-14.7	-1.6	-14.6	-1.6
Caring personal service	46	83	145	184	2.1	3.5	5.3	6.4	39	26.7	2.4	23.8	2.2	22.8	2.1
Leisure occupations	39	44	51	56	1.8	1.9	1.9	1.9	5	9.7	0.9	7.3	0.7	6.7	0.7
Sales occupations	121	149	184	202	5.5	6.3	6.7	7.0	18	9.8	0.9	13.0	1.2	12.0	1.1
Customer service occs.	12	19	39	51	0.5	0.8	1.4	1.8	12	31.1	2.7	31.3	2.8	32.2	2.8
Process machine ops.	155	127	107	79	7.0	5.4	3.9	2.7	-28	-26.2	-3.0	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	88	85	98	116	4.0	3.6	3.6	4.0	18	18.8	1.7	18.5	1.7	17.2	1.6
Elementary: trades	147	117	98	60	6.6	5.0	3.6	2.1	-38	-39.1	-4.8	-36.6	-4.4	-35.5	-4.3
Elementary: service	194	194	210	194	8.8	8.2	7.6	6.7	-16	-7.6	-0.8	-12.2	-1.3	-12.9	-1.4
All occupations	2217	2354	2751	2885	100.0	100.0	100.0	100.0	134	4.9	0.5	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 4.4: Replacement Demands in the East of England



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

5. SOUTH WEST

5.1 Overview

The South West region stretches from Cornwall and the Isles of Scilly in the west to Wiltshire, Swindon and Gloucestershire in the east and north. It also encompasses Devon, Somerset, Dorset, Poole, Bournemouth, Bristol, Bath and North East Somerset, North Somerset and South Gloucestershire.

The population and labour force of the South West is projected to increase at a faster rate than nationally over the period to 2014. The projected rate of employment growth is akin to UK average, but is slower than in other regions of southern England.

Projected employment losses are confined to the primary sector and utilities and to manufacturing. In the former sector the expected rate of job loss is slower the UK average, while in the latter the rate of decrease is faster compared with that projected across the UK as a whole. The South West is one of only three regions to display a positive increase in construction. Increases in employment in business & other services are projected to be faster than the UK average, while employment in distribution, transport & communications and in non-marketed services is projected to increase at a rate akin to the UK average.

At the level of SOC major groups, the largest increase in occupational employment between 2004 and 2014 is projected for professional occupations. Other employment gains are projected for personal service occupations, associate professional & technical occupations, sales & customer service occupations, and managers & senior officials. Employment in skilled trades is expected to remain stable. Elementary occupations and Administrative, clerical & secretarial occupations record the largest projected employment losses in the South West.

By 2004 an additional 25 thousand male full-time jobs are projected to be created. However, the biggest increases are expected to come from part time employment, which is projected to add another 37 thousand jobs. The South West displays a projected gain of 15 thousand female full-time employees (a rate of increase of 0.3 per cent per annum). Female part-time employment is projected to increase by 0.8 per cent per annum, which is faster than the national average, resulting in an additional 50 thousand jobs.

5.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 5.1 provides a general overview, while Figure 5.1 presents a graphical summary of the supply side. Figures 5.2 and 5.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population

The total population in the South West is projected to increase by about 400 thousand between 2004 and 2014, to reach just under 5½ million. At 0.8per cent per annum, the rate of growth expected is greater than projected for the UK as a whole (0.4 per cent per annum).

Population 16+

The South West is expected to see its 16+ population increase by 5.5 per cent over 2004-09 and 4.7 per cent over 2009-14, slightly stronger than the increase over 1999-2004.

Working-age Population
The working age population is projected to increase by just under 275 thousand between 2004 and 2014.

Workforce
Over the same period, the workforce is projected to increase by just over 110 thousand, to reach 2.7 million. This average growth rate of 0.4 per cent per annum is just below the UK average.

Labour force
The labour force is expected to increase by 7.2 per cent over 2004-14, with a 7.7 per cent increase among women and 6.7 per cent increase among men. These rates are stronger than those for the UK, by roughly 2 pp. The activity rate is forecast to decline further over the forecast period and in 2014 will be more than 1 pp lower than the UK rate.

ILO unemployment
Unemployment in the region fell considerably between 1999 and 2004. Unemployment is expected to increase slightly over the period 2004-14 with unemployment among men rising faster than unemployment among women.

Claimant Unemployment
Claimant unemployment is projected to increase by around 10 thousand between 2004 and 2014, to just over 50 thousand in 2014. Claimant unemployment is projected to increase at a slightly higher rate than for the UK as a whole.

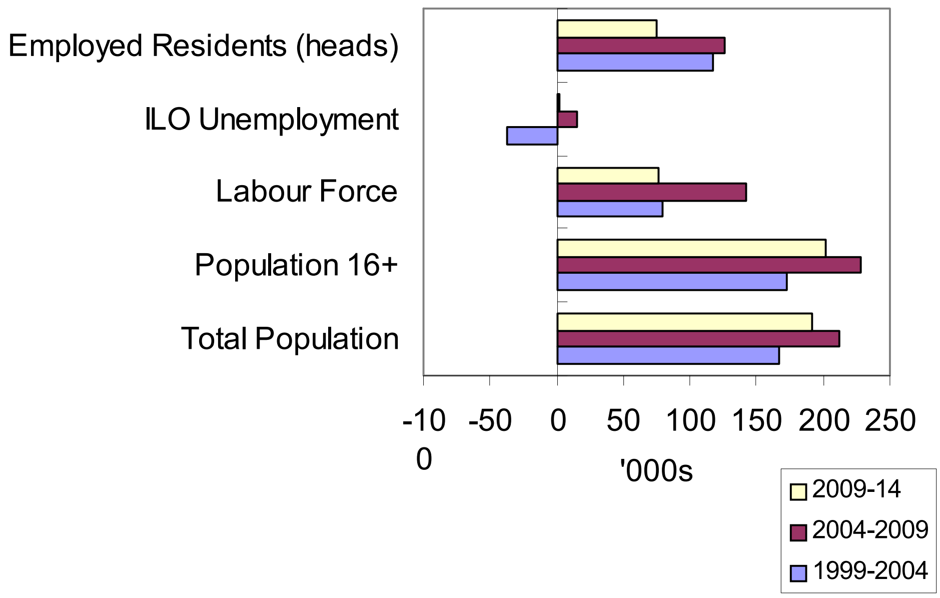
Employed Residents
The number of employed residents in the South West is expected to grow by 1.8 per cent over 2004-09, weaker than the 2.3 per cent expected for the UK and than the 5 per cent growth which was achieved over 1999-2004. This will increase slightly to 2.3 per cent between 2009 and 2014.

Workplace Employment
Total workplace employment in the South West is set to increase by 100 thousand to reach 2.6 million in 2014. The projected growth rate between 2004 and 2014, at 0.4 per cent per annum, is similar to the UK average, but below the average for England, and is exceeded by the rates of growth projected for other regions of southern England.

Within the South West, the West of England LSC area displays the highest projected growth rate for the period from 2004 to 2014, at 0.5 per cent per annum. However, this is considerably slower than the 1.5 per cent growth rate experienced between 1994 and 2004. The remaining local LSC areas all display projected employment growth rates below the England average. Gloucestershire is expected to see the slowest employment growth rate in the region at 0.2 per cent per annum. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is “double jobbing” (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In the South West the labour market residual is around 100 thousand. This mainly reflects double jobbing.

Figure 5.1: Changes in Population and the Labour Force in the South West



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 5.1: Population and Labour Force in the South West [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	2,372	2,462	2,574	2,674	3.8	4.6	3.9
Population 16+	1,890	1,983	2,104	2,209	4.9	6.1	5.0
Labour Force	1,311	1,336	1,395	1,431	1.9	4.4	2.5
Activity Rate	69.4	67.4	66.3	64.7	-2.0	-1.1	-1.6
ILO Unemployment	70	45	54	55	-35.7	19.6	2.6
ILO Unemployment rate (%)	5.3	3.4	3.9	3.9	-2.0	0.5	0.0
Employed Residents (heads)	1,246	1,294	1,342	1,375	3.9	3.7	2.5
Labour Market Residual (2)	51	94	69	68			
Female	0	0	0	0			
Total Population	2,509	2,587	2,686	2,778	3.1	3.8	3.4
Population 16+	2,052	2,132	2,238	2,335	3.9	5.0	4.3
Labour Force	1,116	1,171	1,253	1,295	4.9	7.1	3.3
Activity Rate	54.4	54.9	56.0	55.5	0.5	1.1	-0.5
ILO Unemployment	46	34	41	42	-26.1	19.7	2.5
ILO Unemployment rate (%)	4.1	2.9	3.2	3.2	-1.2	0.3	0.0
Employed Residents (heads)	1,065	1,134	1,213	1,253	6.5	6.9	3.4
Labour Market Residual (2)	58	72	13	-3			
Total							
Total Population	4,881	5,049	5,260	5,452	3.4	4.2	3.7
Population 16+	3,942	4,115	4,343	4,545	4.4	5.5	4.7
Working-age Population	2,901	3,021	3,143	3,295	4.2	4.0	4.8
Labour Force	2,427	2,507	2,649	2,726	3.3	5.7	2.9
Workforce	2,502	2,641	2,693	2,751	5.6	2.0	2.1
Activity Rate	61.6	60.9	61.0	60.0	-0.7	0.1	-1.0
ILO Unemployment	116	79	95	97	-31.9	19.6	2.5
ILO Unemployment rate (%)	4.8	3.2	3.6	3.6	-1.6	0.4	0.0
Claimant Unemployment	75	42	50	51	-44.5	19.6	2.6
Claimant Unemployment rate	2.6	1.4	1.6	1.6	-1.2	0.2	0.0
Employed Residents (heads)	2,311	2,428	2,471	2,528	5.1	1.8	2.3
Workplace employment (jobs)	2,361	2,370	2,386	2,441	0.4	0.7	2.3
Labour Market Residual[2]	109	166	82	65			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

5.3 Industrial Employment Structure

Overview of broad sectors

At the broad sectoral level, the picture for the South West is one of employment losses in the primary sector & utilities and in manufacturing, and employment gains in construction, distribution, transport, etc, business & other services and non-marketed services. A decline of 40 thousand jobs is expected in manufacturing, and over 10 thousand jobs in the primary sector and utilities. The business & other services broad sector is projected to see the largest employment gains, with an expected increase of 65 thousand jobs, but considerable increases are also projected for distribution, transport, etc, and non-marketed services, with around 40 thousand and 45 thousand extra jobs expected respectively.

Primary sector & utilities

Within the primary sector & utilities employment over 10 thousand jobs are expected to be lost by 2014. Agriculture, forestry and fishing dominates both current employment and projected employment losses.

At local LSC area level, the West of England is expected to experience the fastest rate of employment decline at 2.3 per cent per annum. Wiltshire is projected to experience the slowest rate of employment decline at 1.2 per cent per annum.

Approximately three-quarters of expected job losses are accounted for by males. With a projected rate of loss of 1.6 per cent per annum, the rate of decrease is much slower than the national average.

Manufacturing

In the South West a loss of 40 thousand jobs is expected in the period to 2004, as employment is projected to decline at a rate above the national average. In food, drink and tobacco a loss of 5 thousand jobs is expected, representing a rate of decrease in excess of the national average. The projected losses of almost 10 thousand jobs in engineering and over 25 thousand in other manufacturing also represent rates of employment decline in excess of the national average.

At local LSC area level the percentage of total employment accounted for by manufacturing ranges from 7.8 per cent in the West of England LSC area to 14.8 per cent in Shropshire. Wiltshire is projected to see the slowest rate of job loss (0.8 per cent per annum) from 2004 to 2014.

Males are expected to account for about twice the number of job losses as females.

Construction

Employment in construction in the South West is projected to increase at 0.2 per cent per annum, creating an additional 3 thousand jobs.

All local LSC areas in the South West are expected to share in this employment increase.

Males are expected to account for all of these additional jobs.

Distribution, transport etc.

The annual average rate of employment growth in distribution, transport, etc in the South West, at 0.5 per cent per annum, is akin to the UK average. Within this broad sector retail distribution is projected to see employment growth at rates in excess of the national average, with expected job gains of nearly 35 thousand. A modest increase in employment in hotels and restaurants of less than 5 thousand is expected, while employment levels in transport storage and communications is expected to remain stable.

At local LSC area level the projected rates of annual average employment growth range from 0.4 per cent in the West of England to 0.7 per cent in Somerset and Shropshire.

Both males and females are expected to share in this growth, accounting for 22 thousand and 17 thousand jobs, respectively.

Business & other services

In business and other services employment is projected to increase at 1.1 per cent per annum which is slower than the projected UK average. This is a function of a relatively slow rate of growth (1.2 per cent per annum) in other business activities, representing a gain of almost 45 thousand jobs. Growth rates in banking and insurance and in other services exceed the UK average, with an additional 5 thousand and 17 thousand extra jobs expected, respectively.

At local LSC area level, Bournemouth, Dorset and Poole display the slowest projected rate of employment increase at just 0.8 per cent per annum. In all LSC areas in the South West the rate of employment growth is similar to or slower than the England average.

Females account for about 20 thousand of the projected 65 thousand job increases.

Non-marketed services

Employment in non-marketed services is projected to expand by 45 thousand jobs between 2004 and 2014, representing an annual average growth rate of 0.7 per cent; this is slightly greater than the rate of growth projected across the UK as a whole. The employment increase is accounted for by health and social work (27 thousand) and education (18 thousand), while employment levels in public administration and defence are projected to decline marginally.

Within the South West projected annual average rates of employment increase range from 0.5 per cent in Gloucestershire to 0.9 per cent in Bournemouth, Dorset and Poole.

Both males and females are expected to have a near equal share of these additional jobs.

5.4 Change in Employment by Gender and Employment Status

Males

By 2004 an additional 25 thousand male full-time jobs are projected to be created. This represents a 0.3 per cent per annum increase, which is slower than the rate of increase projected for the UK.

The largest gains are expected to come from part-time employment, with an additional 37 thousand jobs projected between 2004 and 2014 (representing a growth rate of 1.7 per cent per annum).

At local LSC area level Bournemouth, Dorset & Poole are projected to see the fastest annual increase in male full-time employment (0.6 per cent). For male part-time employment, increases in excess of 2.0 per cent per annum are projected in Somerset and Wiltshire.

Females

The South West displays a projected gain of 15 thousand jobs for female full-time employees, representing an annual average rate of increase of 0.3 per cent, which is slower than the national average.

Female part-time employment is projected to increase by 0.8 per cent per annum, which is above the national average, resulting in an additional 50 thousand jobs.

Projected jobs losses affecting women in full time employment are displayed in Somerset, Bournemouth, Dorset & Poole and Wiltshire. All local LSC areas are expected to see an increase in the number of women in part-time employment, with the highest annual increase projected for Gloucestershire (at 1.5 per cent).

5.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such ‘structural demand’ provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by ‘replacement demand’.

At the level of SOC major groups, the largest increase in occupational employment between 2004 and 2014 is projected for professional occupations with an expected increase of 55 thousand jobs. The next largest increase is recorded by personal service occupations, with a projected increase of over 45 thousand. For associate professional and technical occupations and sales and customer service occupations increases of 27 thousand and 40 thousand respectively, are expected. An increase of nearly 40 thousand managers and senior officials is projected. Employment in skilled trades is expected to remain stable during this period.

Elementary occupations and administrative, clerical and technical occupations record the largest projected employment losses, of around 55 thousand and 35 thousand jobs respectively. Losses of around 13 thousand jobs for machine and transport operatives are expected.

1. Managers & senior officials

An additional 40 thousand jobs are projected for managers & senior officials by 2014. A projected gain of 50 thousand corporate managers (reflecting a rate of growth below the UK average) is offset by a loss of around 10 thousand jobs for managers and proprietors (representing a faster rate of job loss than the UK average) (see Table 5.2).

At the local LSC level both Somerset and the West of England display the highest projected annual growth rates (1.3 per cent), akin to the growth rate projected for England.

Females account for 28 thousand of the projected 40 thousand employment gains.

2. Professional occupations

An additional 55 thousand jobs are projected in professional occupations by 2014. At 1.7 per cent per annum, the projected rate of employment increase in the South West is slightly lower than that projected for the UK (1.8 per cent per annum). All occupational groups identified in Table 5.3 share in the projected employment gains, which range from 5 thousand extra jobs for health professionals and 6 thousand extra jobs for business professionals, to over 30 thousand extra jobs for teaching and research professionals. Only in this latter group is the projected rate of growth in excess of the UK average. 12 thousand extra jobs for science and technology professionals are expected.

Gloucestershire and Devon & Cornwall have a slower projected rate of employment increase than the England average. Bournemouth, Dorset & Poole has the fastest annual projected rates of increase at 2.0 per cent per annum.

Projected employment gains in professional occupations are expected to be shared fairly evenly between males and females.

3. Associate professional & technical occupations

About additional 27 thousand jobs are projected for this major group. Culture, media & sports and business associate professionals account for the largest employment gains, with a projected increase of 15 thousand jobs, followed by business associate professionals, where 10 thousand extra jobs are expected. 5 thousand extra jobs are expected for science & technology associate professionals. Health associate professionals are projected to remain unchanged, while 2 thousand jobs in protective service occupations are expected to be lost.

At 0.6 per cent per annum, the projected annual average growth rate in Wiltshire is the slowest of all the local LSC areas. However, no local LSC areas in the region have projected growth rates above the projected 1.1 per cent per annum expected for England.

The majority of employment gains are expected to benefit males.

4. Administrative, clerical & secretarial occupations

Administrative, clerical and secretarial occupations are expected to lose 35 thousand jobs between 2004 and 2014. Projected losses of 20 thousand and 15 thousand jobs are expected for administrative and clerical occupations and secretarial and related occupations, respectively.

Within the South West, Somerset is expected to have the fastest rate of employment decline (1.6 per cent per annum). The slowest rate of employment decline is expected to occur in Devon and Cornwall (1.1 per cent per annum).

Females account for virtually all of the projected job losses

5. Skilled trades occupations

Employment levels are projected to remain stable for this occupation between 2004 and 2014. At the sub-major level, easily the largest employment decline (30 thousand jobs) is expected for skilled metal and electrical trades. 8 thousand job losses are expected in other skilled trades, while skilled agricultural trades are expected to gain 8 thousand jobs. In skilled construction and building trades a gain of 30 thousand jobs is expected.

At local LSC area level, projected rates of employment change range from decline of 0.2 per cent per annum in Somerset and Gloucestershire, to employment gains of 0.1 per cent per annum in Devon & Cornwall, Wiltshire and Bournemouth, Dorset & Poole.

5 thousand male jobs are expected to be gained between 2004 and 2014, which is offset by the 5 thousand female jobs expected to be lost during the same period.

6. Personal services occupations

Employment in personal service occupations is projected to increase by 45 thousand. Caring personal service occupations are projected to account for nearly all of this projected increase (over 40 thousand jobs). Less than 5 thousand extra jobs are expected in leisure occupations.

Within the region, annual average rates of employment change are projected to vary from 1.6 per cent in Somerset and Gloucestershire to 2.3 per cent in Devon and Cornwall and 2.4 per cent in Wiltshire.

Females account for virtually all of these projected employment gains.

7. Sales & customer service occupations

Almost 40 thousand extra jobs are projected for sales and customer service occupations by 2014. Sales occupations are projected to account for 30 thousand of these additional jobs, which is an increase of 1.4 per cent per annum. 10 thousand jobs are projected for customer service occupations.

Within the region annual average growth rates for all local LSC areas are equal to or faster than the 1.5 per cent per annum projected for England. The fastest rates of employment growth are projected in Wiltshire at 2 per cent per annum.

Females are expected to account for over 20 thousand of the projected additional jobs, and males around 17 thousand.

8. Machine & transport operatives

A decrease of around 13 thousand jobs in this major group is expected over the period to 2014. At 0.7 per cent per annum, the projected rate of employment loss in the South West is faster than the UK average (0.5 per cent per annum). A projected loss of 27 thousand in process machine operatives is offset by a projected 15 thousand increase for drivers and other operatives.

At local LSC area level, projected rates of annual average decrease range from 0.4 per cent in Bournemouth, Dorset and Poole, to 0.9 per cent in Gloucestershire. For further details see Chapter 15.

Females account for the majority of the projected job losses, while employment levels for males are expected to remain stable.

9. Elementary occupations

In the South West employment in elementary occupations is expected to decline at 2.1 per cent per annum – a slightly slower rate than that projected across the UK as a whole (2.2 per cent). This overall decline comprises an expected loss of around 23 thousand jobs for elementary service occupations and of 30 thousand for elementary trades occupations.

20 thousand job losses are expected to be borne by males, with the remaining 35 thousand lost jobs expected to be accounted for by females.

5.6 Projections of Replacement Demands

The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

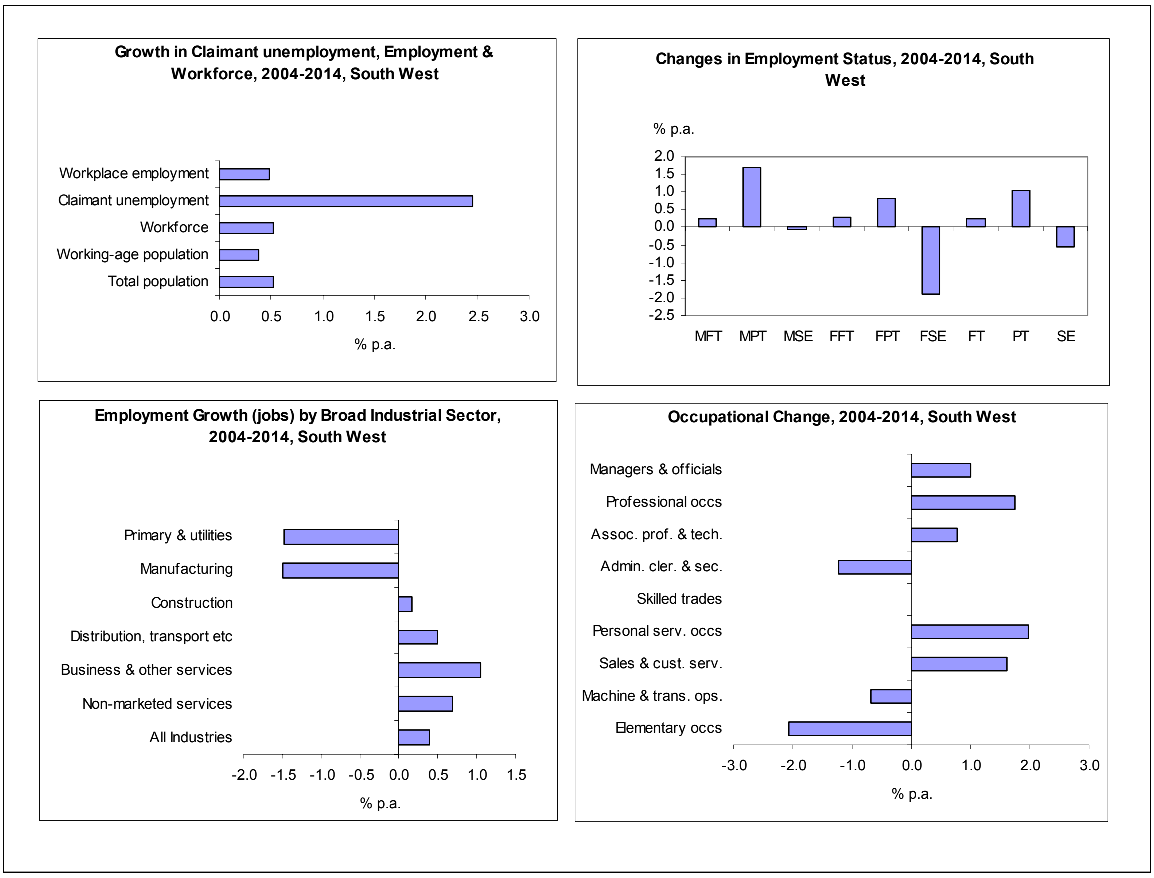
Total requirements are positive for all SOC major groups, regardless of whether expansion demand projections are for an increase or decrease in employment levels.

As outlined in the previous section, with an expected increase of over 40 thousand jobs, managers & officials display the largest projected expansion demand growth in the South West. Supplemented by an additional need for about 140 thousand people on the basis of estimated replacement demand, there is a total requirement for about 180 thousand people to fill jobs in such occupations by 2014.

Other positive expansion demands have been added to by even greater replacement demands, so much so that overall requirements of around between 120 and 160 thousand have been projected for each of the professional occupations, associate professional & technical occupations, personal service occupations, and sales & customer service occupations groups.

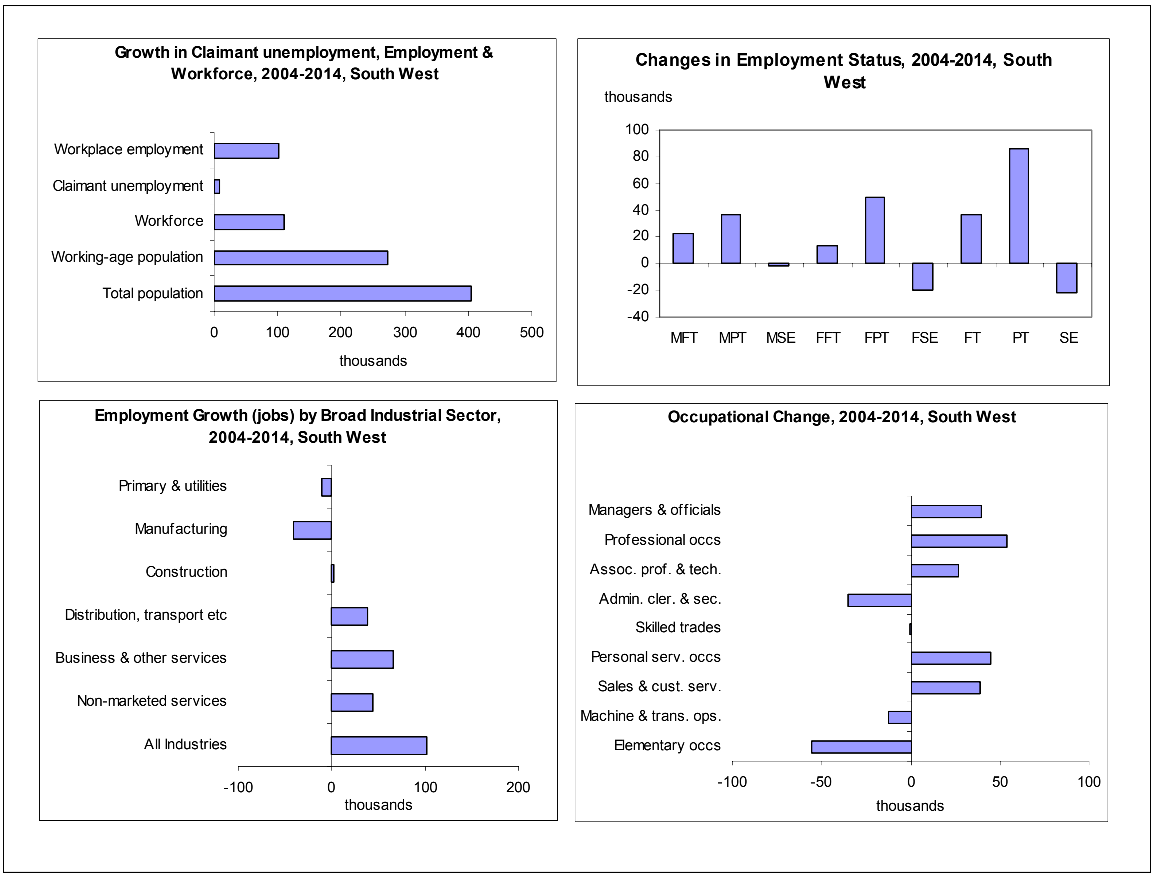
Three occupations are projected to see negative expansion demands. All of these have sufficiently high replacement demands to result in positive overall requirements. These are almost 90 thousand for administrative, clerical and secretarial occupations and over 50 thousand for both machine & transport operatives and elementary occupations. Skilled trades are expected to have an overall requirement of over 100 thousand.

Figure 5.2: Key Changes in the South West, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 5.3: Key Changes in the South West, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 5.2: Sectoral Change in the South West

	South West											England		UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	98	91	63	55	5.0	4.1	2.5	2.1	-8	-12.5	-1.3	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	8	6	5	4	0.4	0.3	0.2	0.2	-1	-16.3	-1.8	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	17	18	12	9	0.9	0.8	0.5	0.4	-2	-20.2	-2.2	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*123*	*115*	*80*	*69*	*6.3*	*5.2*	*3.1*	*2.6*	*-11*	*-13.9*	*-1.5*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	46	39	37	32	2.3	1.8	1.5	1.2	-5	-14.2	-1.5	-11.5	-1.2	-10.0	-1.1
4. Engineering	82	73	66	57	4.2	3.3	2.6	2.2	-9	-14.0	-1.5	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	241	202	183	158	12.3	9.1	7.2	6.0	-26	-14.0	-1.5	-11.3	-1.2	-11.3	-1.2
Manufacturing	*369*	*315*	*287*	*247*	*18.8*	*14.1*	*11.3*	*9.3*	*-40*	*-14.0*	*-1.5*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	156	148	177	180	7.9	6.6	7.0	6.8	3	1.7	0.2	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	354	388	452	487	18.0	17.4	17.7	18.4	35	7.9	0.8	7.0	0.7	6.7	0.6
9. Hotels & restaurants	124	159	203	207	6.3	7.1	8.0	7.8	4	2.0	0.2	6.2	0.6	5.7	0.6
10. Transport & comm.	101	101	122	121	5.1	4.5	4.8	4.6	0	-0.4	0.0	2.5	0.3	2.7	0.3
Distribution transport etc.	*579*	*649*	*777*	*816*	*29.5*	*29.1*	*30.5*	*30.8*	*39*	*5.0*	*0.5*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	65	94	92	97	3.3	4.2	3.6	3.7	5	5.2	0.5	3.4	0.3	2.8	0.3
12. Other business activities	171	250	355	399	8.7	11.2	14.0	15.1	44	12.4	1.2	15.5	1.5	15.7	1.5
16. Other services	98	114	151	168	5.0	5.1	5.9	6.3	17	11.3	1.1	8.6	0.8	9.3	0.9
Business & other services	*334*	*459*	*598*	*664*	*17.0*	*20.5*	*23.5*	*25.1*	*66*	*11.0*	*1.1*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	111	128	138	137	5.7	5.7	5.4	5.2	-1	-0.6	-0.1	-2.5	-0.3	-2.3	-0.2
14. Education	138	177	216	235	7.0	7.9	8.5	8.9	18	8.5	0.8	5.7	0.6	5.7	0.6
15. Health & social work	154	242	271	298	7.9	10.9	10.7	11.3	27	10.0	1.0	10.2	1.0	9.7	0.9
Non-marketed services	*404*	*547*	*626*	*670*	*20.6*	*24.5*	*24.6*	*25.3*	*45*	*7.1*	*0.7*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	1964	2233	2545	2646	100.0	100.0	100.0	100.0	101	4.0	0.4	4.6	0.5	4.3	0.4

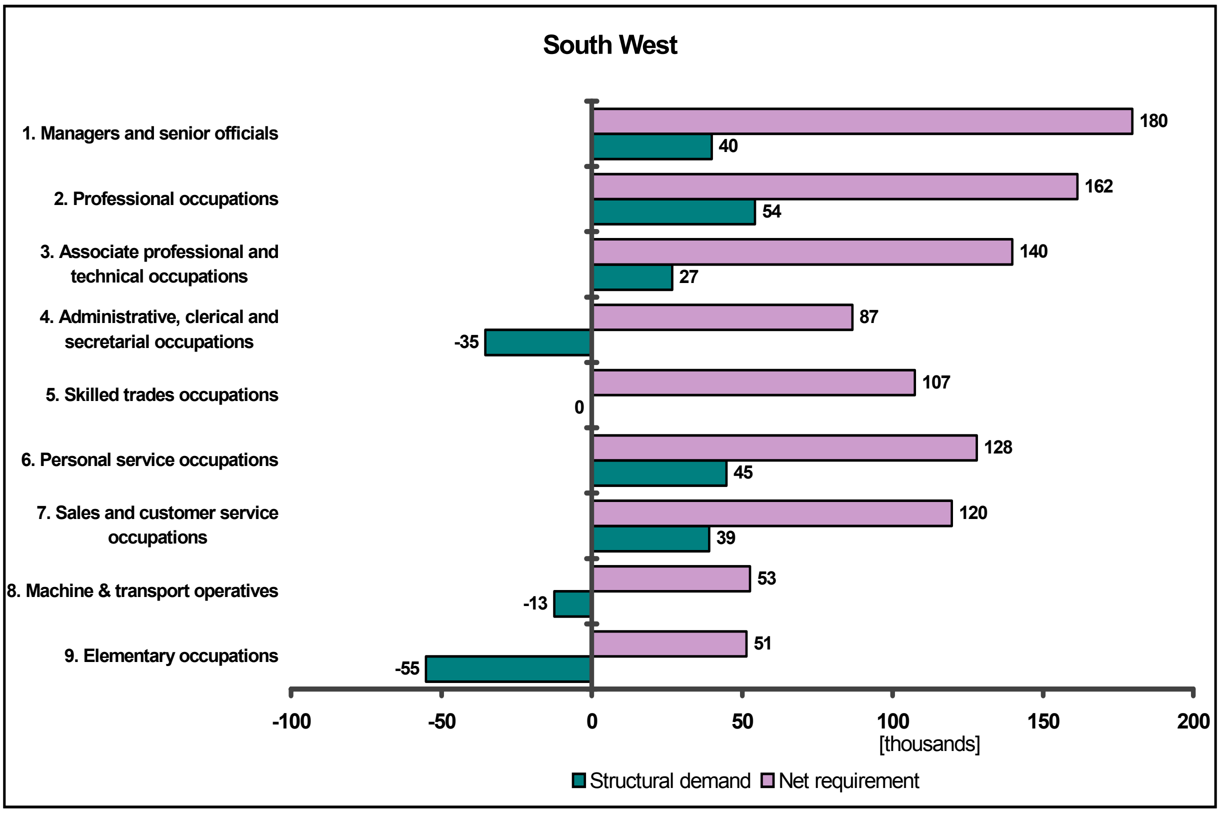
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 5.3: Occupational Change in the South West

Occupational sub-major group	South West 1984 000s	1994 000s	2004 000s	2014 000s	1984 % of total	1994 % of total	2004 % of total	2014 % of total	2004-2014 change 000s	% change	% per annum	England 2004-2014 % change	% per annum	UK 2004-2014 % change	% per annum
Corporate managers	155	207	284	335	7.9	9.3	11.2	12.6	51	17.9	1.7	20.2	1.9	19.9	1.8
Managers / proprietors	95	103	102	91	4.8	4.6	4.0	3.4	-11	-10.9	-1.1	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	47	57	78	90	2.4	2.6	3.1	3.4	12	15.0	1.4	18.9	1.7	18.3	1.7
Health professionals	12	16	19	24	0.6	0.7	0.8	0.9	5	23.8	2.2	29.8	2.6	29.4	2.6
Teaching & res. Profs.	73	99	133	164	3.7	4.4	5.2	6.2	32	23.8	2.2	19.9	1.8	21.6	2.0
Business professionals	34	45	57	64	1.7	2.0	2.3	2.4	6	10.9	1.0	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	32	37	48	53	1.6	1.7	1.9	2.0	5	9.4	0.9	12.2	1.2	12.4	1.2
Health assoc. profs.	56	77	86	86	2.9	3.5	3.4	3.3	0	0.1	0.0	7.7	0.7	7.8	0.8
Protect. serv. occs	14	17	23	21	0.7	0.8	0.9	0.8	-2	-8.5	-0.9	0.8	0.1	0.1	0.0
Culture, med. & sports	19	31	51	65	1.0	1.4	2.0	2.5	14	27.5	2.5	24.5	2.2	23.5	2.1
Business assoc. profs.	72	96	125	135	3.7	4.3	4.9	5.1	10	8.1	0.8	10.0	1.0	9.2	0.9
Admin & clerical	190	223	228	213	9.7	10.0	9.0	8.0	-15	-6.7	-0.7	-4.2	-0.4	-3.1	-0.3
Secretarial and related	91	99	74	54	4.6	4.4	2.9	2.0	-20	-27.1	-3.1	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	47	47	43	50	2.4	2.1	1.7	1.9	8	18.0	1.7	17.3	1.6	15.5	1.5
Skilled metal & electrical	141	123	108	79	7.2	5.5	4.2	3.0	-29	-26.9	-3.1	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	102	94	116	145	5.2	4.2	4.6	5.5	29	24.8	2.2	20.2	1.9	19.4	1.8
Other skilled trades	58	61	57	49	2.9	2.7	2.2	1.9	-8	-13.4	-1.4	-14.7	-1.6	-14.6	-1.6
Caring personal service	45	93	160	202	2.3	4.2	6.3	7.6	42	26.0	2.3	23.8	2.2	22.8	2.1
Leisure occupations	39	44	46	49	2.0	2.0	1.8	1.9	3	6.8	0.7	7.3	0.7	6.7	0.7
Sales occupations	116	146	190	219	5.9	6.6	7.5	8.3	29	15.0	1.4	13.0	1.2	12.0	1.1
Customer service occs.	10	17	35	46	0.5	0.8	1.4	1.7	10	29.5	2.6	31.3	2.8	32.2	2.8
Process machine ops.	134	120	102	75	6.8	5.4	4.0	2.8	-27	-26.8	-3.1	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	74	73	85	100	3.7	3.3	3.3	3.8	15	17.5	1.6	18.5	1.7	17.2	1.6
Elementary: trades	126	109	92	60	6.4	4.9	3.6	2.3	-32	-35.0	-4.2	-36.6	-4.4	-35.5	-4.3
Elementary: service	186	197	201	178	9.5	8.8	7.9	6.7	-23	-11.4	-1.2	-12.2	-1.3	-12.9	-1.4
All occupations	1964	2233	2545	2646	100.0	100.0	100.0	100.0	101	4.0	0.4	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 5.4: Replacement Demands in the South West



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

6. WEST MIDLANDS

6.1 Overview

The West Midlands contains both major urban areas and sparsely populated rural areas. There are six local LSC areas in the region: Birmingham & Solihull, Coventry & Warwickshire, Herefordshire & Worcestershire, the Black Country, Shropshire and Staffordshire.

Reflecting its central position within the UK, the West Midlands lies at the crossroads of national transport networks and has strong functional links with the East Midlands, the North West, the South East, the South West and Wales. Birmingham lies at the centre of the West Midlands region and continues to develop as a major regional centre with an international profile. Other major urban areas include the Black Country (in the western part of the West Midlands conurbation) and Solihull (in the eastern part of the conurbation), Coventry and the towns of the north Staffordshire 'Potteries'. The most sparsely populated rural areas lie in the west of the region.

The West Midlands lies in the UK's traditional manufacturing heartland. The structure of manufacturing industry in the region poses a challenge, since it contains a relatively high proportion of traditional, low value-added sectors and a relatively small proportion of high value-added sectors.

Both the population and the labour force in the West Midlands are projected to at similar rates to the UK average over the period to 2014. Employment is expected to grow at a slower rate than across England and the UK as a whole.

It is projected that 90 thousand additional jobs will be created between 2004 and 2014. In all broad service sectors the West Midlands is characterised by rates of change similar to the UK average.

The national pattern of projected employment increase for full-time male employees and significantly larger increases for male part-time employees is especially pronounced in the West Midlands. Gains are expected for female full-time and part-time employees, but self-employment is projected to contract at a faster than average rate.

The West Midlands is characterised by smaller shares of total employment in high level non-manual occupations than the UK average. Projected rates of employment change are on the whole similar to, or slower than, the UK average for these SOC Major Groups. Nevertheless projected job gains in such occupations are substantial in absolute terms. Expected growth rates for associate professional & technical occupations, administrative, clerical & secretarial occupations, and personal service occupations exceed the UK average. Projected rates of employment decline are higher for skilled trade occupations, machine & transport operatives, and elementary occupations than across the UK as a whole.

6.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 6.1 provides a general overview, while Figure 6.1 presents a graphical summary of the supply side. Figures 6.2 and 6.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population

The total population in the West Midlands is projected to increase by around 220 thousand, to exceed 5.5 million by 2014. This represents a similar rate of growth than both the UK and England average, which is 0.4 per cent per annum (see Figure 6.1).

Population 16+
The 16+ population in the West Midlands is expected to increase by 270 thousand between 2004 and 2014. This represents an increase of 6.3 per cent and is in line with the UK rate.

Working-age Population
The population of working age is projected to grow by a similar order of magnitude (just under 200 thousand)

Workforce
The workforce is projected to reach 2.8 million by 2014, which is a 0.4 per cent per annum increase from 2004-2014. This represents a slightly slower rate of growth than the UK average of 0.5 per cent per annum.

Labour force
After falling over the period 1999-2004, the labour force is expected to grow by 2.9 per cent over 2004-09 and 1.5 per cent over 2009-14.

ILO unemployment
After falling over the period1999-2004, ILO unemployment is expected to increase by around 50 thousand over the period 2004-14, to exceed the level it was in 1999 (169 thousand). This increase is faster than for the UK as a whole.

Claimant Unemployment
Having fallen by 155 thousand between 1994 and 2004, claimant unemployment in the West Midlands is projected to increase by around 30 thousand to approach 120 thousand by 2014. This is a per cent per annum increase between 2004-2014 of 3.1 per cent per annum, which exceeds the 2.0 per cent per annum projected for the UK, and indeed all other English counties and countries within the United Kingdom except Wales.

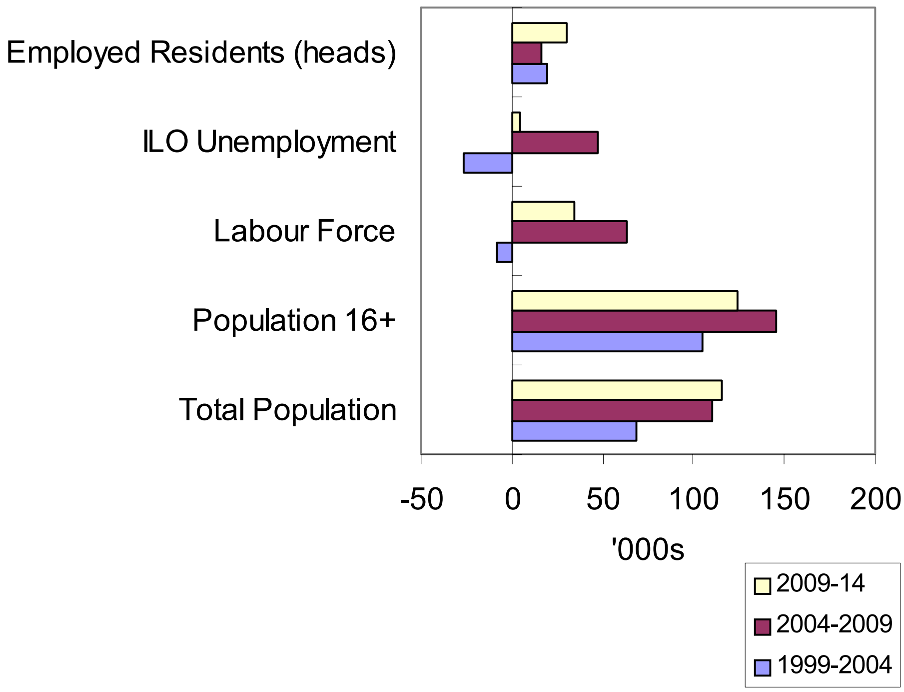
Employed Residents
Employment growth in the West Midlands over 1999-2004, in terms of the number of employed residents, was considerably weaker than the UK average. This pattern is expected to continue over the period 2004-14. Employment in the West Midlands is expected to grow by 0.6 per cent over 2004-09 and 1.2 per cent over 2009-14. Employment growth among men in the West Midlands will be 0.8 per cent over 2004-14, much less than the rate for the UK (3.3 per cent).

Workplace Employment
Workplace employment is expected to reach almost 2.7 million by 2014, which represents a 0.3 per cent per annum increase over the previous decade. This projected growth rate is lower than the UK average (0.4 per cent per annum) and average for England (0.5 per cent per annum). This is the measure used in most of the remaining detailed tables and charts.

Within the West Midlands, Coventry & Warwickshire displays the fastest projected employment growth rates for the period from 2004 and 2014 at 0.5 per cent per annum. The slowest rates of increase (0.1 and 0.3 per cent) are projected for the Black Country and Birmingham & Solihull respectively.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is “double jobbing” (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In the West Midlands the labour market residual is around 200 thousand. This mainly reflects double jobbing.

Figure 6.1: Changes in Population and the Labour Force in the West Midlands



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 6.1: Population and Labour Force [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	2,585	2,622	2,674	2,726	1.4	2.0	2.0
Population 16+	2,016	2,073	2,142	2,199	2.8	3.3	2.7
Labour Force	1,422	1,407	1,433	1,445	-1.1	1.9	0.8
Activity Rate	70.5	67.9	66.9	65.7	-2.6	-1.0	-1.2
ILO Unemployment	103	83	111	113	-19.4	33.1	2.3
ILO Unemployment rate (%)	7.2	5.9	7.7	7.8	-1.3	1.8	0.1
Employed Residents (heads)	1,323	1,322	1,323	1,332	-0.1	0.1	0.7
Labour Market Residual (2)	55	91	99	103			
Female							
Total Population	2,687	2,719	2,778	2,841	1.2	2.2	2.3
Population 16+	2,146	2,195	2,270	2,338	2.3	3.4	3.0
Labour Force	1,159	1,166	1,202	1,226	0.6	3.1	1.9
Activity Rate	54.0	53.1	53.0	52.4	-0.9	-0.1	-0.6
ILO Unemployment	66	59	79	80	-10.6	33.1	2.3
ILO Unemployment rate (%)	5.7	5.1	6.5	6.6	-0.6	1.5	0.0
Employed Residents (heads)	1,089	1,109	1,124	1,145	1.8	1.3	1.9
Labour Market Residual (2)	96	85	103	114			
Total							
Total Population	5,272	5,341	5,451	5,567	1.3	2.1	2.1
Population 16+	4,162	4,267	4,412	4,537	2.5	3.4	2.8
Working-age Population	3,195	3,259	3,334	3,448	2.0	2.3	3.4
Labour Force	2,581	2,573	2,636	2,671	-0.3	2.4	1.3
Workforce	2,692	2,705	2,778	2,824	0.5	2.7	1.7
Activity Rate	62.0	60.3	59.7	58.9	-1.7	-0.6	-0.8
ILO Unemployment	169	142	189	193	-16.0	33.1	2.3
ILO Unemployment rate (%)	6.5	5.5	7.2	7.2	-1.0	1.7	0.1
Claimant Unemployment	120	88	118	120	-26.2	33.1	2.3
Claimant Unemployment rate	3.7	2.7	3.5	3.5	-1.0	0.8	0.0
Employed Residents (heads)	2,412	2,431	2,447	2,477	0.8	0.6	1.2
Workplace employment (jobs)	2,582	2,592	2,631	2,680	0.4	1.5	1.9
Labour Market Residual[2]	151	176	202	217			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

6.3 Industrial Employment Structure

Overview of broad sectors

As Figure 6.2 shows, at the broad sectoral level, the picture for the West Midlands is one of employment losses in the primary sector & utilities, manufacturing and construction. Employment gains are projected for distribution, transport etc., business & other services and non-marketed services. Overall, 90 thousand additional jobs are projected over the period from 2004 to 2014.

Primary sector & utilities

12 thousand jobs are expected to be lost in this sector, representing a decline of over a fifth between 2004 and 2014. This exceeds the rate of loss for both England and the UK (just under 16 per cent).

At the local LSC level rates of employment decline vary from 1.9 per cent per annum in Birmingham & Solihull to 2.8 per cent per annum in Herefordshire & Worcestershire.

The majority of projected job losses are expected to be borne by males.

Manufacturing

Manufacturing accounts for the greatest projected employment loss of any broad sector between 2004 and 2014. The expected loss of almost 60 thousand is the largest in all the regions and countries of the UK. The rate of employment decline in the region (1.4 per cent per annum) exceeds the England average (1.1 per cent per annum); only the East Midlands and the South West are projected to experience a decrease in manufacturing employment at such a fast rate as the West Midlands.

At the local LSC level projected rates of employment decline over the period to 2014 are fastest in Birmingham & Solihull and the Black Country (at 1.6 per cent per annum).

Females are expected to account for a third of the projected job losses (20 thousand) and males for two-thirds (40 thousand jobs). For females, this represents a 2 per cent per annum decrease, which is slightly slower than the England and the UK average). For males, the expected rate of job loss (1.2 per cent per annum) over the period from 2004 to 2014 is faster than the average rate of loss expected for England (0.8 per cent per annum) and the UK (0.5 per cent per annum).

It should be noted that soon after the main projections were completed, the closure of Rover at Longbridge as a going concern was announced. This will clearly have a significant impact on the local area and the region as a whole. The immediate effect has been estimated as the loss of around 6 thousand direct jobs, with additional knock on effects for suppliers and other local industries and services; (although with the takeover of operations by a Chinese company it is possible that up to 2 thousand jobs may be saved). Given the historic importance of the motor industry in the West Midlands and the concentration of motor industry employment at a local level, this is of considerable significance to the area. With the takeover of operations by a Chinese company it is possible that up to 2 thousand jobs may be saved; however, at the time of writing considerable uncertainty remains. A support package has been implemented d to ease the process of readjustment. The position is being monitored by the MG Rover Task Force under the co-ordination of Advantage West Midlands.

The *Working Futures II* forecast already factored in job losses for the UK motor industry over the period from 2004 to 2014. So, to some degree, these events were already taken into account in the projections. However, the timing, speed of loss and geographical focus are now likely to be much more intense that in the projections reported here.

Construction

The West Midlands records the fastest rate of projected employment decline in this broad sector of any region or country of the UK. The projected decrease in employment of nearly 13 per cent over the period from 2004 to 2014, far exceeds the projected average loss for England (around 3 per cent) and is only rivalled by Yorkshire & the Humber (just under 12 per cent). There are projected to be 150 thousand jobs in construction in 2014 (compared with 175 thousand in 2004).

Within local LSC areas, the greatest relative declines in construction employment losses are expected to be experienced by Shropshire, Staffordshire, the Black Country and Birmingham & Solihull.

Males account for the majority of projected job losses in this broad sector.

Distribution, transport etc.

Over 780 thousand people are projected to be employed in this sector by 2014. This represents a 0.5 per cent per annum increase, which is similar to other regions of England.

Shropshire, Staffordshire and Herefordshire & Worcestershire (at 0.7-0.8 per cent per annum) are expected to enjoy the fastest rate of employment gains by 2014. Conversely, the Black Country and Birmingham & Solihull are expected to have comparatively modest increases of 0.3 per cent per annum.

Both male and females are projected to benefit from job growth in distribution, transport etc. Males are expected to occupy an additional 22 thousand jobs, and females, 18 thousand by 2014.

Business & other services

90 thousand additional jobs (representing an increase of 16 per cent) are expected in this sector over the period to 2014. At 1.5 per cent per annum, this represents a projected rate of increase in excess of the England average (1.2 per cent per annum).

Staffordshire (around 19 per cent), Coventry & Warwickshire (18 per cent) and Shropshire (16 per cent) record the expected percentage increases in employment growth in this broad sector.

Males are projected to be the main gainers in this sector, with an additional 60 thousand jobs, compared to a projected 27 thousand for females. Only Yorkshire & the Humber is projected to experience a faster annual average rate of growth in male employment in this broad sector, and only Wales and Scotland for females.

Non-marketed services

Employment in non-marketed services is projected to expand by over 50 thousand jobs between 2004 and 2014. This is the largest increase of any region outside of the South East, and represents an annual average growth rate of 0.8 per cent, which is the highest of all regions and countries of the UK.

Birmingham & Solihull is projected to experience a similar annual average rate of growth to England, while in all other local LSC areas in the region the projected growth rate exceeds the England average, with Shropshire and Staffordshire expected to have the fastest rates of growth at 1.0 per cent per annum and 0.9 per cent per annum, respectively.

Females are expected to benefit most from the job growth projected for non-marketed services. Almost 45 thousand female jobs are expected to be created by 2014, compared with just 8 thousand extra jobs for males.

6.4 Change in Employment by Gender and Employment Status

Males

By 2014, it is projected that the percentage of males in employment in the West Midlands will have fallen to just over 53 per cent, a fall of nearly 1 percentage point from 2004. However, there are still expected to be more males in employment in the West Midlands (1.43 million) than at any other time over the last thirty years (see Figure 6.2).

It is projected that by 2014 only 39 per cent of total employment will be accounted for by full-time male employees, compared with 47 per cent in 1984. This represents a continuation of existing trends. Conversely, male part time employment is expected to continue to increase, so that by 2014 it will have easily doubled its percentage share from 1984, to stand at over 7 per cent of total employment (almost 200 thousand jobs).

At the local LSC area level there are some important differences and similarities in projected change. For example, while Shropshire is projected to increase its share of male employment by nearly 6 per cent between 2004 and 2014, the level of male employment in the Black Country is projected to fall by over 2 per cent. In all local LSC regions, self-employment is expected to decline at a rate in excess of the England average.

Females

By 2014 it is projected that 1.26 million women will be in employment within the West Midlands. This is a projected increase of over 65 thousand compared with 2004, bringing the percentage share for women to nearly 47 per cent: This is just above the share projected for the UK.

Gains are projected for both full-time employees (increase of 20 thousand) and part-time employees (an increase of almost 75 thousand). In absolute terms this implies some 590 thousand females in full-term employment, and 620 thousand in part-time employment by 2014.

At the local LSC area level, female employment is projected to increase by 10 per cent in Coventry & Warwickshire between 2004 and 2014 – a relative increase far higher than any other LSC area in the West Midlands, and indeed England (at just 4.8 per cent). While Shropshire and Staffordshire are expected to lose female full-time employees, in Coventry & Warwickshire a 17 per cent increase is expected. The biggest increases in female part-time employment are projected to occur in Birmingham & Solihull (16 per cent) – which is well above the England average of just over 7 per cent.

6.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such ‘structural demand’ provides only part of the overall picture of occupational change. For a fuller picture of the changing requirement for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by ‘replacement demand’ (see Section 6.6).

Employment in both professional occupations and personal service occupations is projected to increase by over 50 thousand jobs in the period to 2014 (see Table 6.2). Employment increases are projected for managers & senior officials, administrative, clerical & secretarial occupations and sales & customer service occupations also.

Job losses are projected to occur for skilled trades occupations, machine & transport operatives and elementary occupations. Of these three SOC major groups, elementary occupations are projected to record the largest reduction, with a loss of over 70 thousand jobs.

1. Managers & senior officials

Within the West Midlands over 40 thousand jobs are expected to be accounted for by managers & senior officials in 2014. With projected growth of 12 per cent over the period from 2004 to 2014, managers & senior officials becomes the fourth largest SOC Major Group in the region.

While there is a projected increase of 55 thousand corporate managers (at 1.8 per cent per annum this is in line with the rate of increase projected for the UK), jobs for managers & proprietors are expected to decline by 1.5 per cent per annum, resulting in the loss of 11 thousand jobs (Table 6.2).

At the local LSC level, Coventry & Warwickshire is projected to have the highest share of employment in this SOC Major Group (up to 15.7 per cent from 14.4 per cent in 2004).

Focusing on gender, females are expected to account for over 30 thousand jobs: the majority of the additional jobs for this occupation. For men, the additional 11 thousand jobs represents a 5 per cent change, which is well below the average male gains projected for England (5.5 per cent) and the UK (6.5 per cent).

2. Professional occupations

The 18 per cent projected increase for professional occupations is the second highest (after personal service occupations) of all SOC Major Groups over the period from 2004 to 2014. This represents over 50 thousand additional jobs over the decade to 2014.

The largest number of new jobs is projected to be for teaching and research professionals (21 thousand) and science & technology professionals (18 thousand). The greatest per cent change – over 25 per cent – is expected for health professionals, though this is below the rate of growth projected for England and the UK (nearly 30 per cent).

At local LSC area level, Staffordshire is expected to see the greatest percentage change in employment (23 per cent) for this occupation. Shropshire, the Black Country and Birmingham & Solihull are projected to have lower rates of increase in employment than England (around 19 per cent) between 2004 and 2014.

As with managers & senior officials, the majority of additional jobs projected for professional occupations are expected to be taken by females (30 thousand, compared to 10 thousand males). The 2.3 per cent per annum projected change for females is one of the highest of all the regions and countries of the UK, and is exceeded only by the projected rate of increase for London (2.4 per cent per annum).

3. Associate professional & technical occupations

This Major Group is expected to increase its share of employment to 14 per cent, which represents an additional 40 thousand jobs, resulting in a projected total of 380 thousand jobs by 2014.

Employment increases are expected for all sub major groups. Around 12 thousand additional jobs are projected for business associate professionals, and ten thousand for health associate professionals. The greatest rate of change – 20 per cent – is projected for culture, media & sports, compared with only just over 3 per cent (an additional thousand jobs) for protective service occupations.

Staffordshire (at 1.3 per cent per annum) is projected to have the second highest rate of increase, behind Coventry & Warwickshire (1.4 per cent per annum), with Herefordshire & Worcestershire (1.2 per cent per annum) positioned third.

Males and females are projected to share fairly equally in the projected additional jobs. For males the increase is expected to be over 21 thousand, and for females 18 thousand. The rates of change involved between 2004 and 2014 (12 per cent for males and 11 per cent for females) are higher than the projected increase at national level.

4. Administrative, clerical & secretarial occupations

The West Midlands is one of only two regions and countries in the UK (the other being Yorkshire & the Humber) where administrative, clerical & secretarial occupations are projected to gain employment between 2004 and 2014. The West Midlands is expected to experience a 0.3 per cent gain, resulting in the creation of a thousand jobs.

The sub-major groups however are projected to experience widely different fortunes, with administrative & clerical occupations increasing by 16 thousand (a 6.5 per cent change – compared to a 4.2 per cent loss for England) by 2014. Secretarial & related occupations, however, are projected to lose 15 thousand jobs, a rate of less than 20 per cent per annum, which although considerable, is below the average rate of loss projected for both England and the UK.

At local LSC area level, only Shropshire, Birmingham & Solihull and Coventry & Warwickshire are expected to see an increase in employment over the period to 2014. Herefordshire & Worcestershire is projected to experience the greatest rate of job loss, albeit at a slower rate than nationally.

Employment increases are projected for males, contrasting with job losses expected for females.

5. Skilled trades occupations

Employment in skilled trades occupations in the West Midlands is projected to decrease by 1.1 per cent per annum: the highest rate of loss of all the countries and regions of the UK. This represents a loss of 28 thousand jobs.

Skilled metal & electrical trades account for the vast majority of the projected reduction in employment, with an expected loss of over 40 thousand. Other skilled trades are projected to lose around 10 thousand jobs, whereas gains are expected for skilled agricultural trades (3 thousand), and skilled construction & building (19 thousand). In all four cases, rate of employment loss are greater than the England and UK average and rates of employment increase are slower than the England and UK average.

By 2014 the shares of total employment in skilled trades occupations are expected to range from under 10 per cent in Birmingham & Solihull to over 13 per cent in both Herefordshire & Worcestershire and the Black Country. In the Black Country and Birmingham & Solihull more than 10 per cent of jobs in skilled trades occupations are expected to be lost over the period to 2014.

A loss of 6 thousand skilled trade jobs is projected for females, compared with a projected loss of over 22 thousand jobs for males.

6. Personal Services occupations

Employment in personal service occupations is expected to be the largest single source of additional jobs for the West Midlands, with over 50 thousand additional jobs expected between 2004 and 2014. The projected 2.3 per cent per annum increase easily exceeds the 1.8 per cent projected for England; indeed the rate of growth expected in the region expected outstrips that for all the other regions of England.

At the sub-major level, almost the entire increase is expected to come from caring personal service (almost 50 thousand additional jobs) with leisure occupations contributing just 3 thousand extra jobs by 2014. However, both sub-major groups are expected to exceed the national average rates of change.

Rates of projected employment growth are fairly similar across local LSC areas.

Only a thousand of the additional jobs are projected to be taken by males. Female employment in personal service occupations is expected to increase by at least 50 thousand. The projected 28 per cent increase between 2004 and 2014 is the largest projected for all the regions and countries of the UK.

7. Sales & customer service occupations

There are projected to be 225 thousand jobs in sales & customer service occupations in the West Midlands by 2014. This represents an increase of 1.6 per cent per annum between 2004 and 2014.

15 thousand jobs are projected to be created in customer service occupations by 2014, with a further ten thousand expected in sales occupations. The 40 per cent increase for customer service occupations is the highest of all the employment increases projected for an occupational sub-major group in the West Midlands.

Females are projected to account for more of the extra jobs than males (16 thousand compared with 9 thousand), although the projected rate of increase for males outstrips that for females.

8. Machine & transport operatives

Over 20 thousand jobs are projected to be lost between 2004 and 2014. This is a considerable loss both by comparison with most other occupations within the West Midlands, but also nationally. England is expected to experience a 0.5 per cent per annum loss, compared with 0.9 per cent per annum in the West Midlands.

Drivers & other operatives are expected to gain 18 thousand jobs. This positive employment growth though is easily offset by the projected loss of 40 thousand jobs for process machine operatives.

Within the region, projected rates of employment loss vary between 11 per cent in the Black Country (the greatest loss expected for any local LSC areas) and 5 per cent in Shropshire.

The bulk of Machine & transport operatives job losses are expected to fall on females (20 thousand), with a 2 thousand job loss expected for males.

9. Elementary Occupations

The largest projected job loss in the West Midlands is recorded by elementary occupations. Between 2004 and 2014 a reduction of around 70 thousand jobs is projected. At 2.9 per cent per annum the West Midlands shares with the East Midlands the fastest rate of loss of any of the regions and countries of the UK (the national average rate of projected loss is 1.7 per cent per annum).

A loss of around 40 thousand jobs is expected for elementary trades occupations (a loss of 39 per cent), and of 32 thousand for elementary service occupations (a loss of nearly 18 per cent) between 2004 and 2014. Both these losses are above the average losses projected for England (12 per cent) and the UK (13 per cent).

Considerable losses are projected to be experienced by both males and females in elementary occupations. The expected loss of 27 thousand male jobs is the highest for all SOC major groups, and the rate of loss of 1.9 per cent per annum loss projected over the decade to 2014 exceeds the rates of loss projected for England and the UK (1.2 per cent per annum) The projected loss of almost 45 thousand jobs for females is also the highest single loss of jobs for females in the West Midlands. Again, the projected rates of loss of 4.1 per cent per annum rate for females exceed the UK average (2.4 per cent per annum).

6.6 Projections of Replacement Demands

The key component of replacement demands is retirements from the workforce, especially for older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Regardless of whether the expansion demand projections suggest an increase or decrease in employment levels, total requirements are positive for all SOC Major Groups. Focusing on all occupations collectively, the projections of expansion demand suggest that 90 thousand additional jobs will be created between 2004 and 2014. The replacement demand projected however greatly exceeds this figure, at around 900 thousand. Thus the overall requirement for the West Midlands is projected to be over a million (Figure 6.3).

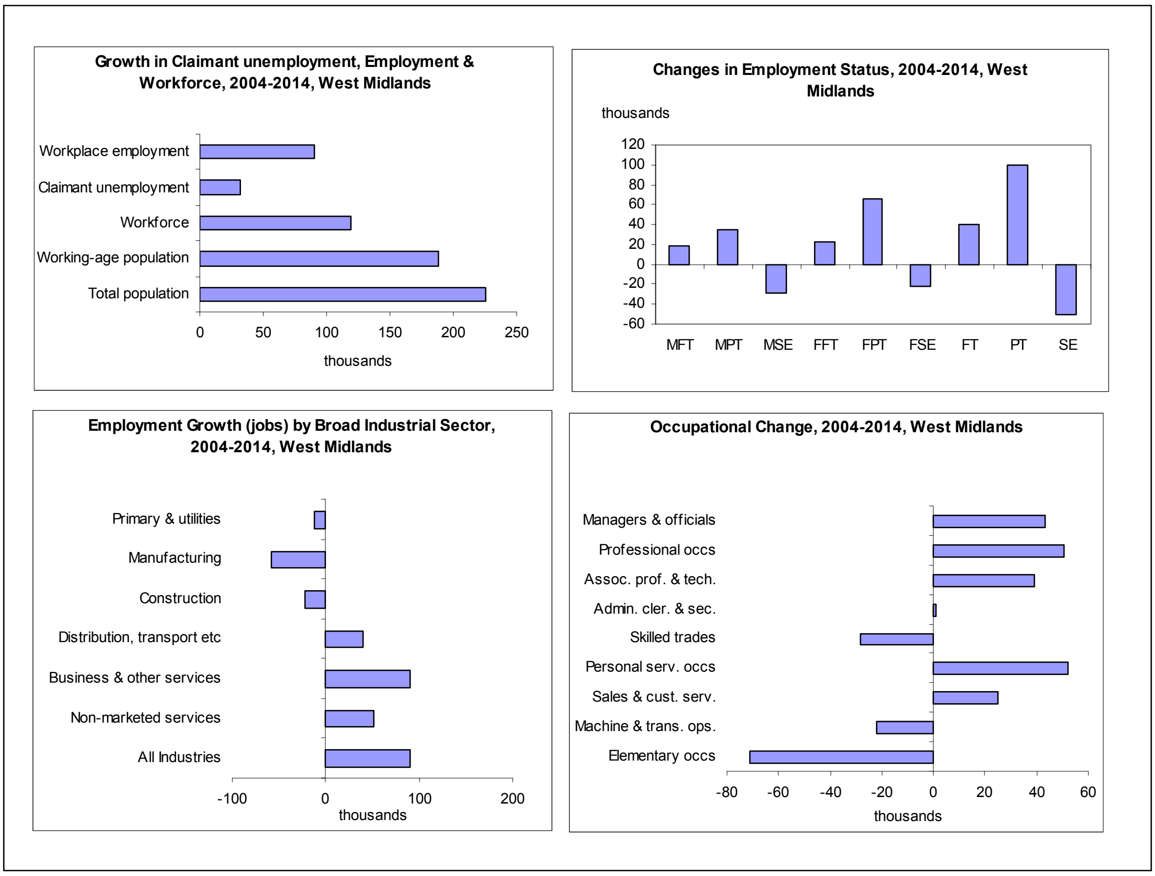
Of those occupations which are projected to have positive expansion demands, managers & senior officials display the highest replacement demands (around 130 thousand).

Of those occupations projected to suffer a net reduction in employment between 2004 and 2014, the one with the greatest projected job losses (i.e. elementary occupations) is also expected to have high replacement demands (around 100 thousand). Thus the overall requirement for this occupation is positive, projected at about 30 thousand. Elsewhere, administrative, clerical & secretarial occupations, have replacement demands in excess of around 100 thousand jobs, while for skilled trade occupations these are estimated at about 50 thousand.

Figure 6.2: Key Changes in the West Midlands, % p.a.

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 6.3: Key Changes in the West Midlands, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 6.2: Sectoral Change in the West Midlands

	West Midlands											**England**		**UK**	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	55	58	40	31	2.4	2.4	1.5	1.1	-9	-23.1	-2.6	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	19	3	2	2	0.8	0.1	0.1	0.1	0	-14.3	-1.5	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	28	17	13	11	1.2	0.7	0.5	0.4	-2	-17.0	-1.8	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*101*	*78*	*55*	*43*	*4.4*	*3.3*	*2.1*	*1.6*	*-12*	*-21.3*	*-2.4*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	45	39	36	33	1.9	1.6	1.4	1.2	-3	-7.6	-0.8	-11.5	-1.2	-10.0	-1.1
4. Engineering	139	105	84	76	6.0	4.4	3.2	2.8	-8	-9.2	-1.0	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	496	392	314	266	21.3	16.5	12.1	9.9	-47	-15.1	-1.6	-11.3	-1.2	-11.3	-1.2
Manufacturing	*681*	*536*	*433*	*375*	*29.2*	*22.5*	*16.7*	*14.0*	*-58*	*-13.3*	*-1.4*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	165	150	174	152	7.1	6.3	6.7	5.6	-22	-12.9	-1.4	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	379	424	449	479	16.3	17.8	17.3	17.8	29	6.5	0.6	7.0	0.7	6.7	0.6
9. Hotels & restaurants	112	132	146	152	4.8	5.5	5.6	5.6	6	4.3	0.4	6.2	0.6	5.7	0.6
10. Transport & comm.	103	111	146	151	4.4	4.7	5.6	5.6	5	3.2	0.3	2.5	0.3	2.7	0.3
Distribution transport etc.	*594*	*668*	*742*	*782*	*25.5*	*28.0*	*28.5*	*29.1*	*40*	*5.4*	*0.5*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	70	70	76	76	3.0	2.9	2.9	2.8	0	0.5	0.1	3.4	0.3	2.8	0.3
12. Other business activities	201	254	355	435	8.6	10.7	13.6	16.2	80	22.6	2.1	15.5	1.5	15.7	1.5
16. Other services	95	117	142	151	4.1	4.9	5.4	5.6	9	6.4	0.6	8.6	0.8	9.3	0.9
Business & other services	*365*	*442*	*572*	*662*	*15.7*	*18.5*	*22.0*	*24.6*	*90*	*15.7*	*1.5*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	119	109	114	111	5.1	4.6	4.4	4.1	-3	-2.3	-0.2	-2.5	-0.3	-2.3	-0.2
14. Education	138	179	234	254	5.9	7.5	9.0	9.5	20	8.5	0.8	5.7	0.6	5.7	0.6
15. Health & social work	167	223	275	310	7.1	9.4	10.6	11.5	35	12.5	1.2	10.2	1.0	9.7	0.9
Non-marketed services	*424*	*511*	*624*	*675*	*18.2*	*21.4*	*24.0*	*25.1*	*52*	*8.3*	*0.8*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	2331	2384	2599	2689	100.0	100.0	100.0	100.0	90	3.5	0.3	4.6	0.5	4.3	0.4

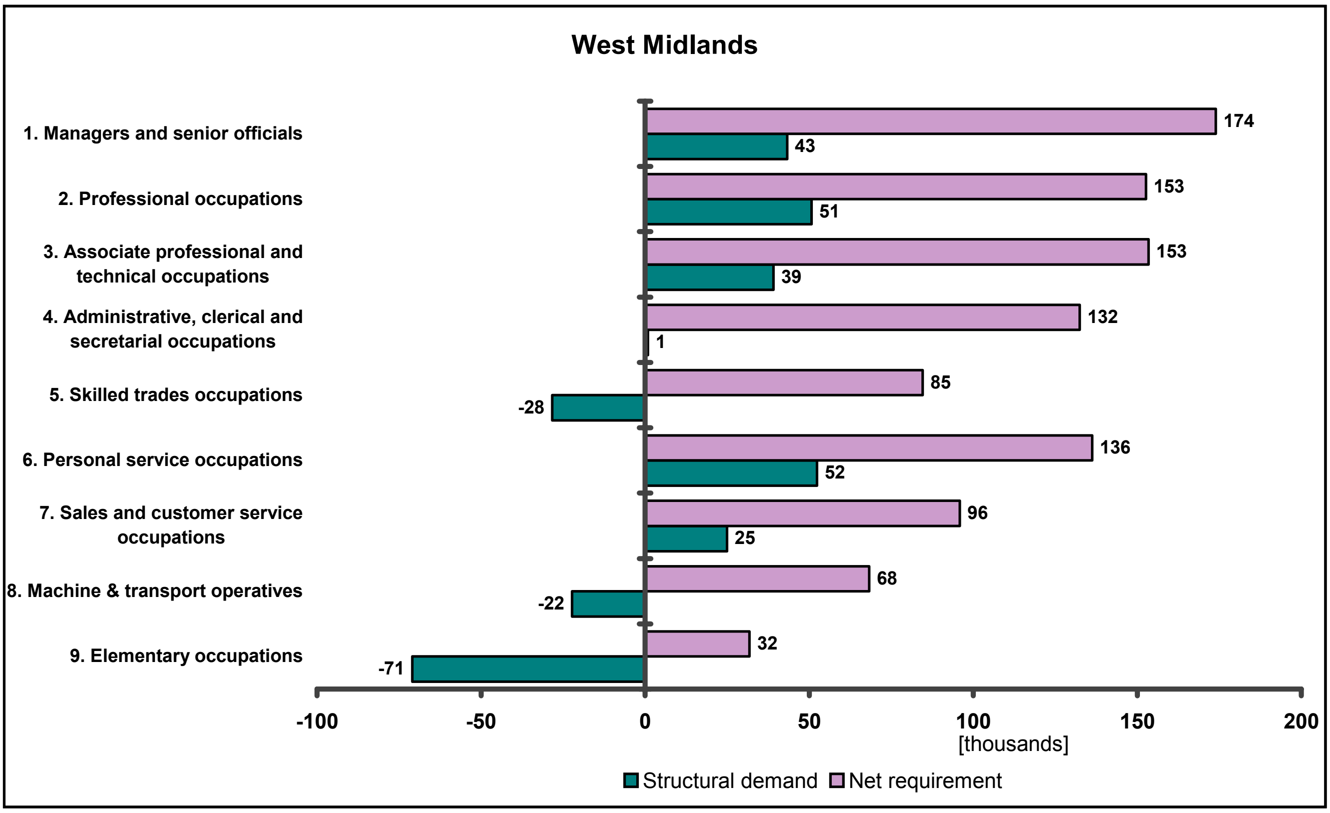
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 6.3: Occupational Change in the West Midlands

					West Midlands							England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
					% of	% of	% of	% of		%	% per	%	% per	%	% per
Occupational sub-major group	000s	000s	000s	000s	total	total	total	total	000s	change	annum	change	annum	change	annum
Corporate managers	182	216	280	335	7.8	9.0	10.8	12.4	55	19.5	1.8	20.2	1.9	19.9	1.8
Managers / proprietors	89	88	81	70	3.8	3.7	3.1	2.6	-11	-13.7	-1.5	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	51	59	81	99	2.2	2.5	3.1	3.7	18	22.5	2.1	18.9	1.7	18.3	1.7
Health professionals	12	15	21	26	0.5	0.6	0.8	1.0	5	25.3	2.3	29.8	2.6	29.4	2.6
Teaching & res. Profs.	81	97	120	141	3.5	4.1	4.6	5.2	21	17.3	1.6	19.9	1.8	21.6	2.0
Business professionals	36	42	54	61	1.6	1.8	2.1	2.3	6	11.7	1.1	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	37	39	49	56	1.6	1.6	1.9	2.1	7	13.8	1.3	12.2	1.2	12.4	1.2
Health assoc. profs.	56	71	90	101	2.4	3.0	3.5	3.7	10	11.6	1.1	7.7	0.7	7.8	0.8
Protect. serv. occs	18	21	31	32	0.8	0.9	1.2	1.2	1	3.4	0.3	0.8	0.1	0.1	0.0
Culture, med. & sports	18	27	44	53	0.8	1.1	1.7	2.0	9	20.1	1.8	24.5	2.2	23.5	2.1
Business assoc. profs.	80	98	125	137	3.5	4.1	4.8	5.1	12	9.5	0.9	10.0	1.0	9.2	0.9
Admin & clerical	218	230	250	267	9.4	9.6	9.6	9.9	16	6.5	0.6	-4.2	-0.4	-3.1	-0.3
Secretarial & related	95	94	76	61	4.1	3.9	2.9	2.3	-15	-20.2	-2.2	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	39	40	38	41	1.7	1.7	1.5	1.5	3	6.9	0.7	17.3	1.6	15.5	1.5
Skilled metal & electrical	218	178	142	101	9.3	7.5	5.5	3.7	-42	-29.2	-3.4	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	113	99	110	129	4.9	4.2	4.2	4.8	19	17.4	1.6	20.2	1.9	19.4	1.8
Other skilled trades	68	64	53	44	2.9	2.7	2.0	1.6	-9	-16.4	-1.8	-14.7	-1.6	-14.6	-1.6
Caring personal service	46	86	162	212	2.0	3.6	6.2	7.9	49	30.4	2.7	23.8	2.2	22.8	2.1
Leisure occupations	39	45	45	48	1.7	1.9	1.7	1.8	3	6.8	0.7	7.3	0.7	6.7	0.7
Sales occupations	124	144	163	173	5.3	6.1	6.3	6.4	10	6.2	0.6	13.0	1.2	12.0	1.1
Customer service occs.	12	18	37	52	0.5	0.8	1.4	1.9	15	39.7	3.4	31.3	2.8	32.2	2.8
Process machine ops.	241	196	156	116	10.4	8.2	6.0	4.3	-40	-25.5	-2.9	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	90	92	105	123	3.9	3.9	4.0	4.6	18	16.7	1.6	18.5	1.7	17.2	1.6
Elementary: trades	160	129	101	62	6.9	5.4	3.9	2.3	-39	-38.8	-4.8	-36.6	-4.4	-35.5	-4.3
Elementary: service	208	198	181	150	8.9	8.3	7.0	5.6	-32	-17.5	-1.9	-12.2	-1.3	-12.9	-1.4
All occupations	2331	2384	2599	2689	100.0	100.0	100.0	100.0	90	3.5	0.3	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 6.4: Replacement Demands in the West Midlands



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

7. EAST MIDLANDS

7.1 Overview

The East Midlands comprises the counties of Derbyshire, Leicestershire, Nottinghamshire, Northamptonshire and Lincolnshire, and the unitary authorities of Derby, Leicester, Nottingham and Rutland. It is a large and diverse region. The East Midlands Regional Spatial Strategy identifies five sub-areas, which have some internal coherence:

1. *Southern sub-area* – Northamptonshire and the most southerly parts of Leicestershire, with close functional relationships with adjacent regions (the South East, the West Midlands and the East of England);
2. *Three cities sub-area* – comprising the cities of Derby, Nottingham and Leicester, which act as major administrative/cultural centres, and are strong engines of existing and potential growth, but also have pockets of economic, social and physical deprivation;
3. *Peak sub-area* – the National Park and surrounding areas in the west of the region, which are largely rural in character;
4. *Northern sub-area* – has been adversely affected by economic restructuring, especially colliery closures and textiles and clothing, and is a priority area for regeneration;
5. *Eastern sub-area* – incorporating Lincolnshire, Rutland and the eastern parts of Northamptonshire and Leicestershire, which are predominately rural in character.

Across the East Midlands workplace employment is projected to grow at rates slightly faster than the UK average over the period to 2014.

Traditionally, a key feature of the East Midlands has been the higher than average share of employment in manufacturing. With a projected loss of nearly 45 thousand jobs manufacturing dominates employment decline, and despite the rate of decrease exceeding the national average this broad sector remains more important regionally than nationally. Job losses are also expected in the primary sector and utilities, and construction. Employment in distribution, transport, etc is projected to grow at a slower rate than nationally. The largest job gains are expected in business & other services. At 0.7 per cent per annum, the projected growth in non-marketed services is exceeded only by that projected for the West Midlands.

In occupational terms, the largest absolute gains are expected for professional occupations with over 40 thousand extra jobs. The East Midlands records one of the fastest rates of regional increase for sales & customer service occupations. Administrative, clerical & secretarial occupations have projected employment losses of 0.9 per cent per annum, which is the same as the national rate of demise. Skilled trades occupations, machine and transport operatives and elementary occupations are all projected to experience further employment declines as a result of structural change. However, an examination of replacement demands reveals that net requirements are positive for all SOC major groups, and are largest for managers & senior officials and professional occupations.

7.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 7.1 provides a general overview, while Figure 7.1 presents a graphical summary of the supply side. Figures 7.2 and 7.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population
The total population in the East Midlands is projected to increase by around 220 thousand at a similar rate to the UK average between 2004 and 2014, to reach around 4.5 million (see Figure 7.1).

Population 16+
The 16+ population in the East Midlands is expected to grow at a faster pace than in the West Midlands and the UK over 2004-14, and increase by 258 thousand.

Working-age Population
The working age population is projected to increase by about 125 thousand between 2004 and 2014.

Workforce
The workforce is projected to increase by around 60 thousand, to reach just over 2.13 million in 2014.

Labour Force
Labour force growth is expected to be slightly weaker than the UK average, at 3.1 per cent over 2004-09 and 1.4 per cent over 2009-14. The activity rate is forecast to decline faster than the national average.

ILO unemployment
ILO Unemployment is expected to rise over the period 2004-14, well ahead of the expectation for the UK.

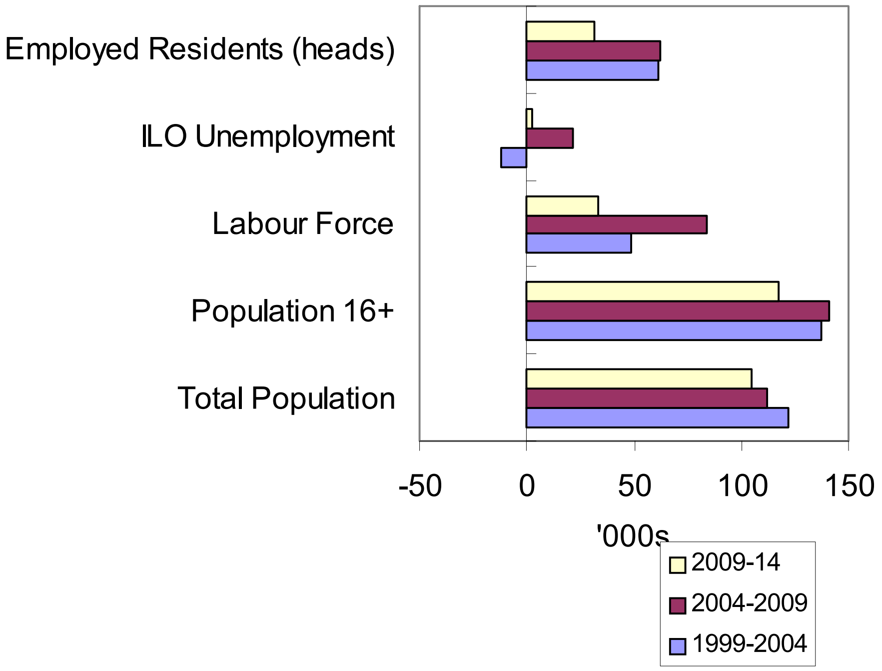
Claimant Unemployment
Claimant unemployment is projected to increase slightly between 2004 and 2014, to reach around 65 thousand by 2014. At a rate of 2.3 per cent per annum, the rate of growth is slower than the national average.

Employed Residents
The East Midlands is expected to see some growth in the number of employed residents among all the UK regions over the priod 2004-09, but this growth is expected to weaken over the period 2009-14.

Workplace Employment
Between 2004 and 2014, some increase is projected in workplace employment, with the level reaching just over the 2 million mark by 2014. The projected growth rate between 2004 and 2014, at 0.3 per cent per annum, is slightly below the UK average. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is "double jobbing" (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In the East midlands the labour market residual is small and negative, implying that a number of people commute out of the East Midlands into other regions to work. This offsets the effect of double jobbing.

Figure 7.1: Changes in Population and the Labour Force in the East Midlands



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 7.1: Population and Labour Force [1]

					percentage change over period		
	1999	**2004**	**2009**	**2014**	**1999-2004**	**2004-09**	**2009-14**
Male							
Total Population	2,042	2,104	2,160	2,212	3.1	2.7	2.4
Population 16+	1,608	1,679	1,752	1,811	4.4	4.3	3.4
Labour Force	1,138	1,143	1,180	1,195	0.4	3.2	1.3
Activity Rate	70.8	68.1	67.3	66.0	-2.7	-0.8	-1.3
ILO Unemployment	61	55	68	69	-9.8	22.7	1.9
ILO Unemployment rate (%)	5.4	4.8	5.7	5.8	-0.5	0.9	0.0
Employed Residents (heads)	1,072	1,093	1,112	1,126	2.0	1.7	1.2
Labour Market Residual (2)	-18	-16	-33	-24			
Female							
Total Population	2,110	2,170	2,226	2,279	2.8	2.6	2.4
Population 16+	1,701	1,767	1,836	1,894	3.9	3.9	3.2
Labour Force	935	979	1,026	1,045	4.8	4.8	1.8
Activity Rate	54.9	55.4	55.9	55.2	0.5	0.5	-0.7
ILO Unemployment	46	40	49	50	-13.0	22.8	2.0
ILO Unemployment rate (%)	4.9	4.1	4.8	4.8	-0.8	0.7	0.0
Employed Residents (heads)	894	934	977	995	4.5	4.6	1.8
Labour Market Residual (2)	63	4	-31	-33			
Total							
Total Population	4,152	4,274	4,386	4,491	2.9	2.6	2.4
Population 16+	3,309	3,447	3,587	3,704	4.2	4.1	3.3
Working-age Population	2,544	2,633	2,683	2,757	3.5	1.9	2.8
Labour Force	2,073	2,122	2,206	2,239	2.4	3.9	1.5
Workforce	2,094	2,074	2,097	2,137	-1.0	1.1	1.9
Activity Rate	62.6	61.6	61.5	60.4	-1.0	-0.1	-1.1
ILO Unemployment	107	95	117	119	-11.2	22.8	1.9
ILO Unemployment rate (%)	5.2	4.5	5.3	5.3	-0.7	0.8	0.0
Claimant Unemployment	76	52	64	66	-31.3	22.8	1.9
Claimant Unemployment rate	3.0	2.0	2.4	2.4	-1.0	0.4	0.0
Employed Residents (heads)	1,966	2,027	2,089	2,120	3.1	3.1	1.5
Workplace employment (jobs)	1,946	2,012	2,007	2,047	3.4	-0.3	2.0
Labour Market Residual[2]	45	-12	-64	-56			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

7.3 Industrial Employment Structure

Overview of Broad sectors

At the broad sectoral level, the picture for the East Midlands is one of employment losses in the primary sector and utilities, in manufacturing, and in construction. Employment gains are projected in, distribution, transport, etc, business & other services and non-marketed services (see Figure 7.1).

In absolute terms, as across all other regions, the dominant feature of employment decline is the loss of 43 thousand jobs in manufacturing. In relative terms, this represents only a slightly greater loss (12.8 per cent) than that recorded across the UK as a whole (10.8 per cent). This contrasts with projected gains of 50 thousand jobs in business & other services, and over 35 thousand jobs in non-marketed services and 27 thousand in distribution, transport, etc. In construction the projected employment loss is for less than 10 thousand jobs.

Primary sector & utilities

The projected rate of employment loss for the primary sector & utilities is slightly greater than the UK average. Agriculture dominates projected job losses between 2004 and 2014 (see Table 7.1). In mining & quarrying a loss of a thousand jobs is expected, although the massive reductions in jobs in this industry occurred in the 1980s and 1990s. By 2014 it is projected that there will be only 7 thousand jobs in this industry in the region. Utilities also share in overall job losses as part of a trend of long-term decline.

Within the East Midlands Lincolnshire and Rutland records the greatest concentration of jobs in this broad sector (reflecting the importance of agriculture and related industries to the total economy) and it is in this local area that the largest absolute job losses are expected.

All the job losses are projected to affect women, with men expected to gain up to a thousand jobs by 2014.

Manufacturing

The rest of manufacturing dominates job losses in manufacturing with a projected loss of 30 thousand jobs between 2004 and 2014. Around 5 thousand jobs are projected to be lost in engineering. In food, drink and tobacco are also projected job losses of 5 thousand.

Derbyshire and Leicestershire are projected to see the fastest rates of employment decline in manufacturing in the East Midlands. The slowest rate of job loss is projected to occur in Lincolnshire and Rutland. All local LSC areas in the East Midlands are expected to retain a larger share of total employment in manufacturing in 2014 than the England average.

Both males and females share in the projected job losses.

Construction

Employment in construction in the East Midlands is projected to fall slightly by 10 thousand jobs. Despite some increase in output productivity gains are expected to result in some job losses.

All LSC areas in the East Midlands are expected to share in this employment decline, ranging from an annual average projected rate of 0.4 per cent in Leicestershire to 0.6 per cent in Northamptonshire.

All expected jobs losses are projected to affect males, with numbers of females in employment remaining stable.

Distribution, transport etc.

The annual average rate of projected employment growth in distribution, transport, etc in the East Midlands, at 0.5 per cent per annum, is the same as the UK average. This broad sector is dominated by an increase of 25 thousand jobs in retail distribution. Employment in hotels and restaurants is expected to remain stable in the region. Modest employment increases of 3 thousand are projected for transport, storage and communications.

At local LSC area level the projected rates of annual average employment growth range from 0.3 per cent in Nottinghamshire to 0.6 per cent in Northamptonshire and Lincolnshire & Rutland.

Over 20 thousand jobs are projected to be taken by women, leaving just over 5 thousand jobs projected for males by 2014.

Business & other services

As across the UK, the greatest projected employment increase is expected in business & other services. In the East Midlands projected growth is at the same rate (1.2 per cent per annum) as the national one. Other business activities dominate projected job gains with an expected gain of 35 thousand jobs, although the rate of employment increase is slower than nationally. Employment levels in banking and insurance are projected to decrease slightly, contrasting with an increase nationally. Employment in other services is projected to increase, at a rate exceeding the national average.

At local level only Northamptonshire and Derbyshire record a faster rate of projected employment growth in this broad sector than the England average. However, in all local LSC areas the share of employment in business & other services is projected to remain below the England average. In the most rural part of the region - Lincolnshire and Rutland - this broad sector accounts for a mere 15 per cent of total employment.

Up to 40 thousand extra jobs are projected for males in this broad sector, with females accounting for a much smaller share of expected job gains.

Non-marketed services

Employment in non-marketed services is projected to expand by 0.7 per cent per annum between 2004 and 2014. This represents an increase of up to 35 thousand jobs. Employment gains are projected for health and social work and education. As at national level, employment levels in public administration and defence are projected to decline modestly.

Within the East Midlands projected job gains are particularly concentrated in Nottinghamshire, which displays the fastest annual average rate of employment growth in the East Midlands. By contrast, in Northamptonshire a slower than average increase in employment in non-marketed services is expected, with this broad sector increasing by 0.4 per cent per annum.

The majority of projected additional jobs are expected to be taken by females. For females this represents a 0.4 per cent per annum increase in employment to 2014.

7.4 Change in Employment by Gender and Employment Status

Males

Between 2004 and 2014 15 thousand an additional male full-time jobs in the East Midlands areas expected, which is a 0.3 per cent per annum increase.

Part-time male employment in the East Midlands is expected to increase by 1.5 per cent per annum (an additional 30 thousand jobs).

Females

By 2014 it is projected that an additional 2 thousand female full-time jobs will be created in the East Midlands. With the exception of Wales, which it projected to suffer a demise in female full-time employment, this is the lowest per cent per annum increase of all the regions and countries of the UK.

The number of female part time jobs is projected to increase by 35 thousand between 2004 and 2014, representing an increase of 0.7 per cent per annum.

7.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such 'structural demand' provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by 'replacement demand'.

At the level of SOC major groups, managers & officials, professional occupations, and personal service occupations are expected to experience the largest employment increases between 2004 and 2014, each projected to be around 40 thousand (see Figure 7.1). Associate professional & technical occupations and sales & customer service occupations are expected to see increases in employment of around 25 thousand and 30 thousand jobs, respectively.

Projected job losses are concentrated in elementary occupations and skilled trades occupations with expected declines of 60 thousand and 25 thousand jobs, respectively. Losses of around 20 thousand jobs are expected for administrative, clerical & secretarial occupations and 15 thousand for machine and transport operatives.

1. Managers & senior officials

The projected gain in employment of 37 thousand jobs across the region, representing a rate of increase slightly lower than the UK average, is a function of an expected gain of around 40 thousand jobs for corporate managers easily offsetting a small projected loss of 5 thousand jobs for managers/proprietors.

At local LSC area level, the slowest increases in employment per annum are, at 1.0 per cent, projected in Derbyshire, Nottinghamshire and Leicestershire.

Both males and females are expected to share fairly equally in projected employment gains.

2. Professional occupations

Over the period to 2014 employment in professional occupations is projected to increase at 1.8 per cent per annum, which is the same as the projected rate of increase expected across the UK as a whole. The main contributors to the projected increase of around 40 thousand extra jobs are science and technology professionals and teaching and research professionals, each with an expected employment increase of 14 thousand jobs. Business professionals and health professionals are expected to add a further 5 thousand jobs each.

At local LSC area level Nottinghamshire has the largest concentration of employment in professional occupations, but the rate of increase is slower here and in Leicestershire than in other parts of the region.

Females are expected to account for only 15 thousand of the projected extra jobs.

3. Associate professional & technical occupations

At 0.9 per cent per annum, the projected rate of employment increase over the period to 2014 is slower than that expected across the UK as a whole.

All occupation groups are expected to share in the projected employment increase, but business associate professionals account for the largest employment gain, with an additional 7 thousand jobs. Science & associate professionals and culture, media & sports account for the next largest net gains, with over 5 thousand extra jobs each by 2014. The smallest net gains are expected for protective service professionals with increases of around a thousand jobs.

At the local level Nottinghamshire is expected to still be the largest employer for this Major Group, while Coventry and Warwickshire is projected to have the highest annual increase between 2004 and 2014, at 1.4 per cent per annum.

Over twice the number of projected jobs associate professional & technical occupations are expected to be taken by males than females.

4. Administrative, clerical & secretarial occupations

In administrative, clerical & secretarial occupations 20 thousand jobs are expected to be lost over the period to 2014, representing an annual average rate of decrease of 0.9 per cent per annum.

Secretarial and related occupations account for around two-thirds of the expected employment decline. The projected rate of decline for administrative and clerical occupations is at 0.4 per cent per annum, compared with 2.8 per cent per annum for secretarial and related occupations. Females account for virtually all of the job losses.

At local level, projected annual average rates of employment decline range from 0.2 per cent in Northamptonshire to around 1.3 per cent in Nottinghamshire and Lincolnshire & Rutland.

5. Skilled trades occupations

Over the period to 2014, employment is projected to decline by 1.1 per cent per annum, which represents the fastest rate of decline experienced by any English region. The UK and England annual average rates of decrease are 0.4 per cent.

Small increases in employment levels are projected for skilled agricultural trades (4 thousand) and skilled construction & building trades (7 thousand). These gains are easily negated by the projected losses in skilled metal & electrical occupations (28 thousand) and other skilled trades (10 thousand). Job losses are projected to fall almost entirely on males. By 2014, male employment in this Major Group is projected to have fallen by 22 thousand.

All local areas record rates of employment decline in excess of the UK average, with Northamptonshire recording the fastest rate of job loss (1.4 per cent per annum).

6. Personal service occupations

The projected rate of increase in employment for this Major Group, at 2.0 per cent per annum, is faster than the increase of 1.7 per cent per annum expected for the UK. 35 thousand out of the projected 38 thousand projected increase in jobs in this Major Group is accounted for by caring personal service occupations, representing an annual average growth rate of 2.3 per cent per annum. Females account for virtually all of the gains in this Major Group.

At local area level the projected annual average rate of growth ranges from 1.8 per cent in Leicestershire and Nottinghamshire to 2.5 per cent in Derbyshire.

7. Sales & customer service occupations

30 thousand extra jobs are projected in sales & customer service occupations between 2004 and 2014. At 1.7 per cent per annum, the projected rate of growth exceeds the UK average (1.5 per cent per annum).

Expected rates of employment growth in sales occupations exceed the UK average in the case of sales occupations, with nearly 25 thousand additional jobs expected. Customer service occupations are projected to add another 8 thousand jobs between 2004 and 2014.

Within the region Leicestershire displays the fastest annual average growth rate (2.2 per cent). Lincolnshire and Rutland has the slowest annual average growth rate at just 0.8 per cent.

The majority of additional jobs, over 25 thousand, are expected to be filled by females.

8. Machine & transport operatives

At 0.7 per cent per annum, the projected rate of employment decline in the East Midlands exceeds the UK average. An expected loss of 27 thousand jobs for process machine operatives across the region contrasts with a projected gain of 12 thousand jobs for drivers and other operatives. Females are expected to account for around 20 thousand of the job losses.

At local level, Leicestershire displays the fastest rate of projected job loss (1.1 per cent per annum), while in Northamptonshire, Lincolnshire and Rutland and Derbyshire projected rates of employment decline are akin to or faster than the England average.

9. Elementary Occupations

The projected decline in employment in elementary occupations in the East Midlands is, at 4.1 per cent per annum, only exceeded by Yorkshire & the Humber. Around 30 thousand jobs are expected to be lost in each of elementary trade and elementary service occupations. Of the 60 thousand jobs projected to be lost between 2002 and 2012, females account for around 35 thousand.

At the local LSC area level the fastest rates of employment decline are projected for Lincolnshire and Rutland at 3.6 per cent per annum. All local LSC regions exceed the expected 2.2 per cent per annum decline projected for England.

7.6 Projections of Replacement Demands

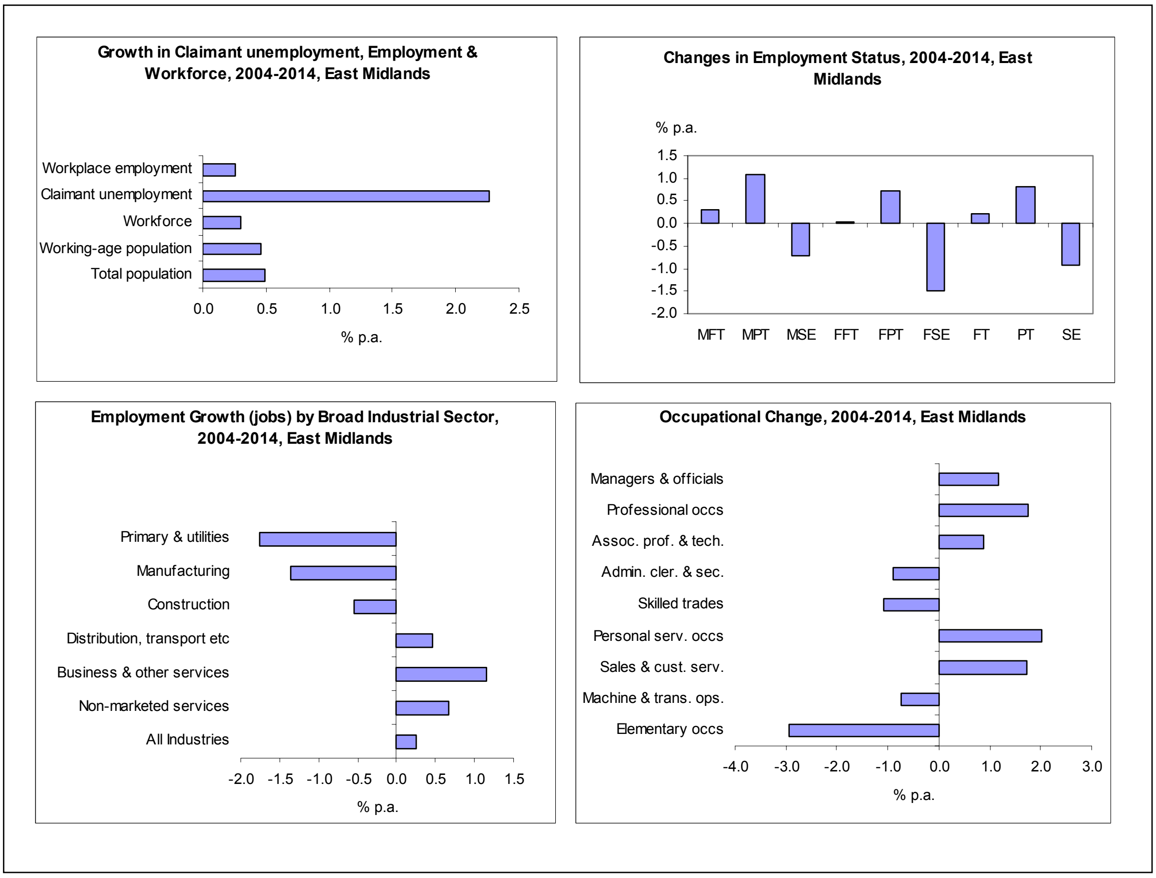
The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Regardless of whether expansion demand projections are for an increase or decrease in employment levels, total requirements are positive for all SOC Major Groups.

Although expansion demand changes suggest that the largest increase in employment levels will be in personal service occupations, the total requirement (including replacement demands) for managers & senior officials (around 150 thousand), professional occupations (120 thousand) and associate professional & technical occupations (nearly 110 thousand) exceeds those for personal service occupations (106 thousand). The next largest total requirements are for sales & customer service occupations (around 90 thousand).

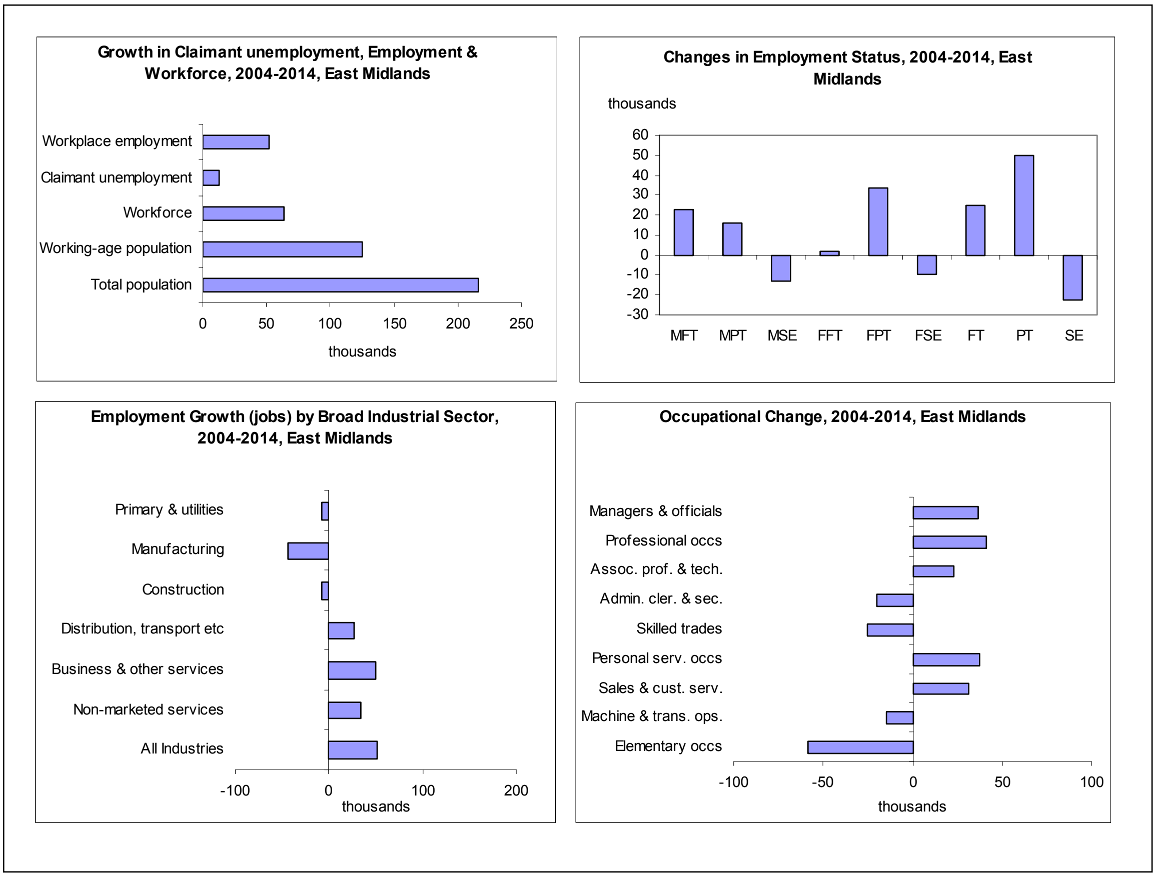
Despite a projected loss of nearly 60 thousand jobs as a result of structural change, a replacement demand of almost 85 thousand jobs elementary occupations translates into a total requirement of around 25 thousand jobs. A replacement demand of around 80 thousand for skilled trades translates into a total requirement for 55 thousand. Similarly, there is a total requirement for about 70 thousand individuals in administrative, clerical & secretarial occupations. In the case of machine & transport operatives there is a total requirement for some 55 thousand additional individuals over the period.

Figure 7.2: Key Changes in the East Midlands, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B..
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 7.3: Key Changes in the East Midlands, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 7.2: Sectoral Change in the East Midlands

	East Midlands											England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	58	43	33	29	3.4	2.3	1.6	1.4	-4	-12.8	-1.4	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	53	8	5	4	3.1	0.4	0.2	0.2	-1	-27.3	-3.1	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	20	15	9	7	1.1	0.8	0.5	0.3	-2	-23.1	-2.6	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*130*	*66*	*47*	*39*	*7.6*	*3.6*	*2.3*	*1.9*	*-8*	*-16.3*	*-1.8*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	51	48	55	49	3.0	2.6	2.7	2.4	-6	-10.5	-1.1	-11.5	-1.2	-10.0	-1.1
4. Engineering	83	71	52	46	4.8	3.8	2.6	2.2	-6	-11.7	-1.2	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	338	298	231	200	19.7	16.2	11.5	9.7	-31	-13.5	-1.4	-11.3	-1.2	-11.3	-1.2
Manufacturing	*471*	*418*	*338*	*295*	*27.6*	*22.7*	*16.8*	*14.3*	*-43*	*-12.8*	*-1.4*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	114	136	148	140	6.7	7.4	7.4	6.8	-8	-5.4	-0.5	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	276	327	352	376	16.1	17.8	17.6	18.3	24	6.8	0.7	7.0	0.7	6.7	0.6
9. Hotels & restaurants	84	100	111	111	4.9	5.4	5.5	5.4	0	-0.2	0.0	6.2	0.6	5.7	0.6
10. Transport & comm.	88	92	116	119	5.2	5.0	5.8	5.8	3	2.8	0.3	2.5	0.3	2.7	0.3
Distribution transport etc.	*448*	*519*	*580*	*607*	*26.2*	*28.2*	*28.9*	*29.5*	*27*	*4.7*	*0.5*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	39	44	44	44	2.3	2.4	2.2	2.1	-1	-1.9	-0.2	3.4	0.3	2.8	0.3
12. Other business activities	123	179	253	289	7.2	9.7	12.6	14.0	35	14.0	1.3	15.5	1.5	15.7	1.5
16. Other services	75	90	108	123	4.4	4.9	5.4	6.0	15	13.8	1.3	8.6	0.8	9.3	0.9
Business & other services	*237*	*312*	*406*	*455*	*13.9*	*17.0*	*20.2*	*22.1*	*49*	*12.2*	*1.2*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	86	76	81	78	5.1	4.1	4.0	3.8	-3	-4.0	-0.4	-2.5	-0.3	-2.3	-0.2
14. Education	99	134	179	194	5.8	7.3	8.9	9.4	14	8.0	0.8	5.7	0.6	5.7	0.6
15. Health & social work	125	181	227	249	7.3	9.8	11.3	12.1	23	10.0	1.0	10.2	1.0	9.7	0.9
Non-marketed services	*311*	*392*	*487*	*520*	*18.2*	*21.3*	*24.3*	*25.3*	*34*	*6.9*	*0.7*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	1711	1842	2004	2056	100.0	100.0	100.0	100.0	52	2.6	0.3	4.6	0.5	4.3	0.4

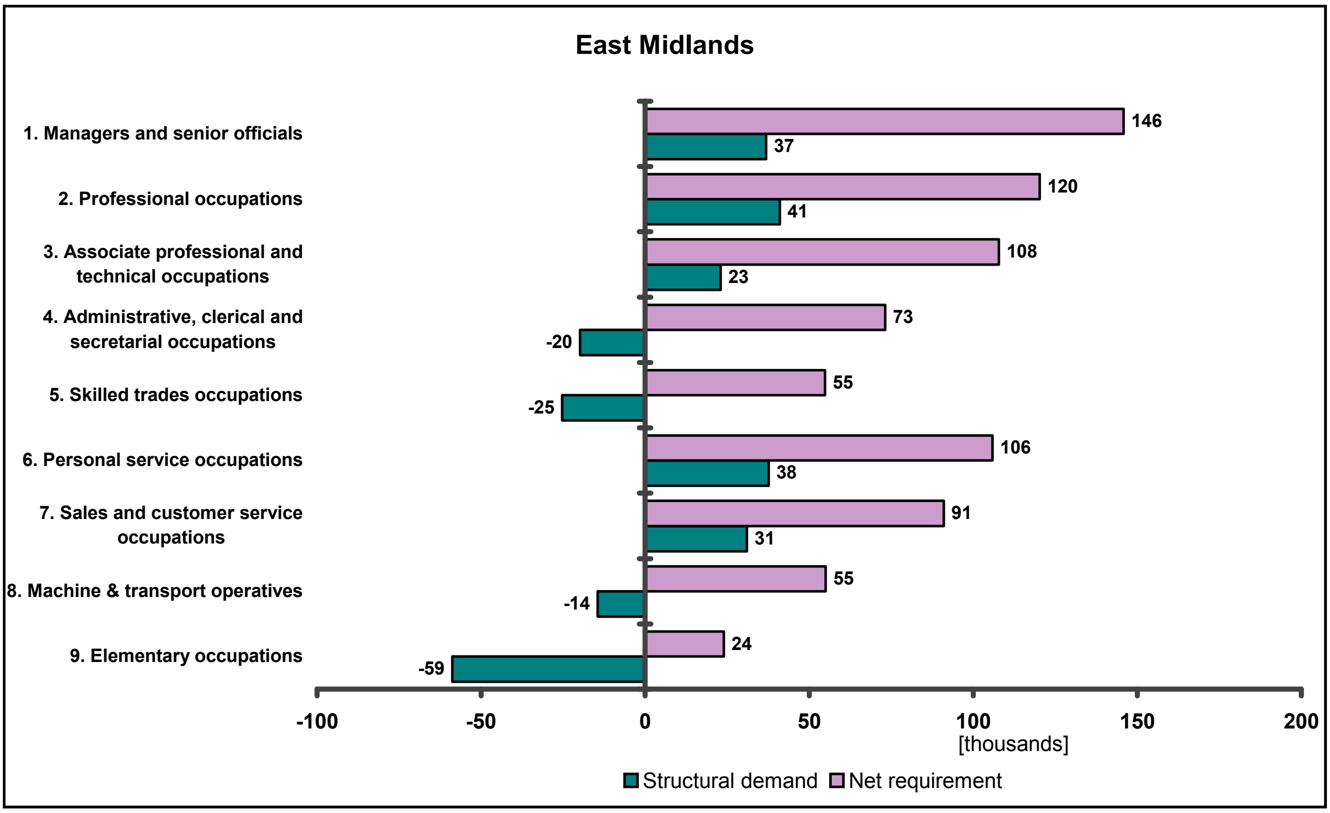
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 7.3: Occupational Change in the East Midlands

	East Midlands											England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
Occupational sub-major group	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
Corporate managers	129	173	228	271	7.5	9.4	11.4	13.2	43	19.0	1.8	20.2	1.9	19.9	1.8
Managers / proprietors	66	73	74	67	3.9	3.9	3.7	3.3	-6	-8.7	-0.9	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	35	46	63	79	2.0	2.5	3.2	3.8	15	24.1	2.2	18.9	1.7	18.3	1.7
Health professionals	8	12	19	24	0.5	0.7	0.9	1.2	5	28.2	2.5	29.8	2.6	29.4	2.6
Teaching & res. Profs.	56	68	87	101	3.3	3.7	4.3	4.9	14	15.9	1.5	19.9	1.8	21.6	2.0
Business professionals	26	35	46	53	1.5	1.9	2.3	2.6	7	14.3	1.3	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	25	30	39	44	1.5	1.6	1.9	2.1	6	14.4	1.4	12.2	1.2	12.4	1.2
Health assoc. profs.	43	55	67	71	2.5	3.0	3.4	3.4	3	5.1	0.5	7.7	0.7	7.8	0.8
Protect. serv. occs	12	15	22	23	0.7	0.8	1.1	1.1	1	4.9	0.5	0.8	0.1	0.1	0.0
Culture, med. & sports	13	20	30	36	0.8	1.1	1.5	1.8	6	20.6	1.9	24.5	2.2	23.5	2.1
Business assoc. profs.	56	74	93	100	3.3	4.0	4.6	4.9	7	7.3	0.7	10.0	1.0	9.2	0.9
Admin & clerical	153	167	175	169	8.9	9.1	8.7	8.2	-6	-3.6	-0.4	-4.2	-0.4	-3.1	-0.3
Secretarial and related	65	68	55	41	3.8	3.7	2.7	2.0	-13	-24.6	-2.8	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	35	27	28	32	2.0	1.4	1.4	1.6	4	14.2	1.3	17.3	1.6	15.5	1.5
Skilled metal & electrical	140	121	93	66	8.2	6.6	4.7	3.2	-28	-29.6	-3.5	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	79	78	78	85	4.6	4.2	3.9	4.1	7	9.1	0.9	20.2	1.9	19.4	1.8
Other skilled trades	65	58	43	34	3.8	3.1	2.2	1.7	-9	-20.3	-2.2	-14.7	-1.6	-14.6	-1.6
Caring personal service	36	70	134	169	2.1	3.8	6.7	8.2	35	26.1	2.3	23.8	2.2	22.8	2.1
Leisure occupations	30	35	36	38	1.8	1.9	1.8	1.9	3	7.7	0.7	7.3	0.7	6.7	0.7
Sales occupations	88	113	139	162	5.1	6.1	7.0	7.9	23	16.4	1.5	13.0	1.2	12.0	1.1
Customer service occs.	8	13	27	36	0.5	0.7	1.4	1.7	8	29.8	2.6	31.3	2.8	32.2	2.8
Process machine ops.	190	159	119	92	11.1	8.6	5.9	4.5	-27	-22.3	-2.5	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	72	73	80	92	4.2	4.0	4.0	4.5	12	15.2	1.4	18.5	1.7	17.2	1.6
Elementary: trades	125	105	83	53	7.3	5.7	4.1	2.6	-30	-36.2	-4.4	-36.6	-4.4	-35.5	-4.3
Elementary: service	156	155	145	116	9.1	8.4	7.2	5.7	-29	-19.9	-2.2	-12.2	-1.3	-12.9	-1.4
All occupations	1711	1842	2004	2056	100.0	100.0	100.0	100.0	52	2.6	0.3	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 7.4: Replacement Demands in the East Midlands



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

8. YORKSHIRE & the HUMBER

8.1 Overview

The total population of Yorkshire & the Humber is projected to increase at a similar rate to the UK average. The annual average rates of expected labour force and employment growth are also similar to those across the UK as a whole. At the local level, a faster than average rate of employment growth in North Yorkshire contrasts with a slower than average rate of increase in South Yorkshire.

Employment losses are projected in primary & utilities, manufacturing, and in construction. Projected employment growth in distribution, transport etc and in business & other services is expected to rise at a faster rate than the UK average.

The largest projected gains in employment by SOC Major Group are in professional occupations and managers & officials. sales and customer service occupations. Projected replacement demands are such that total requirements for all SOC Major Groups are positive.

8.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 8.1 provides a general overview, while Figure 8.1 presents a graphical summary of the supply side. Figures 8.2 and 8.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population

The total population of Yorkshire & the Humber is projected to increase by just under 200 thousand between 2004 and 2014, to reach 5.2 million.

Population 16+

The 16+ population in Yorkshire & the Humber is expected to grow by 6.2 per cent between 2004 and 2014. The trend and rates of growth over 2004-09 (3.3 per cent) and 2009-14 (2.7 per cent) are expected to match those for the UK.

Working-age Population

The working age population is projected to increase by around 160 thousand to reach 3.3 million by 2014.

***Work*force**

The workforce is projected to rise by just over 110 thousand to reach almost 2.7 million by 2014.

Labour force

The labour force is projected to rise by around 130 thousand, with females accounting for the bulk of the rise.

ILO unemployment

After falling by 28 per cent between 1999 and 2004, unemployment in Yorkshire & the Humber is expected to rise slightly (by 40 thousand) between 2004 and 2009, before falling back again slightly. This pattern is broadly in line with the rate of increase for the UK. This is expected to affect both males and females.

Claimant Unemployment

Claimant unemployment is expected to fall slightly between 2004 and 2014. This rate of increase is akin to the UK average. By 2014, claimant unemployment is expected to stand at just over 70 thousand.

Employed Residents

In Yorkshire & the Humber, the number of employed residents is expected to rise by 4 per cent over 2004-09 and 2 per cent over 2009-14. Employment on this basis is expected to increase by almost 6 per cent overall between 2004 and 2014, slightly ahead of the UK rate (4.6 per cent). The growth in male employment is expected to be stronger than that for the UK.

Workplace Employment

Between 2004 and 2014, workplace employment is projected to increase by almost 100 thousand to just 2.4 million. This is an annual growth rate of 0.4 per cent over the period from 2004 to 2014. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual

Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is "double jobbing" (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In Yorkshire & the Humber the labour market residual is just over 100 thousand. This mainly reflects double jobbing.

Figure 8.1: Changes in Population and the Labour Force in Yorkshire & the Humber

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 8.1: Population and Labour Force [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	2,412	2,454	2,502	2,551	1.7	2.0	2.0
Population 16+	1,886	1,949	2,021	2,081	3.3	3.7	2.9
Labour Force	1,295	1,326	1,373	1,390	2.4	3.5	1.2
Activity Rate	68.7	68.1	67.9	66.8	-0.6	-0.2	-1.1
ILO Unemployment	105	72	78	71	-31.4	8.5	-9.7
ILO Unemployment rate (%)	8.1	5.4	5.7	5.1	-2.7	0.3	-0.6
Employed Residents (heads)	1,196	1,247	1,295	1,319	4.3	3.8	1.9
Labour Market Residual (2)	53	96	90	95			
Female							
Total Population	2,545	2,575	2,616	2,663	1.2	1.6	1.8
Population 16+	2,041	2,090	2,151	2,206	2.4	2.9	2.6
Labour Force	1,073	1,116	1,174	1,194	4.0	5.2	1.7
Activity Rate	52.6	53.4	54.6	54.1	0.8	1.2	-0.5
ILO Unemployment	61	46	50	45	-24.6	8.5	-9.6
ILO Unemployment rate (%)	5.7	4.1	4.2	3.8	-1.6	0.1	-0.5
Employed Residents (heads)	1,006	1,077	1,124	1,149	7.1	4.4	2.2
Labour Market Residual (2)	54	39	20	10			
Total							
Total Population	4,956	5,028	5,118	5,214	1.5	1.8	1.9
Population 16+	3,927	4,038	4,172	4,287	2.8	3.3	2.7
Working-age Population	3,006	3,090	3,154	3,252	2.8	2.1	3.1
Labour Force	2,368	2,442	2,547	2,584	3.1	4.3	1.4
Workforce	2,445	2,544	2,624	2,658	4.0	3.1	1.3
Activity Rate	60.3	60.5	61.1	60.3	0.2	0.6	-0.8
ILO Unemployment	166	118	128	116	-28.9	8.5	-9.7
ILO Unemployment rate (%)	7.0	4.8	5.0	4.5	-2.2	0.2	-0.6
Claimant Unemployment	123	74	80	72	-40.2	8.4	-9.7
Claimant Unemployment rate	4.1	2.4	2.5	2.2	-1.7	0.1	-0.3
Employed Residents (heads)	2,202	2,324	2,419	2,468	5.5	4.1	2.0
Workplace employment (jobs)	2,322	2,388	2,487	2,530	2.9	4.1	1.7
Labour Market Residual[2]	107	134	110	105			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

8.3 Industrial Employment Structure

Overview of broad sectors

Illustrating the wider long-term changes at the sectoral level, Yorkshire and Humber is projected to have around 100 thousand additional jobs by 2014. Broadly speaking, the main employment losses are projected to occur in the primary sector and utilities sector, in manufacturing and in the construction sector. Manufacturing is projected to witness the severest decline, with the loss of almost 30 thousand jobs. However, these projected losses are outweighed by the projected employment gains in distribution, transport etc, business and other services, and non-marketed services. Business and other services are projected to experience the greatest growth of jobs, with an increase of 87 thousand expected over the period to 2014.

Primary sector & utilities

Employment in the primary sector & utilities sector is expected to decline at a faster rate (21.9 per cent) than the UK average (15.6 per cent). In agriculture, hunting, forestry & fishing, the projected rate of employment loss is 7 thousand jobs by 2014. Electricity, gas & water and mining & quarrying are projected to lose 2 thousand jobs each.

All local LSC areas are projected to share in this employment decline. The fastest rates of projected job loss are in Humberside and West Yorkshire which are projected to lose employment at rates of around 3 per cent per annum.

90 per cent of job losses are projected to fall on males.

Manufacturing

Manufacturing is projected to lose 30 thousand jobs between 2004 and 2014, at a projected rate of 2.3 per cent per annum. Within this broad sector, food, drink & tobacco is expected to lose over 5 thousand jobs. With employment in engineering staying fairly constant, the major loss is accounted for by rest of manufacturing, which is projected to lose around 23 thousand jobs.

All local LSC areas in Yorkshire & the Humber are projected to witness slower rates of employment decline than the England average of 1.1 per cent per annum.

Twice as many job losses are projected to affect females as males in this sector.

Construction

Employment in construction is projected to fall by 20 thousand (a fall of 1.3 per cent per annum between 2004 and 2014). This is notably faster than the 0.3 per cent loss and 0.4 per cent loss per annum projected for England and the UK respectively. By 2014, it is expected that just over 155 thousand people will be employed in this sector.

All local LSC areas share in this employment decline, with South Yorkshire projected the to witness the fastest annual rates of loss at 1.6 per cent. North Yorkshire has the slowest rate of annual employment loss at just 0.7 per cent.

The vast majority of job losses are projected to affect males.

Distribution, transport etc.

Distribution, transport etc. is projected to sustain an increase of 45 thousand jobs between 2004 and 2014 within Yorkshire and the Humber (a 6.1 per cent change over the period, which is similar to the England average). Retail distribution shows the largest projected increase in employment levels (23 thousand). Hotels and restaurants show an increase of 0.9 per cent per annum, which is the highest per cent per annum change within this sector as a whole, and comfortably outstrips the 0.6 per cent per annum projected in England and the UK. Finally transport storage and communication is projected to add 13 thousand jobs by 2014.

Only West Yorkshire has a projected annual rate of employment increase which is slower than the England average. Nevertheless, in 2014 West Yorkshire is projected to remain by far the biggest employer in this sector in the region, employing over 320 thousand individuals.

18 thousand men, and 26 thousand women are expected to benefit from these projected employment increases.

Business & other services

Of all the broad sectors, business and other services is projected to be the biggest gainer in terms of absolute employment for Yorkshire and the Humber. The projected annual change per annum of 1.5 per cent is matched only by the West Midlands and exceeds all other UK regions. Banking and insurance add less than 5 thousand jobs. Other business activities is the single greatest contributor to overall employment increase adding over 85 thousand jobs by 2014. Finally other services are expected to contribute an additional 25 thousand jobs to this sector.

All local LSC areas exceed the annual rate of employment increase for England, with the exception of Humberside, which has the lowest annual rate of 1.0 per cent in the region.

Males are expected to account for 70 thousand of the 87 thousand extra jobs expected between 2004 and 2014.

Non-marketed services

Employment in non-marketed services is projected to increase by 25 thousand between 2004 and 2014. Within this broad sector, public administration & defence is expected to lose 5 thousand jobs. Education is projected to add around 10 thousand jobs, which means that the highest increase of jobs, over 20 thousand, is expected to come from health and social work.

All local LSC areas are projected to gain employment at a slower rate than the England average (0.6 per cent per annum).

The employment increase in this sector is expected to provide an additional 10 thousand female jobs.

8.4 Change in Employment by Gender and Employment Status

Males

In Yorkshire and the Humber, male full time employment is projected to increase by 4.3 per cent over the period to 2014, to reach almost 1 million.

Male part-time employment is projected to increase by 24 per cent, which is the highest projected increase of any region in England. By 2014 it is expected that there will be over 200 thousand part-time jobs in the region.

At the local LSC level, North Yorkshire is projected to have the highest annual average rate of increase of male full time employment between 2004 and 2014. All local LSC areas are projected to increase their share of male part-time employment at a faster annual rate than England.

Females

Female full-time employment is projected to increase by 3.4 per cent to exceed 500 thousand by 2014.

Part-time employment is projected to increase by 6.4 per cent, to reach 580 thousand.

At local LSC area level, only Humberside is projected to lose full-time jobs for females (0.9 per cent per annum). The largest relative gains in part-time work are projected for South Yorkshire at 12.8 per cent.

8.5 Occupational Prospects

Overview

This section concentrates on employment projections for different occupations. It should be remembered that such 'structural demand' provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by 'replacement demand'.

Between 2004 and 2014, 40 thousand additional jobs are projected for managers and senior officials; 45 thousand jobs in professional occupations; 20 thousand in associate professional and technical occupations; 2 thousand jobs in administrative, clerical and secretarial occupations; 40 thousand in personal service occupations, and 35 thousand in sales and customer service occupations.

Job losses are projected for skilled trades occupations (15 thousand), machine and transport operatives (7 thousand) and elementary occupations (67 thousand).

1. Managers & Senior Officials

An additional 40 thousand jobs are projected for managers & senior officials between 2004 and 2014, which is a 1.2 per cent per annum change over the period. All of the job increases for this SOC Major Group are expected to come from corporate managers (with 50 thousand extra jobs expected). A loss of 5 thousand jobs is projected for managers/ proprietors, which is an annual 6.6 per cent change, which is slightly lower than declines projected in England and the UK.

At the local LSC level, North Yorkshire is projected to experience the greatest annual employment rise of managers and senior officials (1.7 per cent) and South Yorkshire the slowest (0.9 per cent). North Yorkshire is the only part of the region where the projected rate of increase is faster than that projected for England.

Over 30 thousand jobs are expected to be gained by females in this occupation.

2. Professional occupations

The majority of the expected additional 45 thousand jobs are projected to come from science and technology professionals (15 thousand) and teaching and research professionals (15 thousand). Both business professionals and health professionals are expected to gain less than 10 thousand additional jobs.

West Yorkshire will continue to have, by far, the largest concentration of professional occupations in Yorkshire and Humber. However, North Yorkshire shows the highest rate of increase (1.9 per cent per annum) in the region, and is the only local LSC area in the region where the projected rate of growth exceeds the national average.

Over 20 thousand jobs are projected to be gained by males. At 1.5 pr cent per annum, this change is faster than that projected for the UK.

3. Associate professional & technical occupations

Yorkshire and the Humber is projected to see the number of jobs in this occupational group increase by 20 thousand. This increase is the result of a projected increase of 10 thousand jobs for science and technology associate professionals, gains of around 5 thousand jobs in both culture, media & sports organisations and business associate professionals, and 2 thousand extra jobs in protective service occupations. Health associate professionals is the only occupation within this SOC Major Group expected to lose jobs (2 thousand).

The projected increase of 1.1 per cent per annum for England exceeds the rate of growth expected in all local LSC areas in Yorkshire and the Humber. North Yorkshire and West Yorkshire have the fastest annual increase projected at 0.8 per cent.

Male employment is expected to account for 17 thousand of the additional jobs.

4. Administrative, clerical and secretarial occupations

Despite only a modest projected increase of just 2 thousand jobs, employment gains in Yorkshire and Humber outstrip those elsewhere, since employment decline is the norm. The annual 0.1 per cent increase in this occupation contrasts with the 1.0 per cent per annum loss for England, and 0.9 per cent per annum loss for the UK.

At the LSC level only Humberside is projected to lose jobs (an annual rate of 0.1 per cent).

15 thousand female jobs are projected to be lost between 2004 and 2014. All expected employment gains are accounted for by males.

5. Skilled trades occupations

Consistent with the projections throughout England and the UK as a whole, jobs losses are projected for skilled trades in Yorkshire and the Humber. The absolute loss of 10 thousand jobs indicates an annual loss of 0.4 per cent, which is faster than that projected for the UK. Job gains are expected in both skilled agricultural trades (5 thousand) and skilled construction & building (18 thousand). The biggest loss is projected loss is for skilled metal & electrical trades (30 thousand), with other skilled trades losing around 7 thousand jobs.

Of the local LSC areas, only North Yorkshire is projected to gain jobs between 2004 and 2014. The fastest losses are expected in South Yorkshire and Humberside, at 0.7 per cent per annum.

Males are projected to lose twice as many jobs as females between 2004 and 2014.

6. Personal Services occupations

This occupation is expected to see a significant increase in the total number of jobs: around 40 thousand. The majority of these jobs are expected to come from caring personal services (35 thousand) with leisure occupations expected to add 5 thousand additional jobs.

By 2014, West Yorkshire is projected to have almost 100 thousand jobs in this occupation. Only Humberside is projected to have a slower rate of increase (1.2 per cent per annum) than the England average.

The vast majority of additional jobs are projected to be taken by females.

7. Sales & customer service occupations

The number of jobs in sales and customer service occupations is projected to increase by around 35 thousand between 2004 and 2014. Caring personal service occupations are projected to have the greatest increase in employment (under 35 thousand).

West Yorkshire, South Yorkshire and Humberside are all projected to have greater rates of employment increase in this SOC Major Group than England.

The majority of these sales and customer service jobs (23 thousand) are expected to be taken by females.

8. Machine & transport operatives

A loss of just under 7 thousand jobs is projected for Yorkshire and the Humber between 2004 and 2014. This is the result of a gain of under 20 thousand jobs for drivers & other operatives being offset by a projected loss of 25 thousand jobs for process machine operatives.

With the exception of North Yorkshire, all LSC areas are projected to lose employment in this occupation between 2004 and 2014.

While 10 thousand jobs are expected to be gained by males, job losses for females are expected to amount to around 18 thousand.

9. Elementary Occupations

As with most other regions, projected jobs losses in Yorkshire and Humber are greatest for elementary occupations. The projected loss of 67 thousand jobs is a function of the loss of 35 thousand jobs in elementary trades, and the loss of 32 thousand jobs in elementary services.

At the local LSC level the fastest annual rate of employment loss is projected in West Yorkshire at 2.8 per cent. All local LSC areas have faster rates of employment loss than the England average.

Job losses are projected to fall disproportionately upon females.

8.6 Projections of Replacement Demands

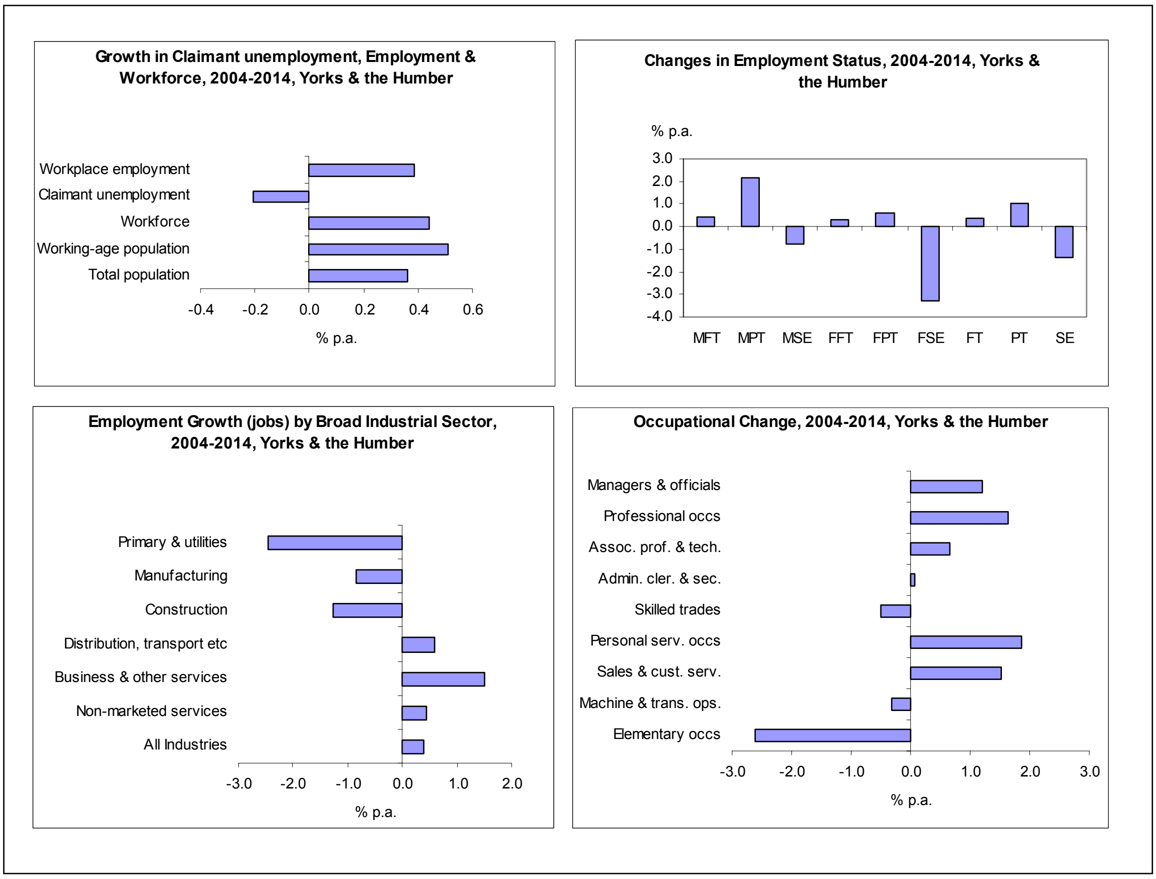
The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Regardless of whether expansion demand projections suggest an increase or decrease in employment levels, in all SOC Major groups, total requirements are positive. Taking all occupations collectively the replacement demand for Yorkshire & the Humber indicates an additional 884 thousand jobs.

Overall requirements of well in excess of 100 thousand jobs are projected for managers and senior officials (nearly 170 thousand), professional occupations (around 140 thousand), associate professional & technical occupations (about 120 thousand), personal service occupations (around 115 thousand) and sales & customer service occupations (just over 110 thousand).

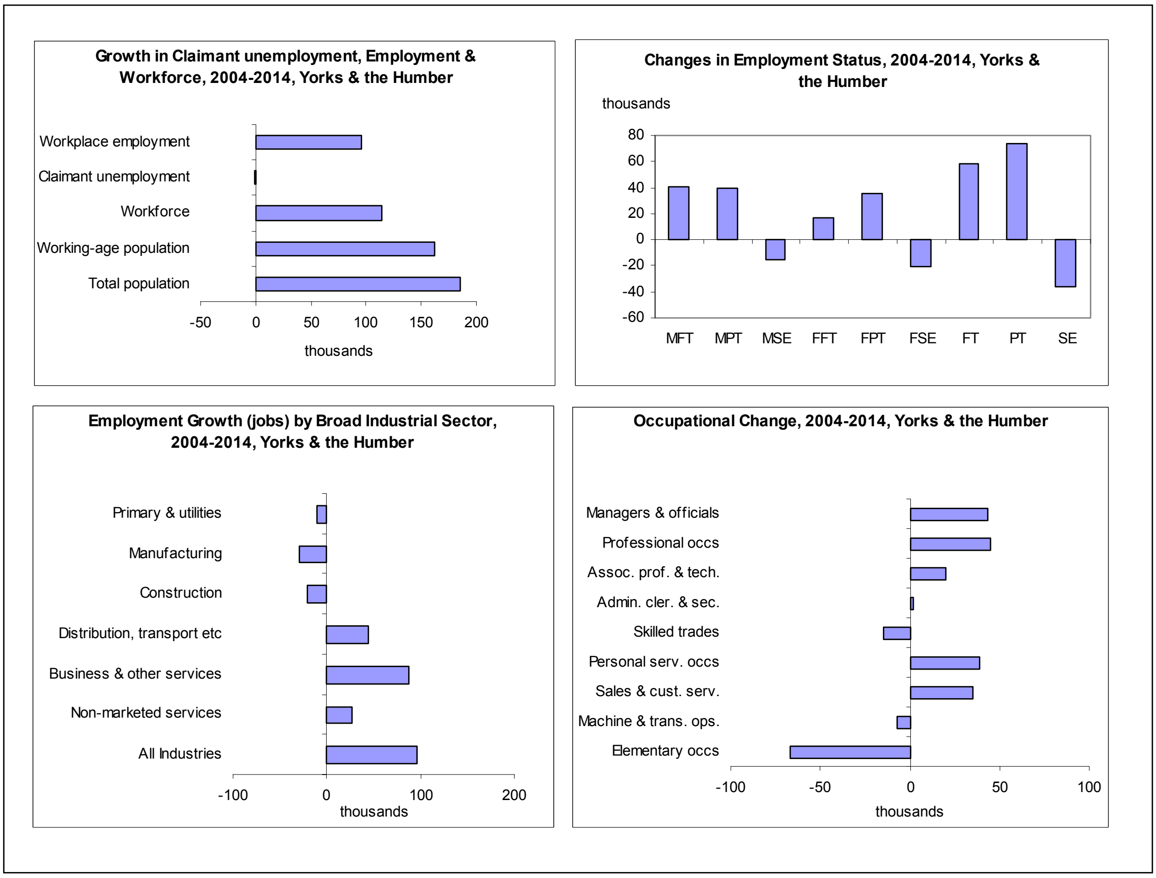
Of all those occupations projected to experience negative expansion demands, administrative, clerical & secretarial occupations have the highest replacement demands (around 120 thousand). Elementary occupations, despite having a negative expansion demand of more than 65 thousand, has a replacement demand of over 100 thousand, thus indicating a need for an additional 37 thousand jobs.

Figure 8.2: Key Changes in Yorkshire and the Humber, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 8.23: Key Changes in Yorkshire and the Humber, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 8.2: Sectoral Change in Yorkshire and the Humber

	Yorkshire and the Humber											England		UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	49	47	36	28	2.3	2.1	1.5	1.1	-7	-20.7	-2.3	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	66	8	6	5	3.1	0.3	0.3	0.2	-2	-25.2	-2.9	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	24	13	7	6	1.1	0.6	0.3	0.2	-2	-24.8	-2.8	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*139*	*67*	*49*	*38*	*6.6*	*3.0*	*2.0*	*1.5*	*-11*	*-21.9*	*-2.4*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	75	63	59	53	3.5	2.8	2.4	2.1	-6	-10.1	-1.1	-11.5	-1.2	-10.0	-1.1
4. Engineering	71	62	53	53	3.3	2.8	2.1	2.1	0	0.1	0.0	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	334	309	249	226	15.8	13.8	10.2	8.9	-23	-9.3	-1.0	-11.3	-1.2	-11.3	-1.2
Manufacturing	*479*	*434*	*361*	*332*	*22.7*	*19.4*	*14.8*	*13.1*	*-29*	*-8.1*	*-0.8*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	153	151	177	156	7.2	6.7	7.2	6.1	-21	-12.0	-1.3	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	380	391	431	454	18.0	17.4	17.6	17.9	23	5.3	0.5	7.0	0.7	6.7	0.6
9. Hotels & restaurants	126	140	141	154	6.0	6.2	5.8	6.1	13	9.0	0.9	6.2	0.6	5.7	0.6
10. Transport & comm.	126	124	152	161	6.0	5.5	6.2	6.3	8	5.5	0.5	2.5	0.3	2.7	0.3
Distribution transport etc.	*633*	*654*	*725*	*769*	*29.9*	*29.2*	*29.6*	*30.3*	*44*	*6.1*	*0.6*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	54	77	86	90	2.6	3.4	3.5	3.5	4	5.0	0.5	3.4	0.3	2.8	0.3
12. Other business activities	155	222	320	378	7.3	9.9	13.1	14.9	58	18.2	1.7	15.5	1.5	15.7	1.5
16. Other services	95	118	136	160	4.5	5.2	5.6	6.3	24	17.9	1.7	8.6	0.8	9.3	0.9
Business & other services	*304*	*417*	*541*	*628*	*14.4*	*18.6*	*22.2*	*24.7*	*87*	*16.0*	*1.5*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	115	110	113	109	5.5	4.9	4.6	4.3	-4	-3.6	-0.4	-2.5	-0.3	-2.3	-0.2
14. Education	129	177	208	217	6.1	7.9	8.5	8.5	9	4.2	0.4	5.7	0.6	5.7	0.6
15. Health & social work	162	231	270	291	7.7	10.3	11.0	11.5	22	8.0	0.8	10.2	1.0	9.7	0.9
Non-marketed services	*407*	*518*	*590*	*617*	*19.2*	*23.1*	*24.2*	*24.3*	*26*	*4.5*	*0.4*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	2114	2241	2444	2540	100.0	100.0	100.0	100.0	96	3.9	0.4	4.6	0.5	4.3	0.4

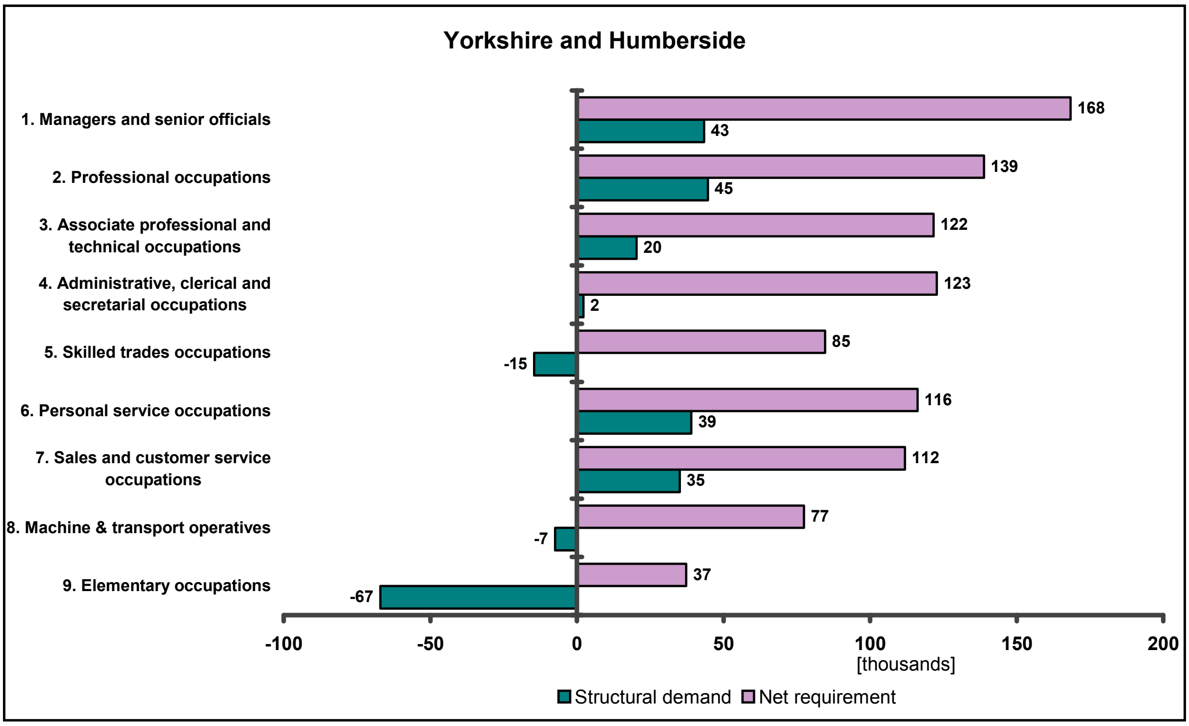
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 8.3: Occupational Change in Yorkshire and the Humber

	Yorkshire & the Humber											England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
					% of	% of	% of	% of		%	% per	%	% per	%	% per
Occupational sub-major group	000s	000s	000s	000s	total	total	total	total	000s	change	annum	change	annum	change	annum
Corporate managers	157	196	257	306	7.4	8.8	10.5	12.1	49	19.2	1.8	20.2	1.9	19.9	1.8
Managers / proprietors	88	89	87	82	4.2	4.0	3.6	3.2	-6	-6.6	-0.7	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	37	46	65	81	1.7	2.0	2.6	3.2	16	24.9	2.2	18.9	1.7	18.3	1.7
Health professionals	12	16	22	28	0.6	0.7	0.9	1.1	6	27.0	2.4	29.8	2.6	29.4	2.6
Teaching & res. Profs.	72	93	110	125	3.4	4.2	4.5	4.9	15	13.5	1.3	19.9	1.8	21.6	2.0
Business professionals	34	42	55	63	1.6	1.9	2.3	2.5	8	14.0	1.3	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	30	36	49	59	1.4	1.6	2.0	2.3	10	20.7	1.9	12.2	1.2	12.4	1.2
Health assoc. profs.	57	70	78	76	2.7	3.1	3.2	3.0	-2	-2.3	-0.2	7.7	0.7	7.8	0.8
Protect. serv. occs	17	22	33	35	0.8	1.0	1.4	1.4	2	4.8	0.5	0.8	0.1	0.1	0.0
Culture, med. & sports	18	25	37	42	0.8	1.1	1.5	1.7	5	12.5	1.2	24.5	2.2	23.5	2.1
Business assoc. profs.	72	87	107	113	3.4	3.9	4.4	4.5	6	5.5	0.5	10.0	1.0	9.2	0.9
Admin & clerical	190	217	233	248	9.0	9.7	9.5	9.8	15	6.4	0.6	-4.2	-0.4	-3.1	-0.3
Secretarial and related	77	86	69	56	3.7	3.8	2.8	2.2	-13	-18.5	-2.0	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	33	28	32	38	1.5	1.3	1.3	1.5	5	16.9	1.6	17.3	1.6	15.5	1.5
Skilled metal & electrical	166	134	108	77	7.8	6.0	4.4	3.0	-31	-28.7	-3.3	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	99	92	105	124	4.7	4.1	4.3	4.9	18	17.6	1.6	20.2	1.9	19.4	1.8
Other skilled trades	71	68	55	48	3.3	3.0	2.3	1.9	-7	-13.4	-1.4	-14.7	-1.6	-14.6	-1.6
Caring personal service	47	88	147	182	2.2	3.9	6.0	7.2	34	23.4	2.1	23.8	2.2	22.8	2.1
Leisure occupations	41	45	44	49	1.9	2.0	1.8	1.9	5	10.4	1.0	7.3	0.7	6.7	0.7
Sales occupations	125	147	182	202	5.9	6.6	7.4	8.0	21	11.4	1.1	13.0	1.2	12.0	1.1
Customer service occs.	11	17	35	49	0.5	0.7	1.4	1.9	14	41.3	3.5	31.3	2.8	32.2	2.8
Process machine ops.	194	164	137	110	9.2	7.3	5.6	4.3	-26	-19.1	-2.1	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	98	94	106	125	4.6	4.2	4.4	4.9	19	17.6	1.6	18.5	1.7	17.2	1.6
Elementary: trades	155	126	103	69	7.3	5.6	4.2	2.7	-35	-33.4	-4.0	-36.6	-4.4	-35.5	-4.3
Elementary: service	217	212	185	153	10.3	9.4	7.6	6.0	-32	-17.5	-1.9	-12.2	-1.3	-12.9	-1.4
All occupations	2114	2241	2444	2540	100.0	100.0	100.0	100.0	96	3.9	0.4	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 8.4: Replacement Demands in Yorkshire and the Humber



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

9. NORTH WEST

9.1 Overview

The North West was the cradle of the Industrial Revolution and is the most densely populated region after London, including two core cities: Manchester and Liverpool. It also includes rural areas – in much of Cumbria and in parts of Cheshire and Lancashire.

A focus on the North West's economic structure highlights two distinct zones. The core zone embraces the Lancashire-Cheshire Plain, upon which the historically industrial powerhouses of Greater Manchester and Liverpool are situated. This predominantly urban and industrial zone is complemented by neighbouring coastal towns, of which Blackpool remains the largest and most well-known. The second region is dominated by the rural uplands of Cumbria and the Pennines. This peripheral zone retains a largely traditional agricultural economy. Tourism remains a key feature of the Lake District.

Despite small increases in population levels, the labour force in the North West is expected to increase over the period to 2014, by some 110 thousand.

For all the broad sectors where employment growth is projected over the period to 2014, the rate of increase is less favourable in the North West than the projected average gains for the UK. In absolute terms, the expected loss of 50 thousand manufacturing jobs is the largest employment loss projected for any region bar the West Midlands.

The North West is projected to suffer job losses in administrative, clerical & secretarial occupations, skilled trades occupations, machine & transport operatives and elementary occupations. All other occupations are expected to see job gains.

9.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 9.1 provides a general overview, while Figure 9.1 presents a graphical summary of the supply side. Figures 9.2 and 9.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population
Compared with population growth across the UK as a whole of 0.4 per cent per annum, the total population in the North West is projected to increase at half that rate to reach 6.92 million between 2004 and 2014.

Population 16+
The 16+ population is expected to increase by 4 per cent over 2004-14, slower than the 6.2 per cent for the UK.

Working -age Population
The working age population is projected to rise by about 110 thousand, to around 4.3 million by 2014.

Workforce
The workforce is projected to increase by around 120 thousand people to reach just over 3.6 million by 2014. This represents a 0.4 per cent per annum growth rate which is marginally lower than the projected increases for both England and the UK.

Labour force
The labour force in the North West is expected to increase by 110 thousand between 2004 and 2014, an increase of 3.3 per cent which is greater than the 2.1 per cent increase in the North East.

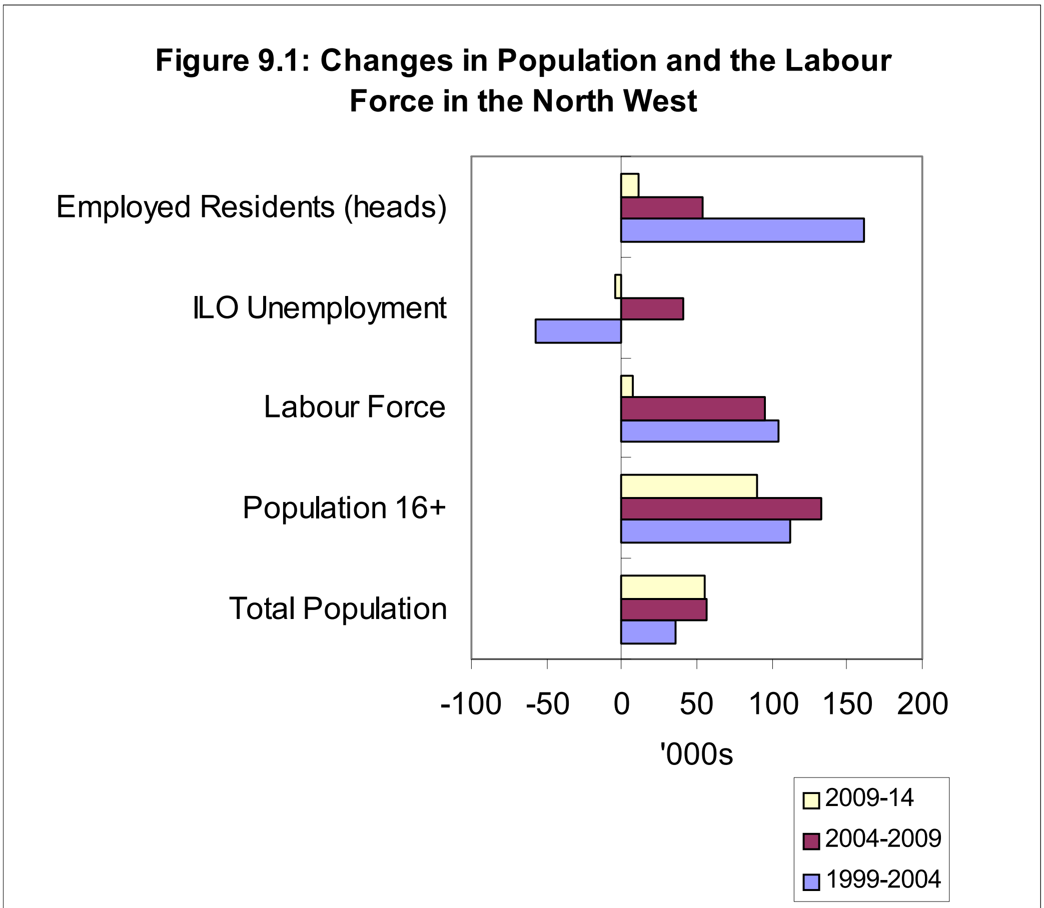
ILO unemployment
ILO unemployment is projected to increase up to 2009 before falling back slightly, ending up some 40 thousand higher. Female unemployment in the North West is expected to rise by 16 thousand over the same period.

Claimant Unemployment
Claimant unemployment is projected to increase slightly, reaching almost 125 thousand. This rate of growth exceeds that of the UK as a whole.

Employed Residents
The number of male residents is expected to increase by 1.7 per cent over 2004-09 but by only 0.5 per cent over 2009-14, just ahead of the UK rates of increase. Female employment, by contrast, is expected to increase by only 0.4 per cent over 2004-09 and barely at all over 2009-14; well below rates expected for women in the UK as a whole.

Workplace Employment
Total workplace employment in the North West is projected to increase by around 100 thousand between 2004 and 2014, to reach 3.4 million. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is “double jobbing” (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In the North West the labour market residual is around a quarter of a million. This mainly reflects double jobbing.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 9.1: Population and Labour Force[1]

	1999	2004	2009	2014	1999-2004	2004-09	2009-14
					percentage change over period		
Male							
Total Population	3,289	3,318	3,362	3,401	0.9	1.3	1.2
Population 16+	2,560	2,626	2,711	2,768	2.6	3.2	2.1
Labour Force	1,727	1,744	1,794	1,800	1.0	2.8	0.4
Activity Rate	67.5	66.4	66.2	65.0	-1.1	-0.2	-1.2
ILO Unemployment	139	89	113	111	-36.0	26.7	-2.0
ILO Unemployment rate (%)	8.1	5.1	6.3	6.1	-2.9	1.2	-0.1
Employed Residents (heads)	1,586	1,652	1,681	1,689	4.2	1.7	0.5
Labour Market Residual (2)	114	142	153	186			
Female							
Total Population	3,485	3,492	3,503	3,519	0.2	0.3	0.5
Population 16+	2,790	2,835	2,883	2,916	1.6	1.7	1.2
Labour Force	1,423	1,510	1,555	1,556	6.1	3.0	0.0
Activity Rate	51.0	53.3	53.9	53.4	2.3	0.6	-0.5
ILO Unemployment	71	64	81	80	-9.9	26.7	-2.0
ILO Unemployment rate (%)	5.0	4.2	5.2	5.1	-0.7	1.0	-0.1
Employed Residents (heads)	1,354	1,449	1,474	1,477	7.0	1.7	0.2
Labour Market Residual (2)	130	119	103	112			
Total							
Total Population	6,773	6,809	6,865	6,920	0.5	0.8	0.8
Population 16+	5,349	5,461	5,594	5,684	2.1	2.4	1.6
Working-age Population	4,100	4,178	4,219	4,290	1.9	1.0	1.7
Labour Force	3,150	3,254	3,349	3,356	3.3	2.9	0.2
Workforce	3,353	3,476	3,554	3,602	3.7	2.3	1.4
Activity Rate	58.9	59.6	59.9	59.0	0.7	0.3	-0.9
ILO Unemployment	210	153	194	190	-27.1	26.8	-2.0
ILO Unemployment rate (%)	6.7	4.7	5.8	5.7	-2.0	1.1	-0.1
Claimant Unemployment	154	99	126	123	-35.5	26.8	-2.0
Claimant Unemployment rate	3.8	2.4	3.0	2.9	-1.4	0.6	-0.1
Employed Residents (heads)	2,940	3,101	3,155	3,166	5.5	1.7	0.3
Workplace employment (jobs)	3,068	3,320	3,394	3,448	8.2	2.2	1.6
Labour Market Residual[2]	244	261	256	298			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

9.3 Industrial Employment Structure

Overview of broad sectors

Focusing on the broad sectoral level, the picture revealed is one of employment losses in the primary sector & utilities, construction and manufacturing. Employment gains are projected for, distribution, transport etc., business & other services and non-marketed services sectors.

In absolute terms manufacturing suffers the most marked decline, with the projected loss of around 50 thousand jobs. This contrasts with an expected employment gain of around 90 thousand jobs in the business & other services sector alone.

Primary sector & utilities

The primary & utilities sector is expected to lose around 5 thousand jobs by the year 2014. Electricity, gas & water are projected to see the fastest rate of loss to 2014. Employment in mining & quarrying is expected to stay stable. Agriculture, hunting forestry & fishing, is projected to lose around 2 thousand jobs.

Within the North West, Cumbria and Cheshire & Warrington record the greatest concentration of jobs in this broad sector.

Projected job losses are expected to affect males primarily, with female employment expected to increase by 1 thousand in this sector by 2014.

Manufacturing

Manufacturing is projected to lose around 50 thousand jobs over the period to 2014. This is one of the highest rates of loss of all the regions in the UK. Employment in food drink & tobacco is projected to fall to 55 thousand. Jobs losses are overwhelmingly concentrated in the rest of manufacturing, with nearly 45 thousand jobs expected to be lost over the decade. This represents a rate of loss of 1.4 per cent per annum, which is in excess of the UK average. One thousand jobs are projected to be lost in engineering. Employment in food, drink & tobacco is expected to fall by 5 thousand jobs

At local level the variation in projected rates of job loss ranges from 8.2 per cent per annum in Cumbria to 12.9 per cent in Cheshire & Warrington.

Job losses are projected to affect males and females fairly equally, with females losing five thousand more jobs than males.

Construction

Employment in construction in the North West is projected to decline by 10 thousand jobs. This represents a rate of loss similar to the UK average.

All local LSC areas in the North West are expected to share in this employment decrease, ranging from an annual average projected rate of loss of 2.7 per cent in Cheshire and Warrington to 7.6 per cent in Cumbria and Greater Merseyside.

Around 90 per cent of job losses are projected to be for males.

Distribution, transport, etc.

In the North West a modest growth rate (0.3 per cent per annum) is projected in distribution, transport etc, with the creation of 35 thousand additional jobs by 2014. The bulk of these additional jobs are expected to come from retail distribution, which is projected to create around 20 thousand jobs. Hotels & restaurants are also expected to contribute significantly with around 10 thousand extra jobs. Less than 5 thousand additional jobs are projected for transport storage & communication.

At local LSC area level rates of projected employment change range from 0.2 per cent per annum in Greater Merseyside to 0.6 per cent per annum in Cheshire & Warrington.

Employment for females in this broad sector is expected to increase by 10 thousand, alongside a projected gain of 25 thousand jobs for males

Business & other services

The business & other services sector is expected to see the bulk of the projected employment increase in the region between 2004 and 2014, with around 90 thousand additional jobs. Other business activities are projected to see particularly large increases of around 75 thousand. Other services are projected to add around 13 thousand new jobs, and banking & insurance 5 thousand.

At the local level only Cheshire & Warrington records a faster rate of projected employment growth in this broad sector than the England average. In the most rural part of the region – Cumbria - this broad sector accounts for a mere 18 per cent of total employment.

Twice as many of the additional jobs are projected to be taken by men than by women.

Non-marketed services

For the North West region, employment in non-marketed services is projected to increase by around 40 thousand, representing a rate of increase of around 0.4 per cent per annum. Health & social work account for 30 thousand of the projected employment gains, with education accounting for the remainder. By contrast, employment levels in public administration & defence are projected to decline by a thousand.

Males are expected to account for over 30 thousand of the additional jobs in non-marketed services in the North West.

9.4 Change in Employment by Gender and Employment Status

Males

By 2014, 1.87 million males are projected to be in employment in the North West. Of these, 1.37 million are expected to be in full-time work, with 275 thousand in part-time work. This is a rate of increase of 6.3 per cent for full-time employment and 18 per cent for part-time work between 2004 and 2014.

At the local LSC area level In the North West, only in Cumbria are more women than men projected to be in employment in 2014.

Females

Between 2004 and 2014, there are projected increases of over 20 thousand full-time jobs for women, and around 5 thousand part-time jobs.

At the local LSC area level, over the decade to 2014, female employment is projected to decrease only in Greater Merseyside (by 0.6 per cent per annum). Both Cumbria and Lancashire are projected to see a fall in the number of female full-time jobs (at a rate of 0.8 per cent per annum and 0.3 per cent per annum respectively). The annual rate of change in female part-time employment varies from a fall in Greater Merseyside of 2.1 per cent to an increase in Cumbria of 1.5 per cent.

9.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such ‘structural demand’ provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by ‘replacement demand’.

At the level of SOC Major Groups, the largest increase in occupational employment between 2004 and 2014 is projected for professional occupations, with an expected increase of over 70 thousand jobs. The next largest projected increases are for personal service occupations and sales & customer service occupations with over 50 and 40 thousand additional jobs, respectively (see Figure 9.1). Employment increases are also expected for managers & senior officials (around 40 thousand jobs) and for associate professional and technical occupations (25 thousand additional jobs).

Employment in elementary occupations is projected to contract by 85 thousand and in skilled trades occupations by around 20 thousand. Around 17 thousand job losses are expected for machine & transport operatives. A more modest decline of 7 thousand jobs is expected for administrative, clerical & secretarial occupations.

1. Managers & senior officials

Managers & senior officials are projected to experience an increase of around 40 thousand jobs by 2014.

The increase in jobs is projected to be focused on corporate managers, with a projected increase of 52 thousand being offset by the loss of around 13 thousand jobs in the managers/ proprietors sub-major group.

At sub-regional level all of the local LSC areas display slower rates of employment increase than the England average.

There is a projected increase in male employment of 10 thousand by 2014. Female employment, on the other hand, is projected to increase by 1.6 per cent per annum resulting in an additional 28 thousand jobs for women.

2. Professional occupations

Within this SOC major group, total employment in 2014 is projected to rise by an additional 70 thousand. This is the largest absolute net gain outside of London and the South East. The rate of change (over 1.7 per cent per annum) is slower than the rate of change projected for the UK and England.

All the sub-major groups, are projected to contribute positively to the significant overall increases in employment. In particular teaching & research professionals are expected to contribute almost 40 thousand extra jobs. Employment for the other three groups is as follows: science & technology professions (over 20 thousand), health professionals (over 5 thousand), and business professionals (5 thousand).

Within the region, Greater Merseyside and Cheshire & Warrington display the fastest rates of projected employment growth, at 1.8 per cent per annum.

It is projected that around 40 thousand extra jobs for males will be created in this occupation between 2004 and 2014. Around 10 thousand additional female jobs are expected, which is a 1.8 per cent per annum increase, compared to 1.7 per cent per annum for males.

3. Associate professional & technical occupations

The share of total employment within this SOC major group is projected to increase by 25 thousand. This is a 0.5 per cent per annum change between 2004 and 2014.

With the exception of protective service occupations, for which a loss of 3 thousand jobs is projected, all the occupational sub-major groups are projected to contribute to employment growth in this SOC major group within the North West region. Science & technology associate professionals are projected to increase by 10 thousand, health associate professionals by 4 thousand, and both culture, media & sports and business associate professionals by 7 thousand each.

Of the 25 thousand projected additional jobs, some 8 thousand are projected to benefit.

4. Administrative, clerical & secretarial occupations

This SOC major group is expected to lose around 7 thousand jobs by 2014. This represents a 0.3 per cent per annum rate of decline.

Secretarial & related employment positions are projected to decline dramatically, with the anticipated loss of up to 20 thousand jobs by 2014. However, the projected job losses of 2.4 per cent per annum for the North West is still slower than the losses in England (3.0 per cent per annum) and the UK (2.9 per cent per annum). Administrative & clerical occupations on the other hand are projected to gain up to 13 thousand new jobs by 2014.

Within the North West all regions are expected to lose employment in this occupation, with the exception of Greater Manchester and Cheshire & Warrington.

Male employment is projected to increase by 20 thousand. In contrast, there is a projected loss of over 30 thousand jobs for females.

5. Skilled trades occupations

Skilled trades occupations are projected to lose over 20 thousand jobs by 2014. This is a projected 0.5 per cent per annum decrease, which is faster than the UK (projected to decline at 0.4 per cent per annum).

Employment in skilled agricultural trades in the North West is projected to increase by 5 thousand by 2014. This increase is negated by the projected loss of up to 40 thousand jobs in the skilled metal & electrical trades. Jobs in skilled construction & building trades are projected to increase by 25 thousand. A reduction of around 10 thousand jobs is projected for other skilled trades.

By 2014, only Greater Manchester is projected to employ over 100 thousand people in this occupation. All local LSC areas are projected to suffer job losses, but the fastest rates of loss are projected at 0.8 per cent per annum in both Cumbria and Greater Manchester.

Males account for 13 thousand of the projected reduction of employment in skilled trades occupations.

6. Personal services occupations

Employment in personal service occupations is projected to increase by over 50 thousand (19 per cent) between 2004 and 2014. At 1.8 per cent per annum, the projected rate of employment growth is greater than the UK average.

Employment levels in caring personal service occupations are projected to increase by almost 50 thousand. In the North West, leisure occupations are projected to increase by 0.5 per cent per annum, creating around 5 thousand jobs.

Cumbria is projected to experience the fastest rate of employment increase in the North West, at 2.6 per cent per annum. Greater Manchester is projected to have the slowest rate of increase, at just 1 per cent per annum.

This SOC major group accounts for the largest projected increase in female employment (50 thousand). For males, there is projected to be a marginal increase in employment.

7. Sales & customer service occupations

Employment in sales & customer service occupations is projected to increase by just over 40 thousand, which is a 1.3 per cent per annum increase over the period between 2004 and 2014.

Employment in sales occupations is projected to increase by over 20 thousand by 2014 to 126 thousand. At a growth rate of 0.9 per cent per annum this is slower than the projections for both England and the UK. Customer service occupations are projected to experience employment growth of around 20 thousand over the period.

The projected increases in employment are expected to be equally divided between men and women.

8. Machine & transport operatives

This SOC major group is projected to lose over 17 thousand jobs over the period to 2014, a decline of 0.6 per cent per annum, which is faster than the projected decline for England and the UK.

Process machine operatives are projected to suffer considerable jobs losses (45 thousand). Conversely, drivers & other operatives are projected to increase their employment by up to 27 thousand.

Only Greater Manchester is projected to see an increase in employment for this occupation, with all the other local LSC areas showing faster rates of employment decline than the 0.5 per cent per annum projected for England.

A small projected gain of 5 thousand jobs is projected for male employment, which indicates that all employment losses will affect females.

9. Elementary Occupations

Elementary occupations are projected to experience the most severe decline in employment of all occupations in the North West, with a loss of 85 thousand jobs.

Both elementary trades and elementary service related occupations are projected to lose considerable numbers of jobs by 2014. Elementary service related occupations in particular are set to lose over 45 thousand jobs and elementary trades, almost 40 thousand.

The projected rates of employment loss are very similar across the local LSC areas, varying from 2.1 per cent per annum in Greater Manchester to 2.8 per cent in Cumbria.

A considerable fall in male employment is projected, with the loss of over 25 thousand jobs. The projected fall in the number of females employed in this occupation (57 thousand) is the largest for all occupations in the North West.

9.6 Projections of Replacement Demands

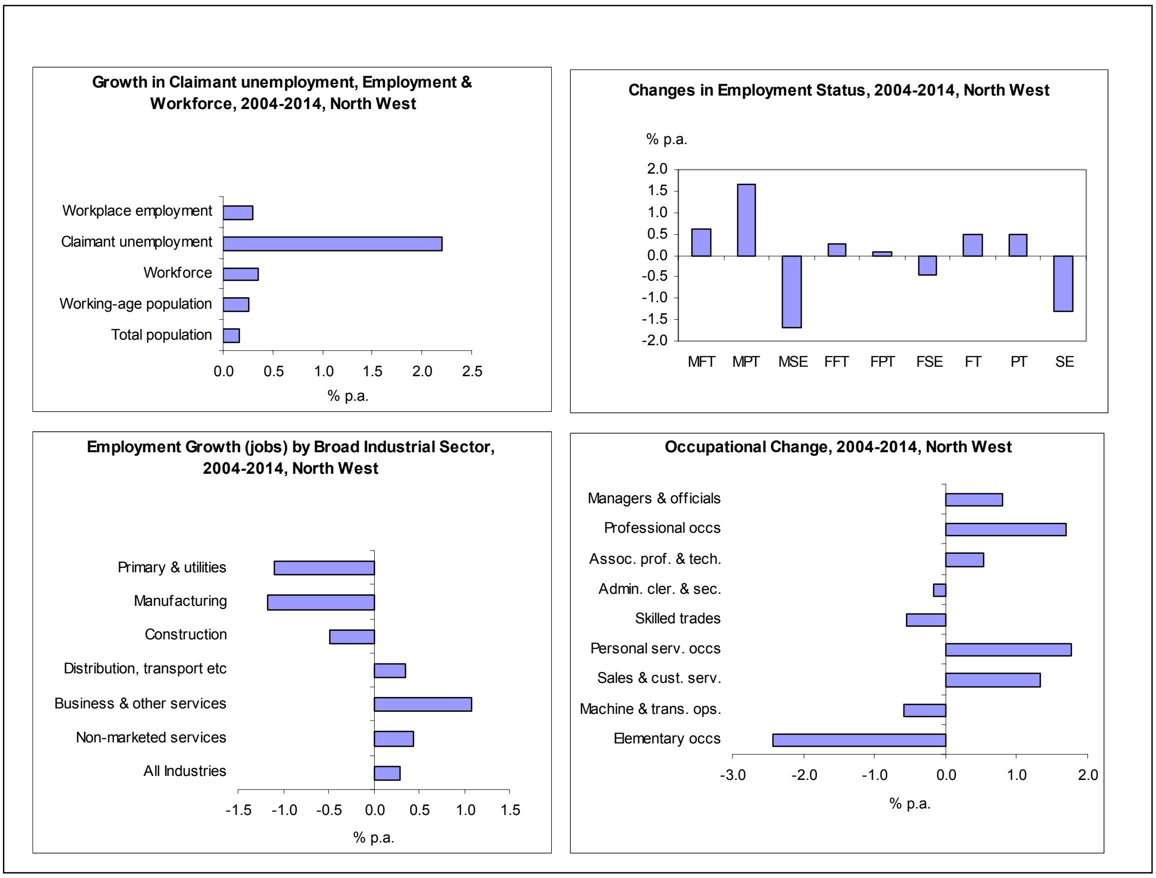
The key component of replacement demands is retirements from the workforce, especially for older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Regardless of whether expansion demand projections suggest an increase or decrease in employment levels, total requirements are positive for all SOC Major Groups. Looking at the replacement demands for the North West collectively (i.e. for all nine occupations) expansion demand is over 100 thousand. Replacement demand is far greater at 1.2 million. Thus, taken together, the total requirement for the North West is projected to be around 1.3 jobs over the period to 2014.

The single largest number of new employment positions is projected for professional occupations (with an expansion demand of just over 70 thousand). The projected replacement demand is almost 150 thousand, thus making the overall requirement for this SOC Major Group well over 200 thousand.

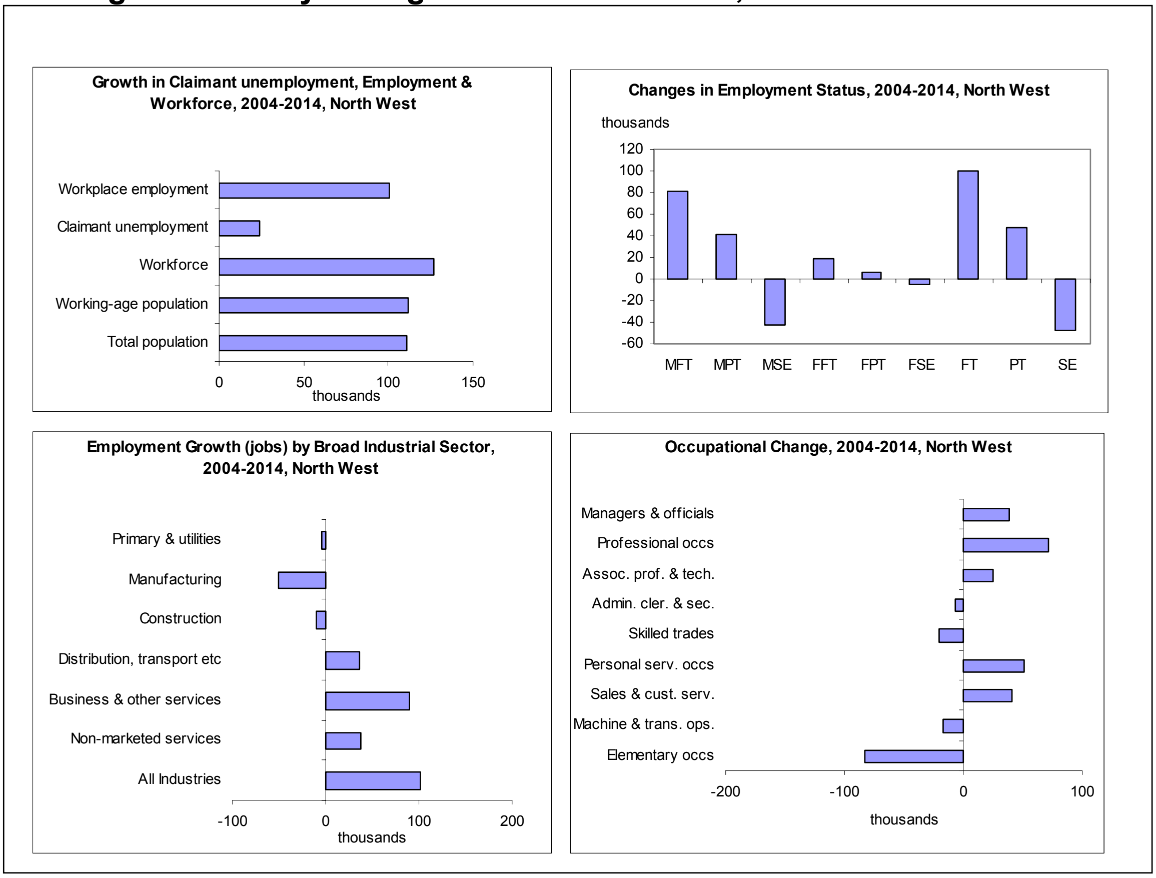
Structural changes based on expansion demand project an overall reduction in employment for four of the SOC Major Groups: administrative, clerical & secretarial with a loss of 7 thousand jobs; skilled trades with a loss of 20 thousand jobs; machine & transport operatives with a loss of around 17 thousand jobs; and elementary occupations, with the largest loss of almost 85 thousand jobs. However, when the replacement demands of each of these occupations is taken on board, the overall requirement for each of these SOC groups is positive. Thus, in the period 2004 and 2014, the projected overall requirement for administrative, clerical & secretarial occupation stands at almost 170 thousand; for skilled trades over 100 thousand jobs; for machine & transport operatives at almost 90 thousand jobs, and for elementary occupations just over 55 thousand jobs.

Figure 9.2: Key Changes in the North West, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 9.3: Key Changes in the North West, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 9.2: Sectoral Change in the North West

	North West											England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	56	40	26	24	1.9	1.3	0.8	0.7	-2	-6.1	-0.6	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	7	2	2	2	0.2	0.1	0.1	0.1	0	-7.9	-0.8	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	49	18	8	6	1.6	0.6	0.2	0.2	-2	-25.5	-2.9	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*112*	*60*	*36*	*32*	*3.8*	*2.0*	*1.1*	*0.9*	*-4*	*-10.4*	*-1.1*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	86	69	61	55	2.9	2.3	1.8	1.6	-6	-10.2	-1.1	-11.5	-1.2	-10.0	-1.1
4. Engineering	126	94	67	66	4.2	3.2	2.0	1.9	-1	-1.9	-0.2	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	482	401	325	282	16.1	13.4	9.7	8.2	-43	-13.1	-1.4	-11.3	-1.2	-11.3	-1.2
Manufacturing	*694*	*565*	*453*	*403*	*23.2*	*18.9*	*13.5*	*11.6*	*-50*	*-11.1*	*-1.2*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	210	187	203	194	7.0	6.2	6.1	5.6	-10	-4.8	-0.5	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	524	537	579	599	17.5	17.9	17.2	17.3	20	3.5	0.3	7.0	0.7	6.7	0.6
9. Hotels & restaurants	184	165	225	237	6.1	5.5	6.7	6.8	12	5.4	0.5	6.2	0.6	5.7	0.6
10. Transport & comm.	183	182	217	221	6.1	6.1	6.5	6.4	4	1.8	0.2	2.5	0.3	2.7	0.3
Distribution transport etc.	*891*	*884*	*1021*	*1058*	*29.8*	*29.5*	*30.4*	*30.6*	*36*	*3.6*	*0.3*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	90	101	105	108	3.0	3.4	3.1	3.1	4	3.6	0.4	3.4	0.3	2.8	0.3
12. Other business activities	263	326	491	565	8.8	10.9	14.6	16.3	74	15.0	1.4	15.5	1.5	15.7	1.5
16. Other services	136	165	200	213	4.5	5.5	6.0	6.2	13	6.5	0.6	8.6	0.8	9.3	0.9
Business & other services	*489*	*592*	*795*	*886*	*16.3*	*19.8*	*23.7*	*25.6*	*90*	*11.4*	*1.1*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	167	159	182	181	5.6	5.3	5.4	5.2	-1	-0.6	-0.1	-2.5	-0.3	-2.3	-0.2
14. Education	192	222	284	294	6.4	7.4	8.5	8.5	9	3.3	0.3	5.7	0.6	5.7	0.6
15. Health & social work	237	325	383	412	7.9	10.9	11.4	11.9	30	7.7	0.7	10.2	1.0	9.7	0.9
Non-marketed services	*596*	*706*	*850*	*887*	*19.9*	*23.6*	*25.3*	*25.7*	*38*	*4.4*	*0.4*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	2992	2994	3358	3459	100.0	100.0	100.0	100.0	101	3.0	0.3	4.6	0.5	4.3	0.4

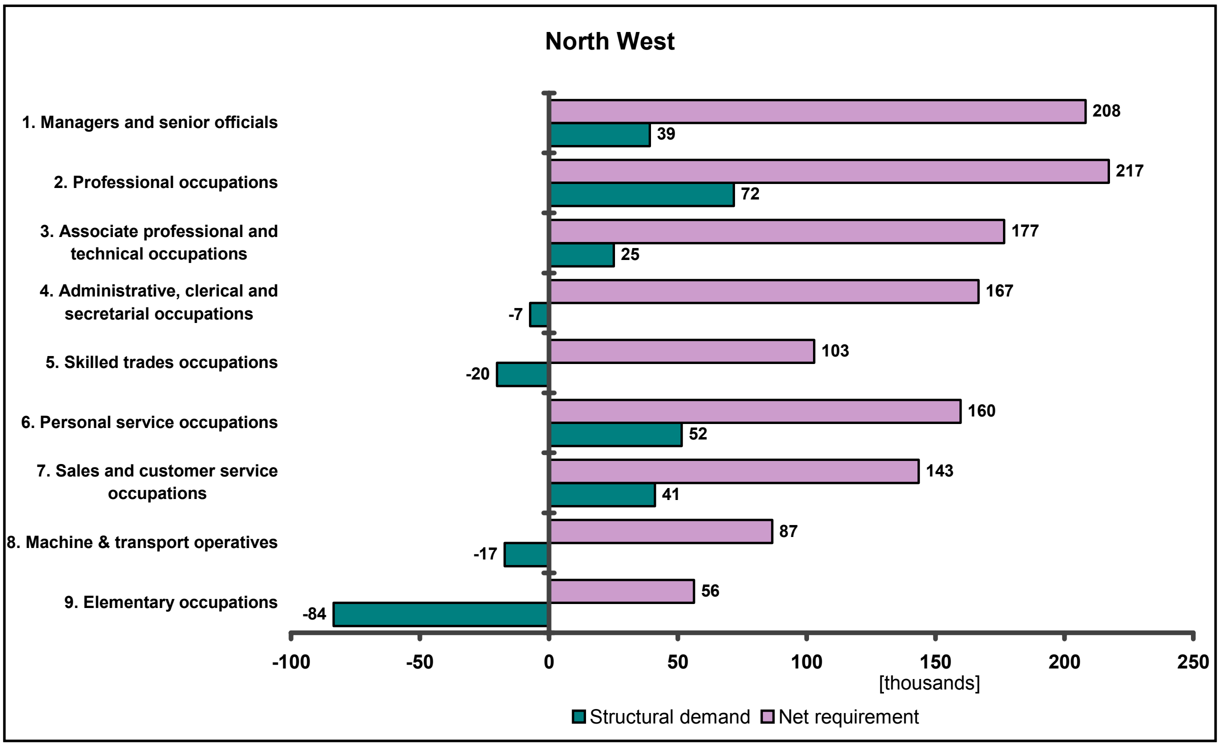
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 9.3: Occupational Change in the North West

	North West											England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
Occupational sub-major group	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
Corporate managers	228	264	350	402	7.6	8.8	10.4	11.6	52	14.8	1.4	20.2	1.9	19.9	1.8
Managers / proprietors	130	112	117	104	4.3	3.7	3.5	3.0	-13	-10.8	-1.1	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	64	76	109	130	2.2	2.5	3.2	3.8	22	19.8	1.8	18.9	1.7	18.3	1.7
Health professionals	17	22	29	35	0.6	0.7	0.9	1.0	6	19.9	1.8	29.8	2.6	29.4	2.6
Teaching & res. Profs.	100	129	182	221	3.4	4.3	5.4	6.4	39	21.6	2.0	19.9	1.8	21.6	2.0
Business professionals	49	56	72	77	1.7	1.9	2.2	2.2	5	6.9	0.7	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	46	53	71	82	1.5	1.8	2.1	2.4	10	14.4	1.4	12.2	1.2	12.4	1.2
Health assoc. profs.	82	102	123	127	2.7	3.4	3.7	3.7	4	3.6	0.4	7.7	0.7	7.8	0.8
Protect. serv. occs	27	31	46	43	0.9	1.0	1.4	1.2	-3	-6.6	-0.7	0.8	0.1	0.1	0.0
Culture, med. & sports	25	35	56	63	0.8	1.2	1.7	1.8	7	12.0	1.1	24.5	2.2	23.5	2.1
Business assoc. profs.	104	121	156	162	3.5	4.0	4.6	4.7	7	4.3	0.4	10.0	1.0	9.2	0.9
Admin & clerical	304	316	339	352	10.2	10.5	10.1	10.2	13	4.0	0.4	-4.2	-0.4	-3.1	-0.3
Secretarial & related	118	118	97	76	3.9	3.9	2.9	2.2	-21	-21.4	-2.4	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	40	32	33	39	1.3	1.1	1.0	1.1	5	15.7	1.5	17.3	1.6	15.5	1.5
Skilled metal & electrical	220	182	145	105	7.3	6.1	4.3	3.0	-40	-27.3	-3.1	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	132	110	119	144	4.4	3.7	3.5	4.2	25	20.8	1.9	20.2	1.9	19.4	1.8
Other skilled trades	97	86	78	67	3.3	2.9	2.3	1.9	-10	-13.5	-1.4	-14.7	-1.6	-14.6	-1.6
Caring personal service	66	116	206	254	2.2	3.9	6.1	7.3	48	23.3	2.1	23.8	2.2	22.8	2.1
Leisure occupations	60	61	63	66	2.0	2.0	1.9	1.9	4	5.6	0.5	7.3	0.7	6.7	0.7
Sales occupations	174	199	237	259	5.8	6.7	7.1	7.5	21	9.0	0.9	13.0	1.2	12.0	1.1
Customer service occs.	17	24	51	70	0.6	0.8	1.5	2.0	20	38.9	3.3	31.3	2.8	32.2	2.8
Process machine ops.	264	208	153	109	8.8	7.0	4.6	3.1	-45	-29.1	-3.4	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	126	125	143	170	4.2	4.2	4.3	4.9	27	19.2	1.8	18.5	1.7	17.2	1.6
Elementary: trades	199	151	115	78	6.6	5.0	3.4	2.2	-38	-32.6	-3.9	-36.6	-4.4	-35.5	-4.3
Elementary: service	301	265	269	223	10.1	8.9	8.0	6.4	-46	-17.1	-1.9	-12.2	-1.3	-12.9	-1.4
All occupations	2992	2994	3358	3459	100.0	100.0	100.0	100.0	101	3.0	0.3	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 9.4: Replacement Demands in the North West



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

10. NORTH EAST

10.1 Overview

The North East region of England comprises Northumberland, Tyne and Wear, County Durham, and the Tees Valley. Two-thirds of the North East population live in the major urban areas centred on the Tyne, Tees and Wear. Overall, the region has a strong identity that sets it apart from other areas of England.

The population of the North East is projected to remain relatively stable and the working age population is expected to increase slightly over the period to 2014, in the context of overall growth across the UK. However, the labour force is projected to grow, but only at a rate of 0.2 per cent per annum, which is well below the UK average. The North East is projected to experience the slowest growth in employment of any region in England.

Projected employment growth is confined to distribution, transport etc. and other service sectors, but expected growth rates in the service sectors are slower than the UK average. The projected rate of employment loss in the primary sector and utilities is akin to the UK as a whole, while that for manufacturing loss is slightly higher than the UK average.

Sales & customer occupations followed by professional occupations display the largest projected expansion demands in employment in the North East over the period to 2014. Elementary occupations and skilled trades occupations dominate expected job losses. However, replacement demands are such that for all SOC Major Groups projected to experience job losses as a result of structural change, total requirements are positive.

10.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 10.1 provides a general overview, while Figure 10.1 presents a graphical summary of the supply side. Figures 10.2 and 10.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population
The total population in the North East is projected to increase by just 12 thousand between 2004 to 2014, to stand at just over 2.5 million.

Population 16+
Population growth in the North East is expected to be much weaker than the UK average over 2004-14. While the UK16+ population is expected to grow by 6.2 per cent, the 16+ population in the North East is expected to increase by only 3.1 per cent.

Working-age Population
The working age population is also expected to stay fairly stable, rising by just 25 thousand.

Workforce
The workforce is projected to rise by 0.3 per cent per annum, to reach almost 1.2 million by 2014 (an increase of 35 thousand from 2004).

Labour force
The growth of the labour force is also expected to be weaker, at 2.1 per cent, compared to the UK rate, 5.1 per cent.

ILO unemployment
ILO unemployment in the North East is expected to increase slightly. Males and females are expected show similar patterns.

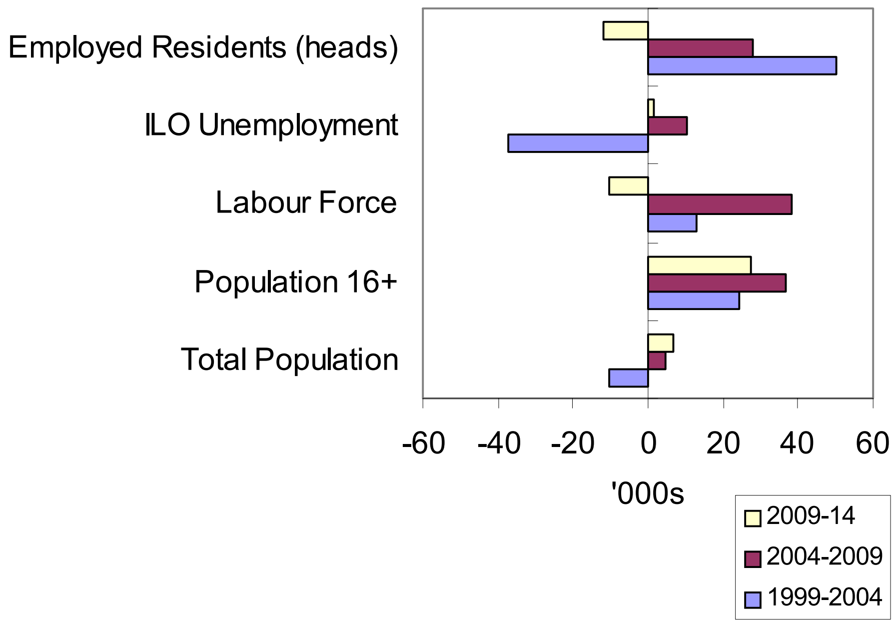
Claimant Unemployment
Claimant unemployment is projected to reach 50 thousand, increasing slightly faster than the projected national average.

Employed Residents
The number of employed residents in the North East is expected to grow between 2004 and 2014, by around 1 ½ per cent , rising to just under 1.1 million.

Workplace Employment
Workplace employment in the North East is set to increase by 27 thousand between 2004 and 2014, to reach 1.12 million. At about 0.2 per cent per annum, the projected employment growth rate is the slowest for any region in England. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is "double jobbing" (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. The labour market residual is in the North East is very small compared with most other regions. This reflects a combination of relatively low double jobbing and low inward commuting flows.

Figure 10.1: Changes in Population and the Labour Force in the North East



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 10.1: Population and Labour Force [1]

	1999	2004	2009	2014	1999-2004	2004-09	2009-14
					percentage change over period		
Male							
Total Population	1,237	1,235	1,244	1,252	-0.2	0.7	0.6
Population 16+	974	989	1,011	1,028	1.5	2.3	1.6
Labour Force	613	614	634	628	0.2	3.2	-0.9
Activity Rate	62.9	62.1	62.7	61.1	-0.8	0.6	-1.6
ILO Unemployment	66	44	51	52	-33.3	15.2	2.0
ILO Unemployment rate (%)	10.8	7.2	8.0	8.2	-3.6	0.8	0.2
Employed Residents (heads)	556	570	583	577	2.5	2.3	-1.1
Labour Market Residual (2)	-10	10	8	23			
Female							
Total Population	1,313	1,304	1,301	1,300	-0.7	-0.3	-0.1
Population 16+	1,061	1,071	1,085	1,096	0.9	1.3	1.0
Labour Force	524	536	555	550	2.3	3.5	-0.9
Activity Rate	49.4	50.0	51.1	50.2	0.6	1.1	-0.9
ILO Unemployment	39	24	28	28	-38.5	15.4	1.8
ILO Unemployment rate (%)	7.4	4.5	5.0	5.1	-3.0	0.5	0.1
Employed Residents (heads)	476	512	527	522	7.6	2.9	-1.0
Labour Market Residual (2)	22	3	-6	2			
Total							
Total Population	2,550	2,540	2,545	2,551	-0.4	0.2	0.3
Population 16+	2,035	2,060	2,096	2,123	1.2	1.8	1.3
Working-age Population	1,551	1,565	1,571	1,591	0.9	0.4	1.3
Labour Force	1,137	1,150	1,188	1,178	1.1	3.3	-0.9
Workforce	1,133	1,149	1,174	1,185	1.4	2.2	1.0
Activity Rate	55.9	55.8	56.7	55.5	-0.1	0.9	-1.2
ILO Unemployment	105	68	78	80	-35.2	15.3	1.9
ILO Unemployment rate (%)	9.2	5.9	6.6	6.8	-3.3	0.7	0.2
Claimant Unemployment	80	46	53	54	-42.1	15.2	1.9
Claimant Unemployment rate	5.1	3.0	3.4	3.4	-2.2	0.4	0.0
Employed Residents (heads)	1,032	1,082	1,110	1,098	4.8	2.6	-1.1
Workplace employment (jobs)	1,094	1,103	1,105	1,117	0.8	0.2	1.1
Labour Market Residual[2]	13	13	1	25			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes:
(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.
(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

10.3 Industrial Employment Structure

Overview of broad sectors

At the broad sectoral level, the picture for the North East is one of employment losses in the primary sector and utilities, in manufacturing, and construction, alongside employment gains in distribution, transport, etc, business and other services and non-marketed services (see Figures 10.1 and 10.2). In absolute terms, the dominant feature of employment decline is the loss of 17 thousand jobs in manufacturing. This contrasts with gains of 22 thousand jobs in both business and other services and distribution, transport, etc, and 5 thousand jobs in non-marketed services.

Primary sector & utilities

Within the primary sector & utilities sector, agriculture accounts for the most of the projected 3 thousand job loss across the broad sector, with employment declining at a faster rate than the UK average. A modest job loss is also projected for mining and quarrying where employment levels are expected to decline to 3 thousand in 2014. Employment levels in electricity gas and water are expected to remain stable.

Within the North East, Northumberland records the fastest projected rate of employment decline at 2.6 per cent per annum. The Tees Valley has the slowest projected rate of employment at 0.5 per cent per annum.

Within the primary sector & utilities sector the majority of job losses fall on males.

Manufacturing

Manufacturing employment is projected to decline to less than 140 thousand by 2014, compared with 230 thousand in 1984. The loss of 3 thousand jobs in engineering represents a rate of loss akin to the UK average, while the projected loss of 13 thousand jobs in the rest of manufacturing represents a loss of jobs at a rate slightly faster than the UK average.

At sub-regional level projected annual average rates of job loss are faster than the national average in Northumberland and Tees Valley.

Projected job losses are projected to fall fairly evenly on both males and females.

Construction

A loss of 2 thousand jobs is projected for construction. This represents decline at a rate of 0.3 per cent per annum (which is slower than the UK).

Projected annual average rates of job loss are faster than the national average in Tees Valley and County Durham, but slower than the national average in Northumberland and Tyne & Wear.

Males are expected to account for all of the projected job losses.

Distribution, transport etc.

Overall, a net gain of 22 thousand jobs is projected. In retail distribution an additional 10 thousand jobs are expected. Employment levels in transport storage and communication are expected to also increase by 10 thousand. 5 thousand additional jobs are projected in both hotels and restaurants.

The fastest rate of growth at the local LSC level is projected in the Tees Valley (0.9 per cent per annum). None of the local LSC areas have projected rates of employment increase which are slower than the average projected for England.

Males are expected to account for 14 thousand jobs in this broad sector in 2014.

Business & other services

Like distribution, transport etc an additional 22 thousand jobs are projected for business and other services between 2004 and 2014. At 0.9 per cent per annum, the projected growth rate for other business activities lags behind the UK growth rate of 1.2 per cent. Employment levels in banking and insurance are expected to remain stable - contrasting with employment growth nationally – while other business activities and other services are expected to add 20 thousand and 2 thousand jobs, respectively.

At local level only County Durham record rates of projected employment growth in this broad sector akin to the England average of 1.2 per cent per annum. In all other local LSC areas employment increase is slower than the England average.

Two thousand more jobs are expected to be filled by males (12 thousand) than women (10 thousand).

Non-marketed services

The North East displays the slowest rate of growth in employment in non-marketed services of any region. Nevertheless, an additional 5 thousand jobs are projected to be generated over the period to 2014. Health and social work and education account for all of the growth, whereas in public administration and defence a loss of 3 thousand jobs is expected.

All local LSC areas share in this slower than national average projected rate of increase.

Females account for all of the projected net gains in employment, as male employment is projected to decline by over 10 thousand.

10.4 Change in Employment by Gender and Employment Status

Males

By 2014, it is projected that an additional 17 thousand male full-time jobs will have been created in the North East. This represents an annual increase of 0.4 per cent, which is akin to the UK average. Part-time employment is only projected to increase by 5 thousand, which at an annual rate of 0.8 per cent is half as fast as that projected for the UK. Indeed, with the exception of Scotland, the North East has the slowest rate of male part-time job creation in the whole of the UK.

Northumberland is projected to see a 0.3 per cent per annum loss of male full-time employment (it is one of only five local LSC areas where a loss of male full-time employment is projected for the period 2004 to 2014), while County Durham is projected to lose 0.9 per cent of male part-time employment. In contrast, the highest projected annual rates of male full-time employment and part-time employment in the North East are 0.6 per cent and 1.7 per cent in Tyne and Wear.

Females

In the case of females it is projected that by 2014 the North East will support an additional 6 thousand full-time jobs and an extra 4 thousand part-time jobs. However, both these rates of increase are well below the projected annual increases of 0.5 and 0.7 per cent, respectively, for the UK.

Northumberland is projected to lose full-time female employment at a rate of 0.4 per cent per annum, as is County Durham. The highest annual increases in female fulltime employment are projected for Tees Valley (1.1 per cent). Regarding female part-time employment, both Northumberland and County Durham display faster rates of projected increase than England. In the North East region only Tyne and Wear is projected to suffer a reduction in female part-time jobs between 2004 and 2014.

10.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such 'structural demand' provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by 'replacement demand'.

The largest increase in occupational employment for any SOC Major Group between 2004 and 2014 is projected for sales and customer service occupations, with an expected increase of nearly 20 thousand jobs (see Figure 10.2). The SOC Major Group projected to record the next largest increase in employment is professional occupations, with a projected increase of 17 thousand jobs between 2004 and 2014. Increases of 13 thousand and 8 thousand jobs, respectively, are expected for managers & senior officials and personal services occupation. An increase of 7 thousand jobs for associate professional and technical occupations is also expected.

The main job losses are projected to occur in elementary occupations (25 thousand), followed by skilled trades occupations (8 thousand) and personal services occupations (6 thousand). Machine and transport operatives are projected to lose 2 thousand jobs at an annual rate of 0.2 per cent per annum.

1. Managers & Senior Officials

Managers & senior officials have a projected gain of 13 thousand jobs over the period to 2014. Job growth is accounted for by corporate managers (see Table 10.2) – but the projected rate of increase is slower than the UK average, while for managers and proprietors a small reduction in employment is expected.

At the local LSC level none of the four areas is expected to see an increase in employment at a faster rate than the projected England average.

Significant female employment gains are projected in this SOC Major Group.

2. Professional occupations

By 2014 17 thousand additional jobs are projected At 1.4 per cent per annum, the projected rate of employment growth in the region is the slowest for any part of the UK. However, all professional occupational groups identified in Table 10.2 are expected to share in the projected employment increase. Teaching and research professionals account for the largest single increase in employment. Business professionals are expected to see 1 thousand additional jobs, and science and technology professionals, 5 thousand extra jobs. For health professionals the projected rate of employment growth is above the UK average, while for teaching and research professionals the expected regional growth rate is only about half that projected for the UK.

At the local LSC area level, little intra-regional variation is evident in the share of total employment accounted for by professional occupations

Females are expected to account for the majority of the extra jobs.

3. Associate Professional & technical occupations

The projected annual average growth rate over the period to 2014 is 0.5 per cent per annum (the slowest for any UK region), compared with 1.0 per cent per annum for the UK. Overall, an increase of just 7 thousand jobs is expected for this SOC Major Group. Science & technology associate professionals and health associate professionals are expected to account for all of this increase, with each projected to add 4 thousand jobs. Employment is projected to remain stable in business associate professionals and culture, media and sports occupations.

Focusing on the LSC areas, Northumberland and County Durham display the fastest projected rates of annual employment increases (0.6 per cent) and Tyne and Wear the lowest (0.4 per cent).

Both male and females are expected to share fairly evenly in any job increases.

4. Administrative, clerical & secretarial occupations

In the North East employment for this SOC Major Group is expected to decline at an annual average rate of 0.4 per cent per annum, compared with 0.9 per cent across the UK. All of the projected loss of 6 thousand jobs is expected to be accounted for by secretarial and related occupations.

At local level within the North East, County Durham records the fastest rate of employment decline (at 0.8 per cent per annum).

An expected gain of around 3 thousand jobs for males is offset by a projected loss of 9 thousand jobs for females.

5. Skilled trades occupations

Over the period to 2014 the loss of a further 8 thousand jobs is expected. This represents a projected rate of loss of 0.5 per cent per annum, which is similar to that expected for the UK as a whole (0.4 per cent per annum). Skilled metal and electrical trades account for virtually all of the projected decline in employment, with other skilled trades and skilled agricultural trades accounting for the remainder. Employment levels are expected to increase by 10 thousand in skilled construction and building trades, a 2.2 per cent per annum change, which is faster than the projected rate of increase for both England and UK.

Within the North East, Northumberland records the slowest projected rate of employment loss at 1.0 per cent per annum.

Most of the projected job losses in this Major Group in the North East are expected to fall on males, while employment levels for females are expected to fall by 3 thousand.

6. Personal Services occupations

Over the period to 2014, employment is projected to grow by 0.9 per cent per annum, compared with the UK growth rate of 1.7 per cent per annum. Around 8 thousand additional jobs are expected, of which virtually all are caring personal service occupations. A very modest growth in leisure occupations is expected.

At local area level the projected annual average rates of growth range from 0.5 per cent in Tyne & Wear to 1.3 per cent in Tees Valley.

Females account for the vast majority of the projected gains.

7. Sales & customer service occupations

The trend of steady employment increase is projected to continue, with over 20 thousand additional jobs by 2014. At 1.8 per cent per annum, the projected rate of employment increase is above the UK average. Sales occupations are expected to account for 15 thousand of the extra jobs between 2004 and 2014, with customer service occupations accounting for the remainder. In both instances, these increases represent growth rates above the UK average.

Within the region projected annual average growth rates range from 1.7 per cent in Tyne & Wear to 2.3 per cent in Northumberland

Females are expected to account for more of the projected employment gains.

8. Machine & transport operatives

A loss of just 2 thousand jobs is expected over the period to 2014. This represents a reduction of 2 per cent, compared with the 5 per cent projected across the UK as a whole. Process machine operatives account for all of the projected job loss, while employment levels for drivers &

other operatives are expected to increase by 7 thousand.

At local LSC area level, projected annual average rates of employment decline vary between 0.4 per cent per annum in Tees Valley to 0.6 per cent per annum in Northumberland and County Durham. Tyne and Wear has a projected 0.2 per cent per annum increase between 2004 and 2014.

The job losses are expected to fall on females (8 thousand), as employment levels for males are expected to increase by 6 thousand.

9. Elementary Occupations

Elementary occupations have a projected loss of 25 thousand jobs between 2004 and 2014. At 1.9 per cent the projected annual average rate of loss is slower than the UK average. Job losses are fairly evenly divided between elementary service occupations and elementary trades occupations.

Within the region, projected rates of job loss at LSC area level vary between 1.2 per cent per annum in Northumberland and 2.2 per cent per annum in Tyne and Wear.

The majority of the projected losses (18 thousand) fall on females.

8.6 Projections of Replacement Demands

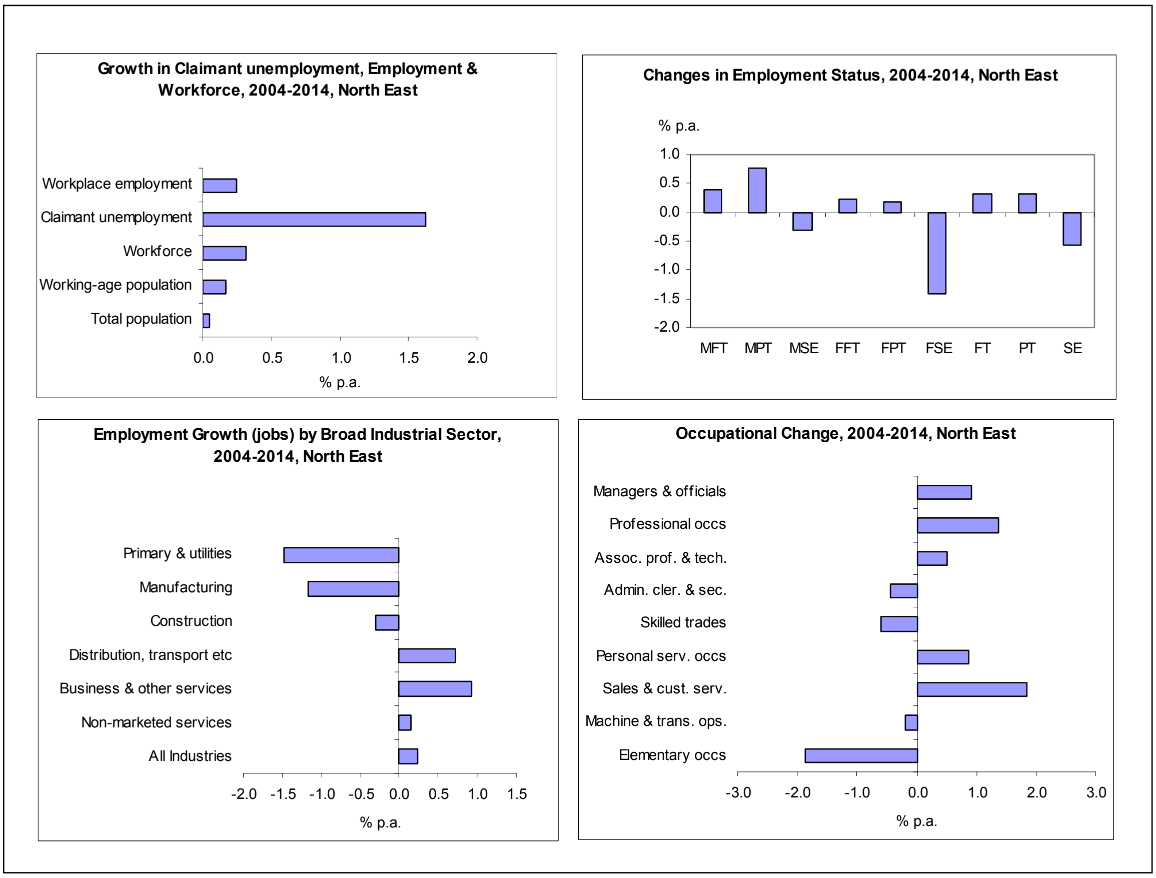
The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Regardless of whether the expansion demand projections suggest an increase or decrease in employment levels, total requirements are positive for all SOC Major groups.

The highest overall requirements come from those occupations which are projected to experience positive expansion demands. Thus, overall requirements of 50-60 thousand, are projected for managers & senior officials, professional occupations, associate professional & technical occupations, and sales & customer service occupations.

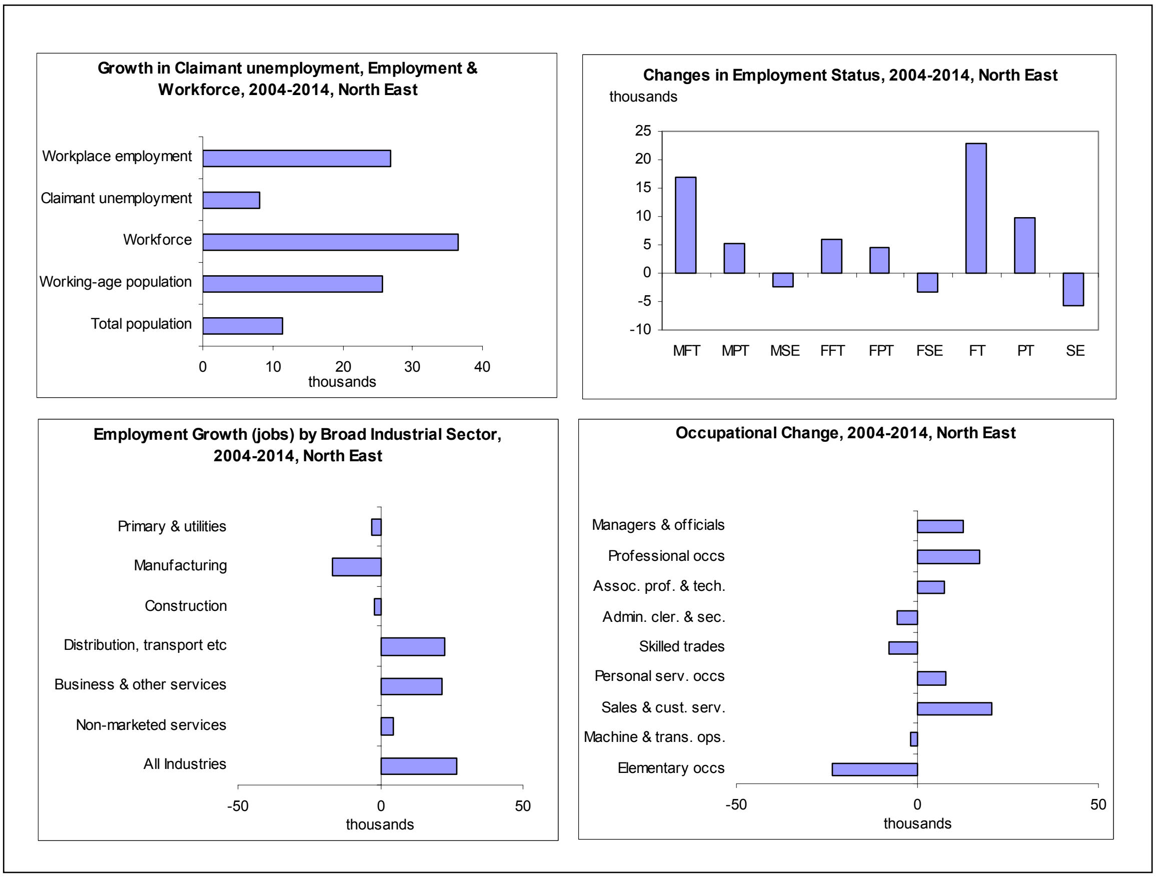
However, even where structural demand changes suggest a negative expansion demand, all these occupations are projected to see a positive overall requirement. There are an additional 47 thousand jobs for administrative, clerical & secretarial occupations, 36 thousand jobs for skilled trade occupations, 34 thousand jobs for machine & transport operatives and 27 thousand jobs for elementary occupations.

Figure 10.2: Key Changes in the North East, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 10.3: Key Changes in the North East, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 10.2: Sectoral Change in the North East

	North East											England		UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**		**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum	% change	% per annum
1. Agriculture, etc	19	12	11	9	1.9	1.1	1.0	0.8	-2	-18.0	-2.0	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	38	5	4	3	3.6	0.4	0.4	0.3	-1	-22.5	-2.5	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	11	6	7	7	1.0	0.6	0.7	0.6	0	-3.5	-0.4	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*68*	*23*	*22*	*19*	*6.5*	*2.2*	*2.0*	*1.7*	*-3*	*-13.9*	*-1.5*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	16	22	17	16	1.5	2.1	1.5	1.4	-1	-7.4	-0.8	-11.5	-1.2	-10.0	-1.1
4. Engineering	42	37	28	25	4.1	3.6	2.5	2.2	-3	-10.0	-1.0	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	172	137	108	95	16.6	13.1	9.9	8.5	-13	-12.0	-1.3	-11.3	-1.2	-11.3	-1.2
Manufacturing	*230*	*196*	*153*	*136*	*22.3*	*18.8*	*14.0*	*12.1*	*-17*	*-11.1*	*-1.2*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	72	68	68	66	7.0	6.5	6.2	5.9	-2	-3.0	-0.3	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	171	183	176	185	16.6	17.5	16.1	16.5	9	5.0	0.5	7.0	0.7	6.7	0.6
9. Hotels & restaurants	56	55	64	69	5.4	5.3	5.9	6.2	5	7.2	0.7	6.2	0.6	5.7	0.6
10. Transport & comm.	55	55	57	66	5.3	5.3	5.2	5.9	9	15.8	1.5	2.5	0.3	2.7	0.3
Distribution transport etc.	*282*	*293*	*298*	*320*	*27.3*	*28.0*	*27.2*	*28.6*	*22*	*7.5*	*0.7*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	27	25	27	26	2.6	2.4	2.4	2.3	0	-1.8	-0.2	3.4	0.3	2.8	0.3
12. Other business activities	70	101	134	154	6.8	9.7	12.2	13.7	20	14.8	1.4	15.5	1.5	15.7	1.5
16. Other services	51	59	66	68	4.9	5.6	6.0	6.1	2	3.7	0.4	8.6	0.8	9.3	0.9
Business & other services	*147*	*184*	*226*	*248*	*14.3*	*17.7*	*20.7*	*22.1*	*22*	*9.6*	*0.9*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	64	75	83	81	6.2	7.2	7.6	7.2	-3	-3.4	-0.3	-2.5	-0.3	-2.3	-0.2
14. Education	79	89	104	107	7.7	8.6	9.5	9.6	3	3.2	0.3	5.7	0.6	5.7	0.6
15. Health & social work	90	117	139	144	8.8	11.2	12.7	12.8	4	3.0	0.3	10.2	1.0	9.7	0.9
Non-marketed services	*234*	*281*	*327*	*331*	*22.7*	*26.9*	*29.9*	*29.6*	*5*	*1.4*	*0.1*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	1032	1045	1093	1120	100.0	100.0	100.0	100.0	27	2.5	0.2	4.6	0.5	4.3	0.4

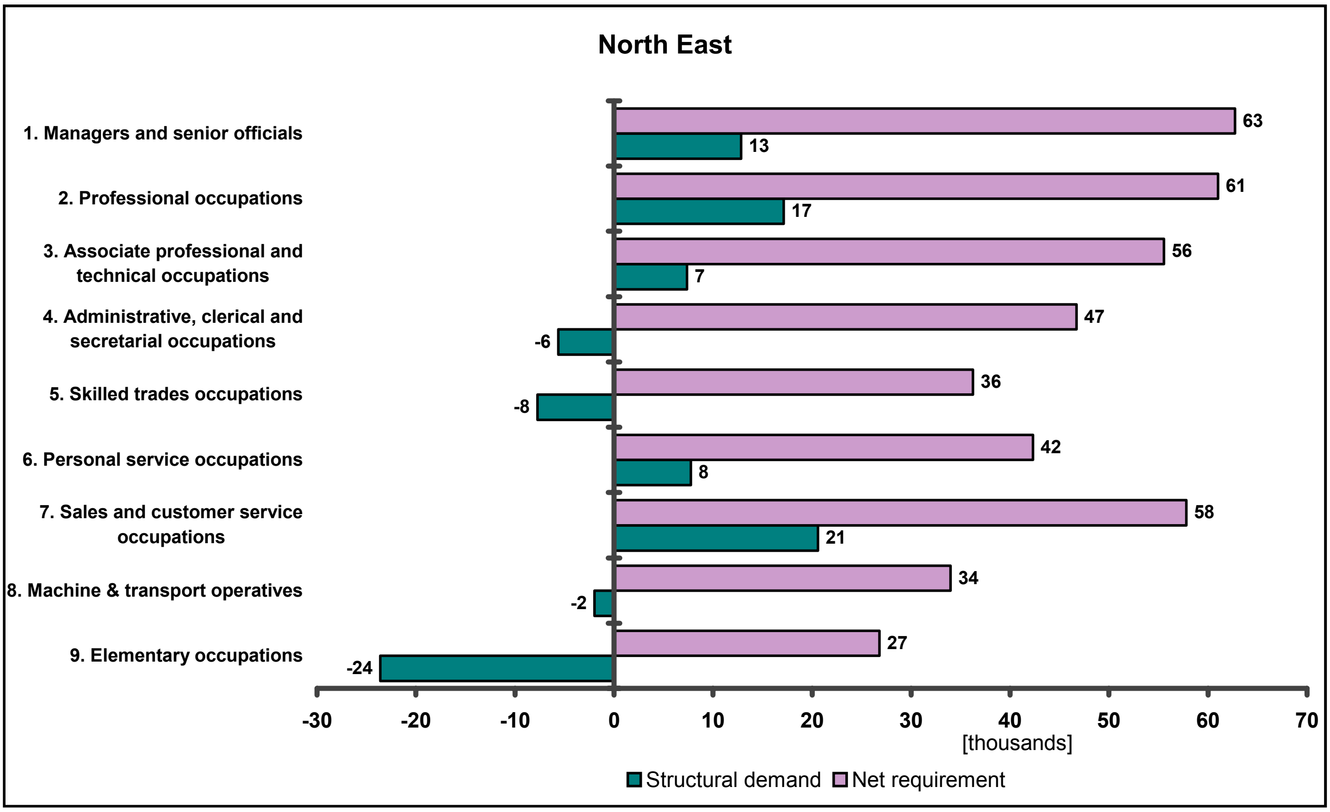
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 10.3: Occupational Change in the North East

					North East							England		UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014		2004-2014	
					% of	% of	% of	% of		%	% per	%	% per	%	% per
Occupational sub-major group	000s	000s	000s	000s	total	total	total	total	000s	change	annum	change	annum	change	annum
Corporate managers	63	77	97	111	6.1	7.4	8.9	10.0	14	14.4	1.4	20.2	1.9	19.9	1.8
Managers / proprietors	34	36	39	38	3.3	3.5	3.5	3.4	-1	-3.1	-0.3	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	20	23	30	36	1.9	2.2	2.8	3.2	5	17.7	1.6	18.9	1.7	18.3	1.7
Health professionals	6	9	13	18	0.6	0.8	1.2	1.6	5	37.6	3.2	29.8	2.6	29.4	2.6
Teaching & res. Profs.	41	45	53	59	4.0	4.3	4.8	5.2	6	10.7	1.0	19.9	1.8	21.6	2.0
Business professionals	15	18	22	23	1.5	1.8	2.0	2.1	1	5.2	0.5	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	16	18	24	28	1.5	1.8	2.2	2.5	4	16.3	1.5	12.2	1.2	12.4	1.2
Health assoc. profs.	30	36	45	49	2.9	3.5	4.1	4.4	4	8.1	0.8	7.7	0.7	7.8	0.8
Protect. serv. occs	9	12	18	18	0.9	1.2	1.7	1.6	0	-0.9	-0.1	0.8	0.1	0.1	0.0
Culture, med. & sports	8	10	14	15	0.8	1.0	1.3	1.3	0	2.7	0.3	24.5	2.2	23.5	2.1
Business assoc. profs.	32	37	42	42	3.1	3.5	3.9	3.7	0	-1.0	-0.1	10.0	1.0	9.2	0.9
Admin & clerical	99	103	104	104	9.6	9.9	9.5	9.3	0	-0.1	0.0	-4.2	-0.4	-3.1	-0.3
Secretarial and related	35	35	27	21	3.4	3.4	2.4	1.9	-6	-20.7	-2.3	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	17	11	14	13	1.7	1.1	1.3	1.2	-1	-3.9	-0.4	17.3	1.6	15.5	1.5
Skilled metal & electrical	86	64	51	37	8.3	6.2	4.7	3.3	-14	-26.9	-3.1	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	50	42	45	56	4.8	4.0	4.1	5.0	11	23.8	2.2	20.2	1.9	19.4	1.8
Other skilled trades	32	30	23	19	3.1	2.8	2.1	1.7	-4	-17.6	-1.9	-14.7	-1.6	-14.6	-1.6
Caring personal service	24	39	65	72	2.3	3.8	6.0	6.4	7	10.5	1.0	23.8	2.2	22.8	2.1
Leisure occupations	21	23	21	22	2.0	2.2	1.9	2.0	1	4.3	0.4	7.3	0.7	6.7	0.7
Sales occupations	65	81	87	102	6.3	7.7	8.0	9.1	15	16.8	1.6	13.0	1.2	12.0	1.1
Customer service occs.	5	8	15	21	0.5	0.7	1.4	1.9	6	39.4	3.4	31.3	2.8	32.2	2.8
Process machine ops.	88	79	60	51	8.5	7.6	5.5	4.6	-9	-15.0	-1.6	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	46	44	44	51	4.5	4.2	4.0	4.5	7	16.3	1.5	18.5	1.7	17.2	1.6
Elementary: trades	73	55	40	28	7.1	5.2	3.6	2.5	-11	-28.9	-3.3	-36.6	-4.4	-35.5	-4.3
Elementary: service	118	108	98	86	11.4	10.4	9.0	7.7	-12	-12.3	-1.3	-12.2	-1.3	-12.9	-1.4
All occupations	1032	1045	1093	1120	100.0	100.0	100.0	100.0	27	2.5	0.2	5.5	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 10.4: Replacement Demands in the North East



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

11. ENGLAND

11.1 Overview

England accounts for around 84 per cent of the UK population and 85 per cent of UK employment. Hence, it dominates the projected change across the UK as a whole.

Over the period to 2014 both the working age population and the workforce are projected to grow at a rate of 0.5 per cent per annum. Workplace employment is also projected to increase at 0.5 per cent per annum, with an extra 1.2 million jobs between 2004 and 2014.

At a broad sectoral level, an additional 500 thousand jobs are projected for distribution, transport etc and 420 thousand jobs for non-marketed services. Employment in non-marketed services and in distribution, transport, etc, are both projected to increase at rates of 0.6 per cent per annum. However, the business & other services broad sector is projected to record the largest employment increase in absolute terms with 950 thousand additional jobs expected between 2004 and 2014 (representing an annual average growth rate of 1.2 per cent).

Manufacturing dominates job losses, with a projected reduction of 380 thousand jobs (a rate of decrease of 1.1 per cent per annum) between 2004 and 2014. The primary sector & utilities are projected to record an annual average rate of job loss of 1.7 per cent (representing a loss of 95 thousand jobs) while a reduction of 90 thousand jobs in construction (0.4 per cent per annum) is expected.

Job gains are expected for both males and females, but whereas those projected for part-time employees outstrip those for full-time employees for females, for males the reverse is true. Self-employment is projected to decline.

Professional occupations comprise the single largest component of projected employment increase of any SOC Major Group over the period to 2014, with 700 thousand additional jobs expected. The next largest increases are projected for managers & officials (620 thousand extra jobs), associate professional & technical occupations (410 thousand jobs), personal service occupations (330 thousand jobs) and sales & customer service occupations (330 thousand jobs).

Elementary occupations, administrative, clerical & secretarial occupations, skilled trades occupations and machine and transport operatives bear the brunt of job losses (all exceeding 100 thousand). However, even where projected structural changes suggest an overall reduction in employment levels, replacement demands mean that total requirements are positive.

11.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 11.1 provides a general overview, while Figure 11.1 presents a graphical summary of the supply side. Figures 11.2 and 11.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population

The total population of England is projected to increase by 2.1 million between 2004 and 2014, to 52 million. This represents a rate of increase of 0.4 per cent per annum.

Population 16+
The population aged 16+ is projected to grow a t a faster rate increasing by over 2 ½ million between 2004 and 2014.

Working-age Population
The working age population is projected to increase by 1.6 million between 2004 and 2014, representing a rate of increase of 0.5 per cent per annum (see Figure 11.2).

***Work*force**
The workforce is expected to increase by 1.4 million (an annual average rate of increase of 0.5 per cent per annum), to reach 27.8 million in 2014.

Labour Force
The labour force is projected to grow by a similar magnitude, reaching just under 31 million by 2014.

ILO Unemployment
ILO unemployment was about 1.2 million in 2004 and this is projected to increase to around just under 1.5 million by 2009 before falling back to below 1.4 million in 2014. The rate of ILO unemployment is expected to rise to almost 6 per cent in 2009 before falling back to just over 5 per cent by 2014.

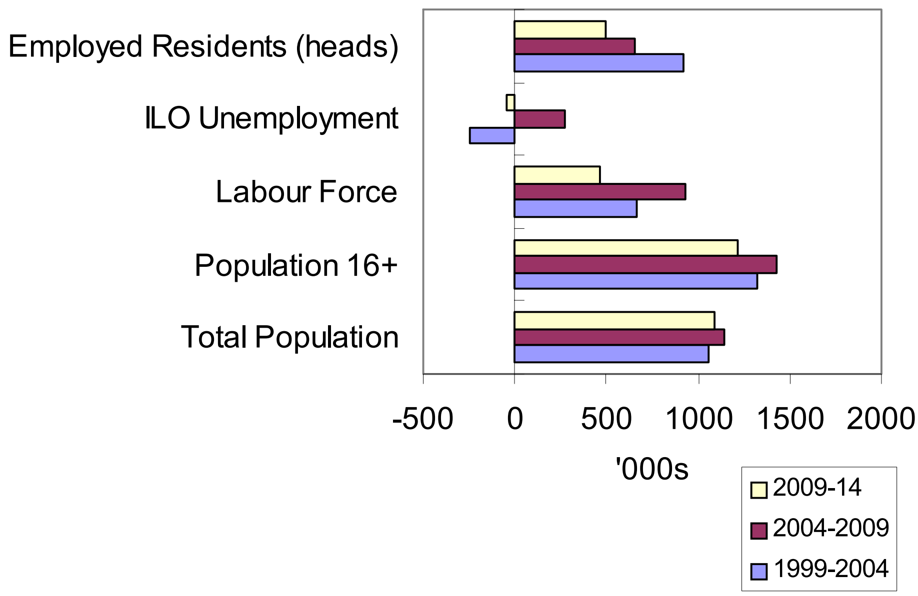
Claimant Unemployment
Claimant unemployment is expected to increase by around 140 thousand between 2004 and 2014, to reach about 830 thousand in 2014.

Employed Residents
The number of employed residents is projected to rise by well over a million, a rate of growth of about 0.5 per cent per annum.

Workplace Employment
Workplace employment in England is projected to increase by a similar amount, to reach nearly 26.7 million in 2014. This represents a rate of increase of 0.5 per cent per annum, compared with 0.4 per cent per annum across the UK as a whole. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is “double jobbing” (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. For England as a whole the residual amounts to around 2 million, mainly reflecting double jobbing.

Figure 10.1: Changes in Population and the Labour Force in England



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 11.1: Population and Labour Force [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	23,916	24,553	25,199	25,794	2.7	2.6	2.4
Population 16+	18,787	19,555	20,359	21,026	4.1	4.1	3.3
Labour Force	13,143	13,384	13,836	14,072	1.8	3.4	1.7
Activity Rate	70.0	68.4	68.0	66.9	-1.5	-0.5	-1.0
ILO Unemployment	862	685	843	819	-20.5	23.0	-2.8
ILO Unemployment rate (%)	6.6	5.1	6.1	5.8	-1.4	1.0	-0.3
Employed Residents (heads)	12,304	12,710	12,994	13,252	3.3	2.2	2.0
Labour Market Residual (2)	828	1,169	1,174	1,231			
Female							
Total Population	25,117	25,541	26,032	26,520	1.7	1.9	1.9
Population 16+	20,232	20,781	21,407	21,957	2.7	3.0	2.6
Labour Force	10,939	11,368	11,843	12,067	3.9	4.2	1.9
Activity Rate	54.1	54.7	55.3	55.0	0.6	0.6	-0.4
ILO Unemployment	569	495	610	593	-13.0	23.3	-2.9
ILO Unemployment rate (%)	5.2	4.4	5.2	4.9	-0.8	0.8	-0.2
Employed Residents (heads)	10,347	10,862	11,233	11,475	5.0	3.4	2.1
Labour Market Residual (2)	1,022	947	864	924			
Total							
Total Population	49,033	50,093	51,230	52,315	2.2	2.3	2.1
Population 16+	39,019	40,336	41,766	42,983	3.4	3.5	2.9
Working-age Population	30,044	31,032	31,690	32,634	3.3	2.1	3.0
Labour Force	24,082	24,752	25,679	26,139	2.8	3.7	1.8
Workforce	25,588	26,463	27,219	27,800	3.4	2.9	2.1
Activity Rate	61.7	61.4	61.5	60.8	-0.4	0.1	-0.7
ILO Unemployment	1,431	1,180	1,453	1,412	-17.5	23.1	-2.8
ILO Unemployment rate (%)	5.9	4.8	5.7	5.4	-1.2	0.9	-0.3
Claimant Unemployment	1,003	691	850	828	-31.1	23.1	-2.6
Claimant Unemployment rate	3.3	2.2	2.7	2.5	-1.1	0.5	-0.1
Employed Residents (heads)	22,651	23,572	24,226	24,727	4.1	2.8	2.1
Workplace employment (jobs)	24,327	25,517	26,062	26,694	4.9	2.1	2.4
Labour Market Residual[2]	1,849	2,117	2,038	2,155			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

11.3 Industrial Employment Structure

Overview of broad sectors

At the broad sectoral level, the picture for England is one of employment losses in the primary sector & utilities, manufacturing and construction and employment gains in distribution, transport, etc, business & other services and non-marketed services.

In aggregate across all industries it is projected that around 1.2 million additional jobs will be created between 2004 and 2014.

Primary sector & utilities

The projected rate of job loss in the primary sector & utilities is 1.7 per cent per annum. Job losses are projected in agriculture, hunting, fishing & forestry (nearly 50 thousand jobs), mining & quarrying (7 thousand jobs) and in electricity gas & water (17 thousand jobs). By 2014 it is projected that fewer than 280 thousand people will be employed in agriculture, hunting, fishing & forestry, compared with 320 thousand in 2004 and over 500 thousand in 1984.

Males account for the vast majority of job losses expected in this broad sector.

Manufacturing

Between 2004 and 2014 330 thousand manufacturing jobs are expected to be lost in England. In 2014 there are expected to be around 2.7 million jobs in manufacturing, representing around 10 per cent of total employment. Around 230 thousand jobs are expected to be lost in the rest of manufacturing, as employment declines at a projected rate of 1.2 per cent per annum. A rate of loss of 0.9 per cent per annum is projected for engineering, as over 50 thousand jobs are lost. Around 40 thousand jobs are projected to be lost in food drink & tobacco.

Between 2004 and 2014, both males and females are projected to share in job losses in this broad sector. Males are expected to lose over 170 thousand jobs (a 0.8 per cent per annum fall) and females around 155 thousand jobs (a 2.2 per cent per annum fall).

Construction

Construction employment in England is projected to decline by around 50 thousand between 2004 and 2014. This is a function of projected gains in some regions and losses in others.

Around 55 thousand men are expected to lose their jobs is this broad sector by 2014, whereas 4 thousand jobs for women are projected to be created (a 2.4 per cent increase over the period from 2004 to 2014).

Distribution, transport etc.

Employment in England is projected to increase by almost 0.6 per cent per annum, as this broad sector continues to account for about 30 per cent of total employment. Within this broad sector retail distribution dominates employment growth, with an additional 300 thousand jobs expected between 2004 and 2014. Increases of around 100 thousand jobs are also projected for hotels & restaurants and around 40 thousand jobs in transport, storage & communication.

Females are expected to account for at least 255 thousand of the projected employment increase in this broad sector, which is a 7.5 per cent increase over the period from 2004 to 2014.

Business & other services

The greatest projected employment increase in England is in business & other services. Around 825 thousand additional jobs are projected between 2004 and 2014, representing an increase of 12.1 per cent (1.2 per cent per annum). The greatest projected increase within this sector is for other business activities, with nearly 650 thousand extra jobs. Over 136 thousand additional jobs are expected in other services. A gain of over 30 thousand jobs is projected in banking & insurance. By 2014 this broad sector is expected to account for nearly 30 per cent of total employment in England.

Males are projected to be the main beneficiaries of employment growth in this broad sector, taking 580 thousand jobs, which represents a 1.5 per cent per annum increase to 2014, compared to 255 thousand jobs for women (a 0.8 per cent per annum increase).

Non-marketed services

The projected annual average rate of employment growth in non-marketed services is 0.6 per cent per annum, representing an increase of 355 thousand jobs. Health & social work accounts for the single largest number of job gains (around 270 thousand), as employment grows at a projected annual average rate of 1 per cent per annum. Around 115 thousand extra jobs are expected in education. A modest loss of nearly 30 thousand jobs is expected in public administration & defence.

A gain of around 220 thousand jobs for females is expected in this broad sector, which easily exceeds the 135 thousand jobs projected for males between 2004 and 2014.

11.4 Change in Employment by Gender and Employment Status

Males

Over the decade from 2004 and 2014 England displays a projected gain of 420 thousand male full-time employees. A gain of 320 thousand male part-time employees (a projected increase of 1.7 per cent per annum) is expected. By contrast, the number of self-employed is expected to contract by nearly 300 thousand, with males accounting for the majority of the projected losses.

Females

Between 2004 and 2014 England displays a projected gain of 300 thousand female full-time employees. About 70 thousand more part-time jobs are projected for females, at a projected rate of 0.7 per cent per annum.

11.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such ‘structural demand’ provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by ‘replacement demand’.

At the level of SOC Major Groups, the largest increase in occupational employment between 2004 and 2014 is projected for professional occupations, with an expected increase of over 580 thousand jobs. Employment for managers and officials is projected to increase by around 550 thousand; while for associate professional & technical professions an additional 410 thousand jobs are expected. The number of personal service occupations is expected to rise by almost 375 thousand, while an increase of 330 thousand is expected for sales & customer service occupations.

Employment decline is dominated by elementary occupations with a projected loss of 550 thousand jobs. The next largest decreases are projected for administrative, clerical & secretarial occupations, and skilled trades with expected reductions of 310 thousand and 115 thousand, respectively. Machine & transport operatives are expected to see a loss of around 100 thousand jobs (see Table 11.2).

1. Managers & senior officials

The number of managers & senior officials in England is projected to increase by 550 thousand between 2004 and 2014. Between 2004 and 2014 a projected increase of around 620 thousand jobs for corporate managers is slightly offset by the expected loss of nearly 70 thousand jobs amongst managers and proprietors.

Employment for females is expected to increase by about 370 thousand, compared with a more modest projected gain of 140 thousand for males.

2. Professional occupations

Between 2004 and 2014 there is a projected increase of just over 580 thousand jobs in professional occupations. In absolute terms, teaching and research professionals account for the single largest number of extra jobs (nearly 240 thousand, representing a rate of increase of 1.8 per cent per annum). The projected increases of over 60 thousand jobs for science and technology associate professionals and 115 thousand business professionals represent somewhat slower rates of growth (at 1.2 per cent per annum and 1.5 per cent per annum, respectively). An employment increase of around 70 thousand is projected for health professionals.

Females are expected to account for more of the projected job gains than males.

3. Associate professional & technical occupations

Employment for associate professional & technical occupations is expected to rise by over 410 thousand over the period to 2014. This represents the third largest single absolute increase of the SOC Major Groups. Within this SOC Major Group, culture, media and sports occupations account for the largest projected employment gain (over 140 thousand jobs) and also have the highest per cent per annum growth rate (2.2 per cent). Protective service occupations record the slowest projected rate of growth (0.1 per cent per annum). Business associate professionals are projected to experience a 10 per cent change over the period 2004 to 2014, adding over 135 thousand jobs. Elsewhere science and technology associate professionals are projected to increase in number by over 60 thousand.

Employment increases are expected to be fairly evenly divided between males and females. Over 180 thousand jobs are projected to be filled by males, which is a 0.9 per cent per annum increase over the period 2004 to 2014. A projected 1.0 per cent per annum increase is projected for females, adding 180 thousand jobs.

4. Administrative, clerical & secretarial occupations

Over the period to 2014 employment in administrative, clerical & secretarial occupations is projected to decline at an annual rate of 1 per cent, resulting in an expected loss of around 310 thousand jobs. Secretarial & related occupations and clerical & administrative occupations share in the projected employment decline, with expected losses of 210 thousand and 100 thousand jobs, respectively.

Males account for just 20 thousand all of the projected job losses, compared with a projected job loss of nearly 290 thousand for females.

5. Skilled trades occupations

The projected rate of job loss for this SOC Major Group is 0.4 per cent per annum. Skilled metal and electrical trades dominate projected job losses, with an expected reduction of nearly 285 thousand jobs over the period to 2014. Comparatively modest losses of 80 thousand jobs are projected in other skilled trades. Significant employment gains (200 thousand) are projected in skilled construction and building trades, and skilled agricultural trades are expected to add a further 50 thousand jobs by 2014.

Over the period to 2014 projected job losses are 40 thousand for females and 60 thousand for males.

6. Personal Services occupations

Employment in this SOC Major Group is projected to increase by around 370 thousand over the period to 2014. Nearly 340 thousand extra jobs are expected in caring personal service occupations, as employment is projected to increase at 2.2 per cent per annum. Around 35 thousand additional jobs in leisure occupations are expected.

Females are the main beneficiaries of net employment growth in this SOC Major Group, with 355 thousand jobs being projected.

7. Sales & customer service occupations

A gain of 330 thousand jobs is projected in this SOC Major Group between 2004 and 2014. Both sales occupations and customer service occupations contribute to this projected increase, with expected employment gains of 213 thousand and about 115 thousand, respectively.

A 19 per cent change from 2004 to 2014 is projected for males, resulting in an additional 120 thousand jobs. For females, employment is projected to increase by nearly 20 per cent, resulting in an additional 180 thousand jobs.

8. Machine & transport operatives

A loss of just over 180 thousand jobs is projected for machine & transport operatives. Between 2004 and 2014, there is a projected loss of 275 thousand jobs for process machine operatives, which is offset by a projected gain of 175 thousand jobs for drivers and other operatives.

The vast majority of jobs lost (over 180 thousand, representing a decrease of 1.2 per cent per annum) are projected to affect females.

9. Elementary occupations

An absolute loss of 550 thousand jobs in elementary occupations (the highest loss of any of the SOC Major Groups) is projected over the period between 2004 and 2014. This represents a rate of loss of 2.2 per cent per annum. By 2014 only 2 per cent of total employment is expected to be accounted for by elementary trades, the result of a projected loss of 240 thousand jobs. Around 310 thousand jobs are expected to be lost in elementary service occupations.

Females are expected to account for the majority of projected job losses.

8.6 Projections of Replacement Demands

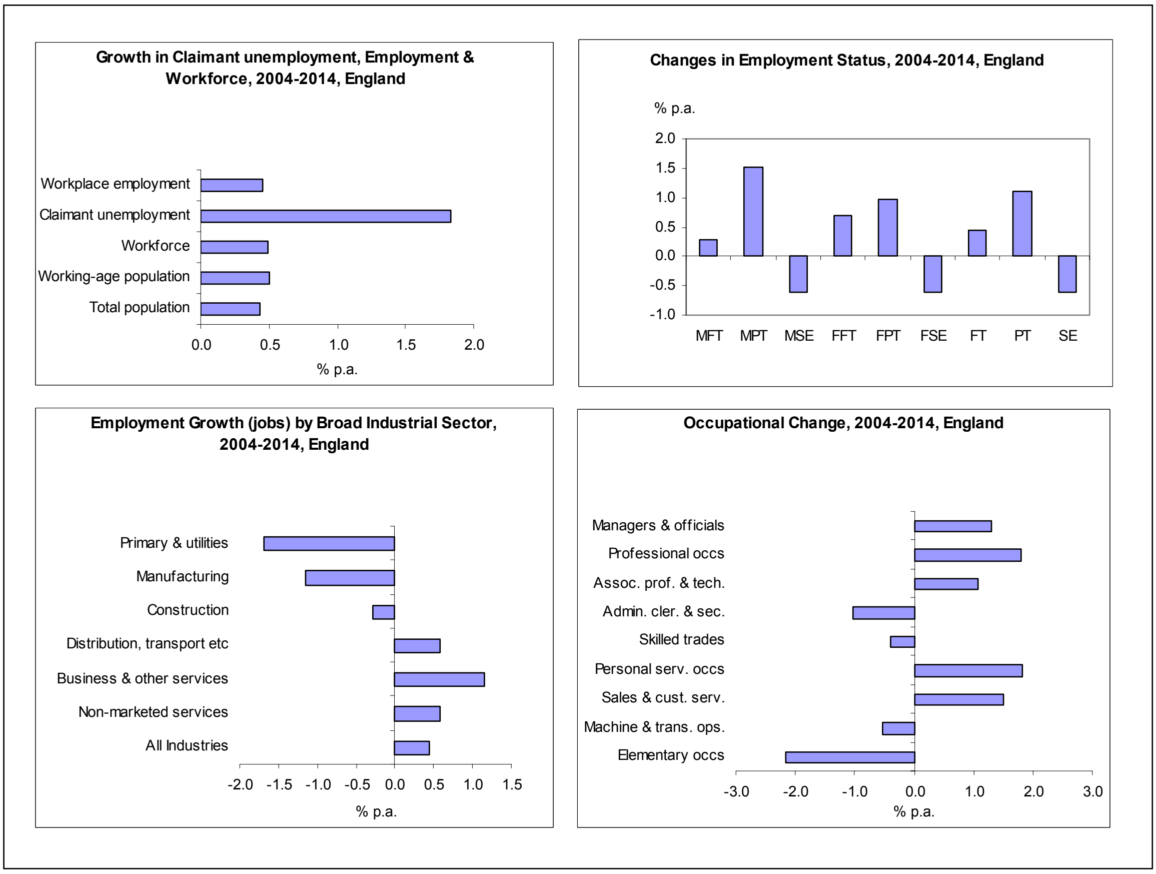
The key component of replacement demands is retirements from the workforce, especially for older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Despite some projections of employment decline for some SOC Major Groups total requirements are positive in all cases.

Positive expansion demands between 2004 and 2014 are projected for managers & senior officials (over 550 thousand), professional occupations (over 580 thousand), associate professional & technical occupations (around 410 thousand), personal services occupations (around 375 thousand), sales & customer service occupations (about 330 thousand). Of all occupations, the highest replacement demands are for managers & senior officials (almost 1½ million) followed by associate professional & technical occupations (1.2 million).

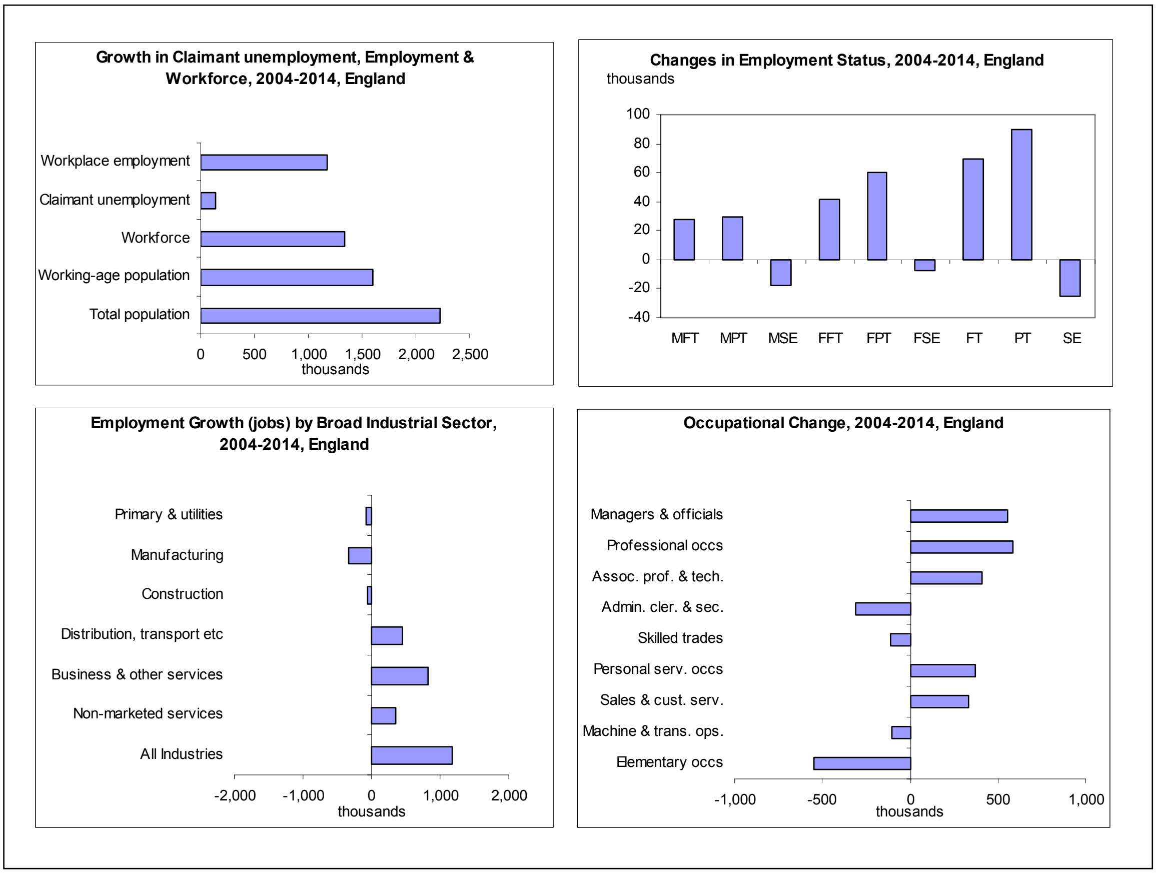
Occupations projected to suffer net job loss between 2004 and 2014 include administrative, clerical & secretarial occupations (over 310 thousand), skilled trades occupations (about 115 thousand), machine & transport operatives (100 thousand), and elementary occupations (550 thousand). Despite this, the sixth projected highest replacement demands (over 800 thousand) are for skilled trades.

Figure 11.1: Key Changes in England, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 11.2: Key Changes in England, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 11.1: Sectoral Change in England

					England							UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**	
					% of	% of	% of	% of		%	% per	%	% per
Sectoral categories	000s	000s	000s	000s	total	total	total	total	000s	change	annum	change	annum
1. Agriculture, etc	506	441	323	276	2.3	2.0	1.3	1.0	-48	-14.7	-1.6	-15.0	-1.6
2. Mining & quarrying	218	47	33	27	1.0	0.2	0.1	0.1	-7	-19.5	-2.2	-17.6	-1.9
6. Electricity, gas & water	232	156	97	80	1.1	0.7	0.4	0.3	-17	-17.5	-1.9	-16.7	-1.8
Primary sector & utilities	*956*	*643*	*454*	*383*	*4.4*	*2.9*	*1.8*	*1.4*	*-71*	*-15.7*	*-1.7*	*-15.6*	*-1.7*
3. Food, drink & tobacco	488	387	364	322	2.2	1.7	1.4	1.2	-42	-11.5	-1.2	-10.0	-1.1
4. Engineering	981	715	570	519	4.5	3.2	2.2	1.9	-51	-8.9	-0.9	-9.5	-1.0
5. Rest of manufacturing	3125	2502	2079	1844	14.4	11.1	8.1	6.9	-235	-11.3	-1.2	-11.3	-1.2
Manufacturing	*4594*	*3604*	*3013*	*2686*	*21.1*	*16.0*	*11.8*	*10.1*	*-328*	*-10.9*	*-1.1*	*-10.8*	*-1.1*
7. Construction	1568	1466	1757	1706	7.2	6.5	6.9	6.4	-51	-2.9	-0.3	-4.4	-0.4
8. Retail, distribution	3713	3932	4327	4629	17.1	17.4	17.0	17.3	302	7.0	0.7	6.7	0.6
9. Hotels & restaurants	1200	1299	1650	1753	5.5	5.8	6.5	6.6	103	6.2	0.6	5.7	0.6
10. Transport & comm.	1378	1349	1577	1617	6.3	6.0	6.2	6.1	40	2.5	0.3	2.7	0.3
Distribution transport etc.	*6291*	*6580*	*7554*	*7999*	*28.9*	*29.2*	*29.6*	*30.0*	*445*	*5.9*	*0.6*	*5.6*	*0.5*
11. Financial services	807	944	1003	1037	3.7	4.2	3.9	3.9	34	3.4	0.3	2.8	0.3
12. Other business activities	2077	2940	4226	4882	9.5	13.0	16.6	18.3	656	15.5	1.5	15.7	1.5
16. Other services	1037	1241	1584	1720	4.8	5.5	6.2	6.4	136	8.6	0.8	9.3	0.9
Business & other services	*3922*	*5125*	*6813*	*7639*	*18.0*	*22.7*	*26.7*	*28.6*	*826*	*12.1*	*1.2*	*12.2*	*1.2*
13. Public admin. & defence	1263	1183	1232	1201	5.8	5.2	4.8	4.5	-31	-2.5	-0.3	-2.3	-0.2
14. Education	1434	1704	2044	2159	6.6	7.6	8.0	8.1	116	5.7	0.6	5.7	0.6
15. Health & social work	1725	2244	2649	2920	7.9	9.9	10.4	10.9	271	10.2	1.0	9.7	0.9
Non-marketed services	*4422*	*5131*	*5925*	*6281*	*20.3*	*22.8*	*23.2*	*23.5*	*355*	*6.0*	*0.6*	*5.8*	*0.6*
All Sectors	21754	22550	25517	26694	100.0	100.0	100.0	100.0	1176	4.6	0.5	4.3	0.4

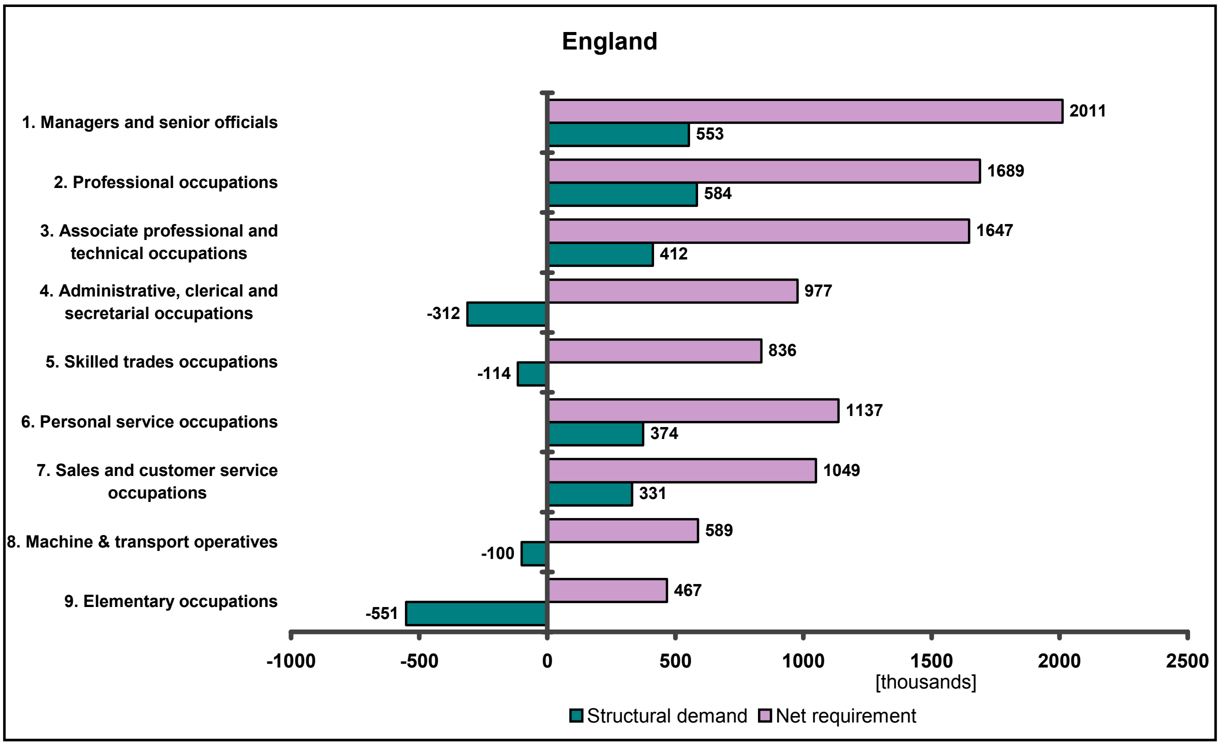
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B

Table 11.2: Occupational Change in England

	England											UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**	
sub-major group	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum
Corporate managers	1793	2231	3071	3692	8.2	9.9	12.0	13.8	620	20.2	1.9	19.9	1.8
Managers / proprietors	900	909	954	887	4.1	4.0	3.7	3.3	-67	-7.1	-0.7	-7.1	-0.7
Sc. & tech. profs.	508	606	840	998	2.3	2.7	3.3	3.7	158	18.9	1.7	18.3	1.7
Health professionals	128	171	237	308	0.6	0.8	0.9	1.2	71	29.8	2.6	29.4	2.6
Teaching & res. Profs.	771	954	1211	1452	3.5	4.2	4.7	5.4	241	19.9	1.8	21.6	2.0
Business professionals	433	535	714	828	2.0	2.4	2.8	3.1	114	15.9	1.5	14.5	1.4
Sc. & tech. assoc. profs.	362	402	518	581	1.7	1.8	2.0	2.2	63	12.2	1.2	12.4	1.2
Health assoc. profs.	589	725	885	953	2.7	3.2	3.5	3.6	68	7.7	0.7	7.8	0.8
Protect. serv. occs	179	222	336	338	0.8	1.0	1.3	1.3	3	0.8	0.1	0.1	0.0
Culture, med. & sports	231	347	582	724	1.1	1.5	2.3	2.7	142	24.5	2.2	23.5	2.1
Business assoc. profs.	845	1037	1364	1500	3.9	4.6	5.3	5.6	136	10.0	1.0	9.2	0.9
Admin & clerical	2271	2338	2402	2302	10.4	10.4	9.4	8.6	-100	-4.2	-0.4	-3.1	-0.3
Secretarial and related	1054	1038	805	593	4.8	4.6	3.2	2.2	-212	-26.4	-3.0	-25.2	-2.9
Skilled agric. trades	299	270	292	342	1.4	1.2	1.1	1.3	50	17.3	1.6	15.5	1.5
Skilled metal & electrical	1589	1291	1069	784	7.3	5.7	4.2	2.9	-285	-26.7	-3.1	-27.1	-3.1
Skilled cons. & building	979	862	985	1185	4.5	3.8	3.9	4.4	199	20.2	1.9	19.4	1.8
Other skilled trades	652	607	536	457	3.0	2.7	2.1	1.7	-79	-14.7	-1.6	-14.6	-1.6
Caring personal service	465	813	1431	1772	2.1	3.6	5.6	6.6	340	23.8	2.2	22.8	2.1
Leisure occupations	417	449	468	502	1.9	2.0	1.8	1.9	34	7.3	0.7	6.7	0.7
Sales occupations	1193	1395	1680	1898	5.5	6.2	6.6	7.1	218	13.0	1.2	12.0	1.1
Customer service occs.	121	178	361	474	0.6	0.8	1.4	1.8	113	31.3	2.8	32.2	2.8
Process machine ops.	1671	1322	1029	756	7.7	5.9	4.0	2.8	-274	-26.6	-3.0	-24.5	-2.8
Drivers & other ops.	867	829	938	1112	4.0	3.7	3.7	4.2	174	18.5	1.7	17.2	1.6
Elementary: trades	1384	1073	852	541	6.4	4.8	3.3	2.0	-312	-36.6	-4.4	-35.5	-4.3
Elementary: service	2051	1945	1956	1717	9.4	8.6	7.7	6.4	-240	-12.2	-1.3	-12.9	-1.4
All occupations	21754	22550	25517	26694	100.0	100.0	100.0	100.0	1176	4.6	0.5	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 11.4: Replacement Demands in England



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

12. WALES

12.1 Overview

Projected population, labour force and employment growth in Wales is similar to the UK average. A distinctive feature of labour supply and demand in Wales is the fact that economic activity rates are much lower than the UK average. The unemployment rate is higher than across the UK as a whole.

Job losses are expected to occur at rates in excess of the UK average in the primary sector & utilities, manufacturing and construction. Despite projected growth in all broad service sectors, only in business & other services does the expected rate of employment increase exceed the UK average. Non-marketed services are projected to continue to account for a much larger share of total employment in Wales than across the UK as a whole.

A key feature of employment change over the medium-term has been the increasing proportion of employment accounted for by females. However, between 2004 and 2014, full-time female jobs are projected to fall by 10 thousand. More part-time than full-time jobs are projected to be created for males during the decade to 2014.

Managers & senior officials, professional occupations, associative professional & technical occupations, personal service occupations, sales & customer service occupations, and machine and transport operatives are all projected to show an increase in employment. However, replacement demands mean that all occupational groups have an overall positive employment requirement.

12.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 12.1 provides a general overview, while Figure 12.1 presents a graphical summary of the supply side. Figures 12.2 and 12.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population
The total population of Wales is projected to increase by over 100 thousand, between 2004 and 2014, to reach 3.07 million (see Figures 12.1 and 12.2). At a rate of increase of 0.4 per cent per annum, this represents a rate of growth in line with the UK average.

Population 16+
The 16+ population in Wales is expected to grow broadly in line with the UK average over the forecast period; increasing by 3.8 per cent over 2004-09 and 2.3 per cent over 2009-14.

Working-age Population
The working age population is projected to increase by 0.4 per cent per annum, which is slightly below the projected 0.5 per cent per annum for the UK.

***Workf*orce**
The workforce is projected to increase by 60 thousand, to 1.4 million in 2014. At 0.4 per cent per annum, this represents a marginally slower growth rate than the UK average of 0.5 per cent per annum.

Labour force
The labour force is expected to increase more slowly than the population aged 16+, and the overall activity rate is projected to decline slightly over the forecast period.

ILO unemployment
ILO unemployment is expected to rise quite sharply over 2004-09, faster than the increase expected for the UK. It is then expected to continue to rise slightly to 2014. There is a similar pattern for males and females.

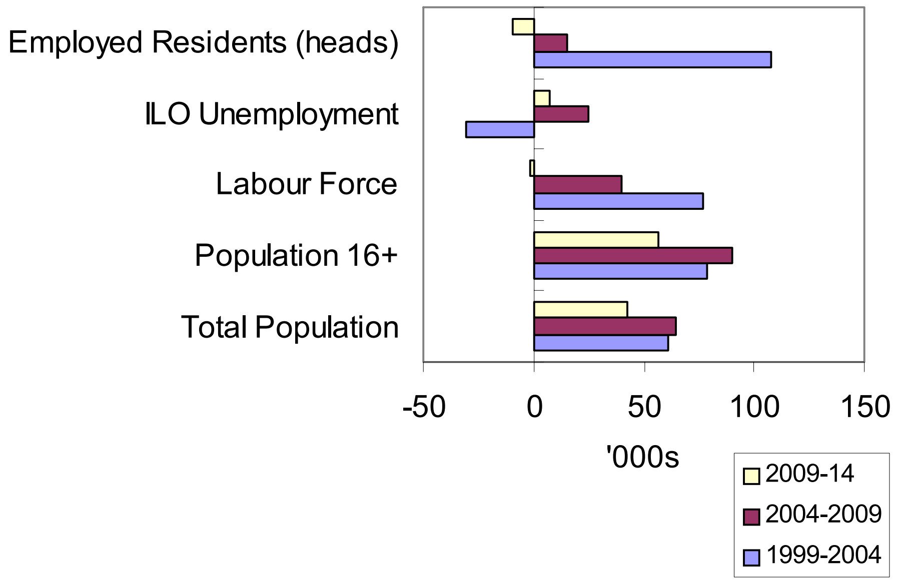
Claimant Unemployment
Unemployment is projected to increase slightly by around 20 thousand between 2004 and 2014, to reach 60 thousand. This represents a rate of increase faster than the UK average. The unemployment rate is expected to remain higher than, and diverge from, the UK average.

Employed Residents
Among all the parts of the UK, Wales is expected to see the weakest growth in the number of female employed residents over the period 2004-14. Female employment on this measure is expected to increase by just 1 per cent over 2004-09 and to decline by 0.6 per cent over 2009-14. Male employment is expected to follow a similar pattern ahead of the UK average. Overall, employment in Wales is expected to increase by only ½ per cent over 2004-14.

Workplace Employment
Workplace employment in Wales is expected to rise by about 55 thousand to reach over 1.3 million by 2014. At 0.4 per cent per annum, the projected growth rate in employment is the same as the UK average. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is “double jobbing” (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In Wales the labour market residual is small and negative reflecting low double jobbing and a net outward flow of commuters.

Figure 12.1: Changes in Population and the Labour Force in Wales



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 12.1: Population and Labour Force [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	1,408	1,439	1,471	1,498	2.2	2.2	1.9
Population 16+	1,103	1,143	1,191	1,222	3.6	4.2	2.7
Labour Force	709	738	755	754	4.0	2.4	-0.2
Activity Rate	64.3	64.6	63.4	61.7	0.3	-1.2	-1.7
ILO Unemployment	61	38	53	57	-37.7	38.2	8.2
ILO Unemployment rate (%)	8.6	5.2	7.0	7.5	-3.4	1.8	0.6
Employed Residents (heads)	652	694	703	697	6.4	1.3	-0.8
Labour Market Residual (2)	-5	-17	-13	8			
Female							
Total Population	1,493	1,523	1,555	1,571	2.0	2.1	1.0
Population 16+	1,204	1,243	1,285	1,310	3.3	3.4	1.9
Labour Force	591	639	662	661	8.2	3.5	-0.1
Activity Rate	49.1	51.4	51.5	50.5	2.3	0.1	-1.0
ILO Unemployment	35	27	37	40	-22.9	38.1	8.0
ILO Unemployment rate (%)	5.9	4.2	5.6	6.1	-1.7	1.4	0.5
Employed Residents (heads)	552	618	624	621	12.0	1.0	-0.6
Labour Market Residual (2)	19	-19	-18	-10			
Total							
Total Population	2,901	2,961	3,026	3,069	2.1	2.2	1.4
Population 16+	2,307	2,386	2,476	2,532	3.4	3.8	2.3
Working-age Population	1,727	1,784	1,823	1,863	3.3	2.2	2.2
Labour Force	1,300	1,377	1,417	1,415	5.9	2.9	-0.1
Workforce	1,289	1,324	1,361	1,384	2.7	2.8	1.7
Activity Rate	56.4	57.7	57.2	55.9	1.3	-0.5	-1.3
ILO Unemployment	96	65	90	97	-32.3	38.2	8.1
ILO Unemployment rate (%)	7.4	4.7	6.3	6.9	-2.7	1.6	0.5
Claimant Unemployment	64	40	56	60	-37.2	38.1	8.1
Claimant Unemployment rate	3.7	2.3	3.1	3.2	-1.5	0.8	0.2
Employed Residents (heads)	1,204	1,312	1,327	1,318	9.0	1.2	-0.7
Workplace employment (jobs)	1,213	1,271	1,292	1,318	4.8	1.7	2.0
Labour Market Residual[2]	14	-36	-31	-3			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

12.3 Industrial Employment Structure

Overview of Broad sectors

In Wales, employment losses are projected in the primary sector & utilities, manufacturing and construction, while distribution, transport, etc, business & other services and non-marketed services are expected to experience employment gains (see Figures 12.1 and 12.2). In absolute terms, and in contrast to all other parts of the UK, the dominant feature of employment decline is not manufacturing (7 thousand jobs) but the 15 thousand jobs expected to be lost in construction. A loss of 6 thousand jobs is projected in the primary sector & utilities. These job losses contrast with gains of over 35 thousand jobs in business & other services, of over 20 thousand in non-marketed services and of over 15 thousand in distribution, transport, etc.

Primary sector & utilities

Within the primary sector & utilities employment is projected to decline at 1.8 per cent per annum, which is faster than the UK average. Agriculture dominates projected job losses between 2004 and 2014, continuing a trend of long-term decline. There are projected to be around 20 thousand jobs in agriculture hunting forestry & fishing in 2014, compared with 65 thousand in 1984. Mining & quarrying is the only sectoral category here not expected to experience any job losses. A loss of a thousand jobs is projected for electricity gas & water.

The majority of job losses in the primary sector and utilities sector are for males.

Manufacturing

7 thousand jobs are expected to be lost in this sector. The projected decline in employment in manufacturing in Wales (a 4 per cent reduction between 2004 and 2014) is less than the UK average (a projected reduction of nearly 11 per cent). The rest of manufacturing accounts for almost all the employment decline in the broad industrial sector. No job losses are projected for engineering, in contrast to the losses expected in the UK. Only a small employment decrease (1 thousand jobs) is expected in food, drink & tobacco.

Females account for 6 thousand of the jobs losses expected in manufacturing.

Construction

Employment in construction in Wales is projected to decline at a rate of 1.8 per cent per annum, with almost 15 thousand jobs lost over the period to 2014. This is a faster rate of decline than the UK average (0.4 per cent per annum).

Only a thousand of the 15 thousand jobs lost are expected to be accounted for by women.

Distribution, transport etc.

The projected annual average rate of employment growth in distribution, transport, etc in Wales is 0.5 per cent, which is the same as the UK average. Within this broad sector retail distribution is expected to account for 7 thousand extra jobs. An additional thousand jobs are in transport storage & communication as employment expands at a much greater rate than the UK average. However, a projected loss of jobs in hotels & restaurants contrasts with small employment gains at national level.

Business & other services

The greatest projected employment increase (37 thousand jobs) is expected in business & other services. In both other business activities (20 thousand extra jobs) and other services (15 thousand extra jobs) projected annual average growth rates are similar to those expected for the UK.

Both males (over 20 thousand) and females (over 15 thousand) are expected to benefit from these potential job gains.

Non-marketed services

Employment in non-marketed services is projected to expand by over 20 thousand over the period to 2014. An additional 16 thousand jobs are expected in health & social work, and an extra 6 thousand in education. In public administration & defence employment is projected to be stable, whereas jobs losses are projected for the UK. By 2014 this broad sector is expected to account for nearly 30 per cent of total employment, compared with 22 per cent in 1984.

A small gain of 3 thousand jobs is expected for females, with the remaining 18 thousand jobs projected to be filled by males.

12.4 Change in Employment by Gender and Employment Status

Males

Between 2004 and 2014 a gain of over 20 thousand male full-time jobs in Wales is projected (representing an annual rate of increase of 0.5 per cent), which is greater than the UK average. Projected growth in part-time jobs for males outstrips that in full-time (Figure 12.2).

Females

For females there is a projected loss of 10 thousand full-time employees and a projected gain of 30 thousand part-time employees between 2004 and 2005. Projected losses in full-time jobs for females are confined to Wales. However, a growth rate of 1 per cent per annum for female part-time employees, is exceeded only by the West Midlands. The average projected rate of growth across the UK is 0.7 per cent per annum.

12.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such ‘structural demand’ provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by ‘replacement demand’.

At SOC Major Group level, the largest increase in occupational employment between 2004 and 2014 is projected for professional occupations with an expected increase of almost 30 thousand jobs (see Figure 12.2). This represents an increase at a similar rate as across the UK as a whole. Other substantial employment gains are expected for personal service occupations (22 thousand jobs), associate professional and technical occupations (15 thousand jobs), managers and senior officials (over 15 thousand jobs) and sales and customer service occupations (10 thousand jobs). For machine and transport operatives a small increase of 1 thousand jobs is projected for the period to 2014.

Elementary occupations and skilled trades occupations dominate job losses, with employment expected to contract by about 35 thousand and 10 thousand, respectively. In both instances these losses represent rates of decline in excess of the UK average. A loss of 5 thousand jobs is expected for administrative, clerical and secretarial occupations.

1. Managers & senior officials

The projected rate of employment increase for this Major Group stands at 1.1 per cent per annum. A net gain of 17 thousand jobs is a function of a projected 20 thousand gain for corporate managers, coupled with an expected employment loss for managers & proprietors (see Table 12.2).

Both males (7 thousand extra jobs) and females (10 thousand extra jobs) are expected to benefit from the projected employment increase.

2. Professional occupations

An additional 30 thousand jobs are expected over the period to 2014. This represents an annual average growth rate of 1.8 per cent, which is akin to the UK average. The biggest employment increase is projected to occur for teaching & research professionals (20 thousand additional jobs). The remaining 10 thousand additional jobs projected are accounted for by a gain of 5 thousand jobs for health professionals and around 3 thousand for science and technology professionals. Numbers of business professionals are expected to remain relatively stable.

Females are projected to account for two-thirds of the expected job gains.

3. Associate professional & technical occupations

Employment in associate professional and technical occupations is expected to increase by more than 15 thousand jobs between 2004 and 2014. Gains of around 5 thousand jobs are expected for three sub-major groups: culture, media & sports occupations, health associate professionals and science & technical associate professionals. Employment levels in protective service occupations are expected to remain stable, contrasting with growth across the UK.

Males and females are expected to benefit fairly equally from the projected employment increases.

4. Administrative, clerical & secretarial occupations

Wales displays a projected rate of employment decrease (0.3 per cent per annum) for the Major Group considerably slower than the UK average (0.9 per cent per annum).

The projected loss of 5 thousand jobs is a function of job loss in secretarial and related occupations offset by a very small increase in administrative and secretarial occupations (contrasting with projected decline across the UK as a whole).

A gain of 3 thousand jobs for males is offset by a loss of about 8 thousand jobs for females.

5. Skilled trades occupations

In Wales employment in skilled trades occupations is expected to decline by 10 thousand between 2004 and 2014. Skilled metal and electrical trades account for the largest single decline (15 thousand jobs), with other skilled trades adding a further 2 thousand. An additional 7 thousand jobs are projected for skilled construction and building.

Twice as many males as females are expected to be affected by the projected job losses.

6. Personal services occupations

With a projected increase of more than 20 thousand jobs, the projected rate of growth of 1.9 per cent per annum in Wales exceeds the UK average.

Virtually all of the expected employment growth is accounted for by caring personal service occupations. A small increase in employment is expected in leisure occupations.

Females account for virtually all of these projected gains, with only a very modest increase projected for males.

7. Sales & customer service occupations

Around 10 thousand extra jobs are expected in sales & customer service occupations between 2004 and 2014. This represents an annual average growth rate of just 0.9 per cent per annum, which well below the 1.5 per cent per annum increase projected for the UK. Sales occupations and customer service occupations contribute in fairly even measure to this overall increase, but it is the latter occupational group that displays the fastest growth rate.

Almost twice as many females as males are expected to benefit from the projected additional employment.

8. Machine & transport operatives

Over the period to 2014 a gain of 1 thousand jobs is expected. Wales is the only part of the UK where a decrease in employment is not projected for this occupation. The small projected employment increase is entirely due to the projected job increase in drivers & other operatives. A 4 thousand job reduction is expected for process machine operatives.

Females are expected to account for all of the job losses, while employment levels for males are expected to increase by 8 thousand.

9. Elementary occupations

Elementary occupations are projected to lose about 35 thousand jobs. At 2.3 per cent per annum, the projected rate of job loss slightly exceeds the UK average. Around 17 thousand jobs are expected to be lost in each of elementary service occupations and elementary trades occupations.

Employment for males is projected to contract by about 10 thousand, and for females by well over 20 thousand.

8.6 Projections of Replacement Demands

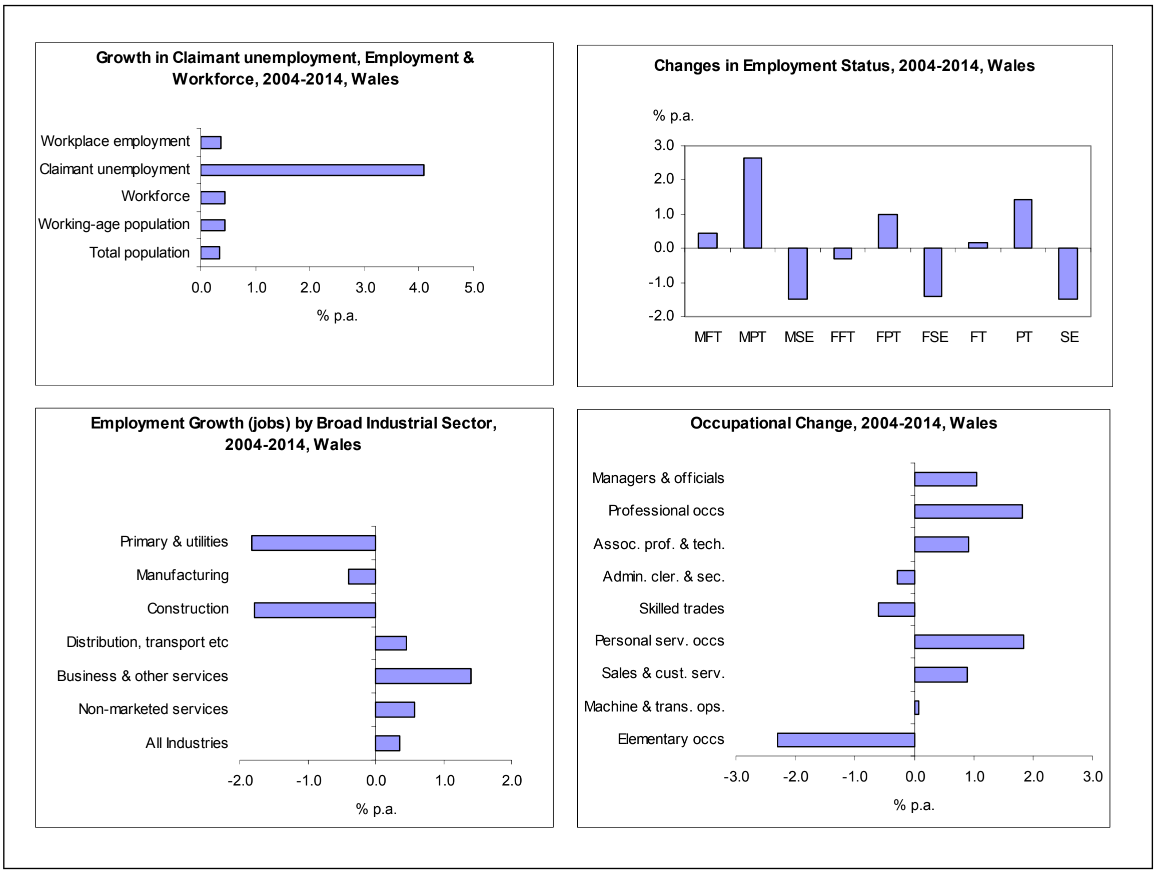
The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Total requirements are positive for all SOC Major Groups.

Professional occupations display the largest gain in employment on the basis of expansion demand, with almost 30 thousand extra jobs expected. Replacement demand is even greater, so that the total requirement is for over 80 thousand extra people in such occupations by 2014. Alongside professional occupations, in absolute terms, replacement demands are highest for managers & senior officials and associate professional & technical occupations.

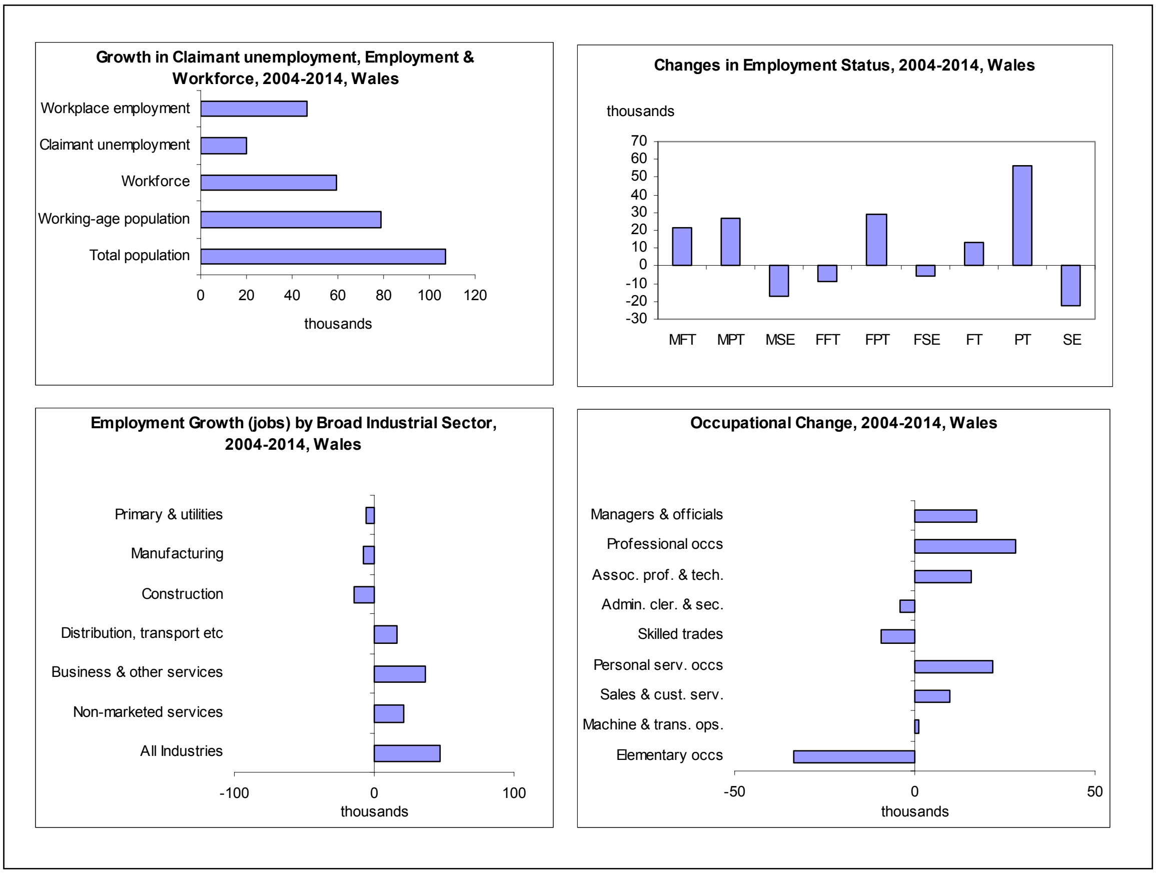
In the SOC Major Groups where projected expansion demand suggests employment decreases, overall requirements remain positive. Hence, there are total requirements of over 50 thousand jobs for administrative clerical & secretarial occupations; almost 45 thousand for skilled trades and 25 thousand for elementary occupations.

Figure 12.2: Key Changes in Wales, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 12.3: Key Changes in Wales, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 12.2: Sectoral Change in Wales

					Wales							UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum
1. Agriculture, etc	63	40	26	22	5.7	3.3	2.0	1.6	-4	-16.7	-1.8	-15.0	-1.6
2. Mining & quarrying	34	4	2	2	3.1	0.3	0.2	0.1	0	-19.3	-2.1	-17.6	-1.9
6. Electricity, gas & water	12	9	6	5	1.1	0.7	0.5	0.4	-1	-16.0	-1.7	-16.7	-1.8
Primary sector & utilities	*109*	*53*	*34*	*29*	*9.8*	*4.4*	*2.7*	*2.2*	*-6*	*-16.7*	*-1.8*	*-15.6*	*-1.7*
3. Food, drink & tobacco	19	22	24	23	1.7	1.8	1.9	1.8	-1	-3.2	-0.3	-10.0	-1.1
4. Engineering	42	50	37	37	3.8	4.1	2.9	2.8	0	-0.9	-0.1	-9.5	-1.0
5. Rest of manufacturing	150	157	128	122	13.4	12.9	10.1	9.2	-6	-5.0	-0.5	-11.3	-1.2
Manufacturing	*212*	*229*	*190*	*182*	*19.0*	*18.9*	*14.9*	*13.8*	*-7*	*-4.0*	*-0.4*	*-10.8*	*-1.1*
7. Construction	85	81	87	72	7.6	6.7	6.8	5.5	-14	-16.5	-1.8	-4.4	-0.4
8. Retail, distribution	181	191	202	209	16.2	15.7	15.9	15.9	7	3.6	0.3	6.7	0.6
9. Hotels & restaurants	64	88	88	95	5.7	7.2	6.9	7.2	8	8.7	0.8	5.7	0.6
10. Transport & comm.	58	55	60	61	5.2	4.5	4.7	4.6	1	2.5	0.2	2.7	0.3
Distribution transport etc.	*303*	*334*	*350*	*366*	*27.1*	*27.5*	*27.5*	*27.8*	*16*	*4.7*	*0.5*	*5.6*	*0.5*
11. Financial services	25	28	30	30	2.3	2.3	2.4	2.3	0	1.0	0.1	2.8	0.3
12. Other business activities	82	101	136	156	7.3	8.3	10.7	11.9	20	15.0	1.4	15.7	1.5
16. Other services	56	71	78	94	5.0	5.8	6.2	7.2	16	20.5	1.9	9.3	0.9
Business & other services	*164*	*199*	*244*	*281*	*14.7*	*16.4*	*19.2*	*21.3*	*37*	*15.0*	*1.4*	*12.2*	*1.2*
13. Public admin. & defence	69	80	87	86	6.2	6.6	6.8	6.5	0	-0.4	0.0	-2.3	-0.2
14. Education	81	96	115	121	7.2	7.9	9.1	9.2	6	5.1	0.5	5.7	0.6
15. Health & social work	95	141	164	180	8.5	11.6	12.9	13.7	16	9.5	0.9	9.7	0.9
Non-marketed services	*244*	*317*	*366*	*387*	*21.9*	*26.1*	*28.8*	*29.4*	*21*	*5.8*	*0.6*	*5.8*	*0.6*
All Sectors	1117	1214	1271	1318	100.0	100.0	100.0	100.0	47	3.7	0.4	4.3	0.4

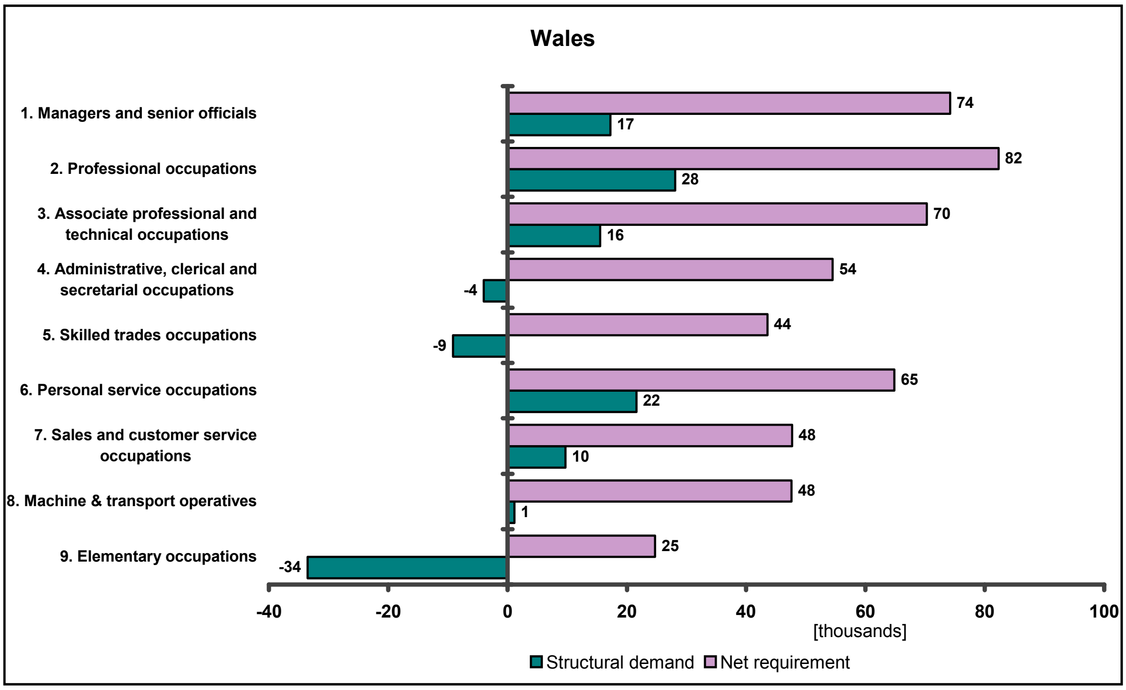
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 12.3: Occupational Change in Wales

	Wales											UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**	
Occupational sub-major group	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum
Corporate managers	75	93	112	130	6.7	7.7	8.8	9.9	19	16.6	1.5	19.9	1.8
Managers / proprietors	48	49	45	43	4.3	4.0	3.5	3.3	-1	-2.8	-0.3	-7.1	-0.7
Sc. & tech. profs.	21	24	28	31	1.9	2.0	2.2	2.4	3	9.8	0.9	18.3	1.7
Health professionals	7	10	15	21	0.6	0.8	1.2	1.6	6	38.2	3.3	29.4	2.6
Teaching & res. Profs.	43	58	76	95	3.9	4.7	6.0	7.2	19	25.3	2.3	21.6	2.0
Business professionals	18	20	22	22	1.6	1.6	1.7	1.7	0	1.4	0.1	14.5	1.4
Sc. & tech. assoc. profs.	15	18	22	25	1.4	1.5	1.7	1.9	3	15.4	1.4	12.4	1.2
Health assoc. profs.	35	46	55	59	3.1	3.8	4.3	4.5	4	7.7	0.7	7.8	0.8
Protect. serv. occs	9	11	16	16	0.8	0.9	1.2	1.2	0	1.1	0.1	0.1	0.0
Culture, med. & sports	9	13	19	24	0.8	1.1	1.5	1.9	5	27.6	2.5	23.5	2.1
Business assoc. profs.	35	43	50	52	3.2	3.5	3.9	4.0	2	5.0	0.5	9.2	0.9
Admin & clerical	98	109	112	114	8.8	9.0	8.8	8.7	2	2.2	0.2	-3.1	-0.3
Secretarial and related	38	42	34	27	3.4	3.4	2.7	2.1	-6	-19.1	-2.1	-25.2	-2.9
Skilled agric. trades	39	26	22	24	3.5	2.2	1.7	1.8	2	9.0	0.9	15.5	1.5
Skilled metal & electrical	86	74	55	40	7.7	6.1	4.3	3.0	-15	-27.7	-3.2	-27.1	-3.1
Skilled cons. & building	54	51	54	61	4.8	4.2	4.3	4.6	7	12.0	1.1	19.4	1.8
Other skilled trades	32	34	27	25	2.9	2.8	2.2	1.9	-2	-9.0	-0.9	-14.6	-1.6
Caring personal service	26	50	84	103	2.3	4.1	6.6	7.8	19	23.1	2.1	22.8	2.1
Leisure occupations	22	25	24	26	2.0	2.1	1.9	2.0	2	9.7	0.9	6.7	0.7
Sales occupations	66	77	89	92	5.9	6.3	7.0	7.0	4	4.0	0.4	12.0	1.1
Customer service occs.	5	8	17	23	0.5	0.7	1.3	1.7	6	37.1	3.2	32.2	2.8
Process machine ops.	94	98	87	83	8.4	8.1	6.8	6.3	-4	-5.0	-0.5	-24.5	-2.8
Drivers & other ops.	51	48	47	53	4.6	4.0	3.7	4.0	6	11.6	1.1	17.2	1.6
Elementary: trades	82	72	56	39	7.3	5.9	4.4	3.0	-17	-30.1	-3.5	-35.5	-4.3
Elementary: service	110	116	105	88	9.8	9.5	8.2	6.7	-17	-15.9	-1.7	-12.9	-1.4
All occupations	1117	1214	1271	1318	100.0	100.0	100.0	100.0	47	3.7	0.4	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 12.4: Replacement Demands in Wales



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

13. SCOTLAND

13.1 Overview

Scotland contains large urban areas, such as Glasgow and Edinburgh and also some of the most sparsely populated areas in the UK in the Highlands and Islands. The two major urban areas have a strong business and financial services sector. The large urban areas also include pockets of deprivation as well as more prosperous areas, and continue to see major regeneration activity. Scotland's more remote rural areas face distinctive problems of peripherality and lack of access to education, training and employment opportunities.

Across Scotland the population is expected to marginally increase between 2004 and 2014, although an increase in the population of working age of around 46 thousand is projected. The 'Fresh Talent' initiative is concerned with attracting more people to Scotland. Employment is projected to increase at a slower rate than across the UK as a whole, and the unemployment rate is also expected to remain slightly higher than the UK average.

At a broad sectoral level, projected employment increases are expected in distribution, transport and other services, business & other services and non-marketed services. Projected job losses are concentrated in manufacturing, with an expected 40 thousand reduction in employment levels over the period to 2014.

For Scotland, even where projected structural changes suggest an overall reduction in employment levels, replacement demands mean that total requirements are positive.

13.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 13.1 provides a general overview, while Figure 13.1 presents a graphical summary of the supply side. Figures 13.2 and 13.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population

The total population of Scotland is projected to increase only marginally between 2004 and 2014, reaching just under 5.1 million (see Figure 13.2).

Population 16+

Of the Celtic nations, Scotland is expected to experience the weakest growth in the population aged 16+ over the period 2004-14, with an overall increase of just 3 per cent.

Working-age Population

The working age population is projected to increase by around 46 thousand between 2014. This is a very moderate increase of 0.1 per cent per annum, compared with a rate of 0.5 per cent across the UK as a whole.

Work force

The workforce is projected to increase by about 75 thousand, to reach 2.7 million in 2014, at an annual growth rate of 0.3 per cent. This is expected to be accompanied by an equally weak rise in the labour force, of just 1.2 per cent.

ILO unemployment
The level of ILO unemployment in Scotland is expected to increase by around 40 thousand between 2004 and 2014. Over the same period female ILO unemployment is expected increase by 14 thousand, but the bulk of the increase is expected to be for males.

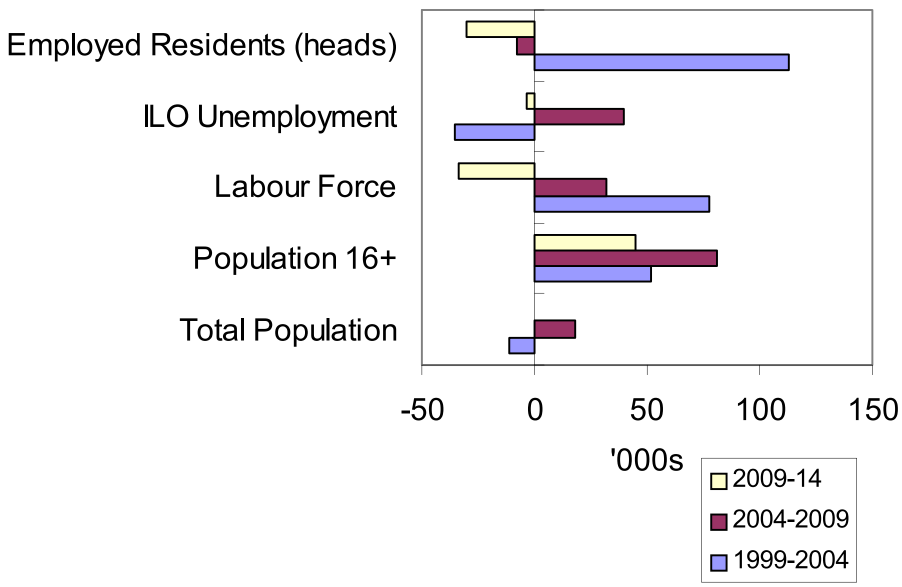
Claimant Unemployment
Claimant unemployment is expected to increase by around 20 thousand between 2004 and 2014, to just over 115 thousand in 2014. This represents a somewhat faster rate of increase than the UK average, such that the unemployment rate in Scotland is expected to remain higher than the UK average.

Employed Residents
Employment in Scotland as measured by the number of employed residents is expected to fall slightly. Virtually all the decline over 2004-14 will be in the male labour pool, with female employment expected to decline only very slightly.

Workplace Employment
Total workplace employment in Scotland, as measured by the number of jobs, is projected to increase by 50 thousand to reach about 2.6 million in 2014. At 0.2 per cent per annum, this is half the rate of employment increase projected for the UK. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is "double jobbing" (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In Scotland the labour market residual is around 200 thousand. This mainly reflects double jobbing.

Figure 13.1: Changes in Population and the Labour Force in Scotland



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 13.1: Population and Labour Force [1]

	1999	2004	2009	2014	percentage change over period 1999-2004	2004-09	2009-14
Male							
Total Population	2,437	2,436	2,441	2,442	0.0	0.2	0.0
Population 16+	1,927	1,959	1,998	2,022	1.7	2.0	1.2
Labour Force	1,318	1,351	1,360	1,338	2.5	0.6	-1.6
Activity Rate	68.4	69.0	68.1	66.2	0.6	-0.9	-1.9
ILO Unemployment	114	92	117	115	-19.3	26.6	-1.7
ILO Unemployment rate (%)	8.7	6.8	8.6	8.6	-1.8	1.8	0.0
Employed Residents (heads)	1,211	1,256	1,243	1,224	3.7	-1.0	-1.6
Labour Market Residual (2)	55	64	73	95			
Female							
Total Population	2,635	2,625	2,638	2,638	-0.4	0.5	0.0
Population 16+	2,150	2,169	2,212	2,232	0.9	2.0	0.9
Labour Force	1,153	1,198	1,221	1,209	3.9	2.0	-1.0
Activity Rate	53.6	55.2	55.2	54.2	1.6	0.0	-1.0
ILO Unemployment	70	57	72	71	-18.6	26.7	-1.8
ILO Unemployment rate (%)	6.1	4.8	5.9	5.9	-1.3	1.2	0.0
Employed Residents (heads)	1,076	1,144	1,149	1,138	6.3	0.4	-0.9
Labour Market Residual (2)	89	76	99	134			
Total							
Total Population	5,072	5,061	5,080	5,079	-0.2	0.4	0.0
Population 16+	4,077	4,128	4,209	4,254	1.3	2.0	1.1
Working-age Population	3,144	3,161	3,174	3,207	0.5	0.4	1.0
Labour Force	2,471	2,549	2,581	2,548	3.2	1.3	-1.3
Workforce	2,579	2,641	2,691	2,714	2.4	1.9	0.9
Activity Rate	60.6	61.7	61.3	59.9	1.1	-0.4	-1.4
ILO Unemployment	184	149	189	185	-19.0	26.6	-1.7
ILO Unemployment rate (%)	7.4	5.8	7.3	7.3	-1.6	1.5	0.0
Claimant Unemployment	131	93	117	115	-29.1	26.6	-1.7
Claimant Unemployment rate	4.2	2.9	3.7	3.6	-1.2	0.8	-0.1
Employed Residents (heads)	2,287	2,400	2,392	2,362	4.9	-0.3	-1.3
Workplace employment (jobs)	2,413	2,522	2,543	2,572	4.5	0.8	1.1
Labour Market Residual[2]	144	140	172	228			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls

Notes:

(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.

(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

13.3 Industrial Employment Structure

Overview of Broad sectors

At the broad sectoral level, the picture for Scotland is one of employment losses in the primary sector & utilities, manufacturing, construction and employment gains in distribution, transport, etc, business & other services and non-marketed services (see Table 13.1).

Primary sector & utilities

At 2 per cent per annum, the projected rate of employment loss (15 thousand) in the primary sector & utilities is faster than the UK rate of 1.7 per cent per annum. Job losses are projected in agriculture hunting fishing & forestry (10 thousand jobs), mining & quarrying (3 thousand jobs) and in electricity gas and water (2 thousand jobs).

Male employment is projected to fall by 13 thousand between 2004 and 2014, at a rate of 2 per cent per annum, which is slower than the rates projected for both England and the UK. A comparatively minor loss of 3 thousand jobs is projected for women.

Manufacturing

By 2014 there are projected to be 220 thousand manufacturing jobs in Scotland, as employment contracts at 1.6 per cent per annum (this represents a faster rate of decline than across the UK as a whole). The fastest rate of job loss (2.5 per cent per annum, compared with 1 per cent per annum across the UK) is projected for engineering, with a loss of over 13 thousand jobs. Around 25 thousand jobs are expected to be lost in the rest of manufacturing, where the rate of job loss again exceeds the UK average. Around 2 thousand jobs are projected to be lost in food drink & tobacco.

Males are expected to account for 40 thousand of the jobs lost. Female employment in manufacturing is expected to contract by 30 thousand.

Construction

Construction employment in Scotland is projected to decline by 17 thousand between 2004 and 2014.

Males are expected to bear the brunt of job losses, and are projected to lose over 15 thousand jobs between 2004 and 2014.

Distribution, transport etc.

Employment in distribution, transport, etc in Scotland is projected to increase by 0.3 per cent per annum. Employment growth is evident across all parts of this broad sector. A gain of 15 thousand jobs is projected for retail distribution, with employment in hotels & restaurants projected to increase by 0.1 per cent per annum. A further 6 thousand jobs are projected to be gained in transport, storage & communication.

Job gains are expected to be fairly evenly distributed between males and females, with men projected to account for 13 thousand additional jobs and women 10 thousand additional jobs.

Business & other services

By far the greatest projected employment increase in Scotland is in business & other services. An additional 70 thousand jobs are projected between 2004 and 2014, representing an annual average growth rate of 1.1 per cent per annum, which is slightly higher than that for the UK. The greatest projected increases within this sector are projected for other business activities with over 55 thousand extra jobs. Almost 20 thousand additional jobs are expected in other services. A loss of nearly 5 thousand jobs is expected in banking & insurance.

Females are projected to be the main beneficiaries of employment growth in this broad sector. They are projected to gain around 40 thousand jobs (this represents an increase of 1.3 per cent per annum increase over the period from 2004 to 2014).

Non-marketed services

The projected annual average rate of employment growth in non-marketed services is 0.4 per cent per annum. Job gains are fairly evenly distributed between health & social work and education. A decrease of 3 thousand jobs in public administration & defence is expected.

A small gain of 5 thousand jobs is projected for males, with women projected to fill over 20 thousand jobs.

13.4 Change in Employment by Gender and Employment Status

Males

Male full-time employment is projected to increase by 10 thousand to 970 thousand by 2014.

Male part-time employment is projected to increase by 5 thousand, to reach 160 thousand in 2014. The rate of increase in part-time employment is faster than that in full-time employment.

Females

By 2014, it is projected that 608 thousand women will be in full-time employment. This represents a modest increase of around 5 thousand full time jobs over the period to 2014.

Female part-time employment is projected to increase by 0.9 per cent per annum to reach almost 600 thousand in 2014: an increase of 50 thousand from 2004.

13.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such 'structural demand' provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by 'replacement demand'.

At the level of SOC major groups, the largest increase in occupational employment between 2004 and 2014 is projected for professional occupations, with an expected increase of about 70 thousand jobs (see Figure 13.2). Employment increases are also expected for managers & senior officials, associate professional & technical occupations, personal service occupations and sales & customer service occupations.

The two occupations projected to experience the largest job losses are elementary occupations and skilled trades occupations, where employment reductions of 70 thousand and 20 thousand, respectively, are expected.

1. Managers & senior officials

Managers and senior official are projected to gain around 35 thousand jobs by 2014.

A projected increase of nearly 45 thousand jobs for corporate managers is offset by the expected loss of nearly 10 thousand jobs amongst managers & proprietors.

Females are projected to be the main beneficiary of this additional employment, gaining over 35 thousand jobs between 2004 and 2014. Conversely, males are expected to lose a thousand jobs: Scotland is the only part of the UK where a reduction in male employment in this occupation is expected.

2. Professional occupations

Employment in professional occupations is projected to increase by over 65 thousand by 2014.

In absolute terms, projected growth in employment in Scotland is concentrated amongst teaching & research professionals, with a projected increase of over 45 thousand jobs. At 2.8 per cent per annum, this represents a rate of growth in excess of the UK average (2 per cent per annum). Science & technology professionals, with an expected 12 thousand extra jobs, record the next largest increase. Much more modest employment increases are projected for health professionals and business professionals.

Of these additional jobs, some 50 thousand are expected to be taken by women.

3. Associate professional & technical occupations

Employment for associate professional & technical occupations is expected to increase by 17 thousand over the period to 2014. This represents a an annual rate of change of 0.5 per cent.

Within this SOC major group, science & technology associate professionals and culture, media & sports occupations and health associate professionals account for the main employment gains.

All the projected employment gains are expected to be filled by women, with males projected to lose 3 thousand jobs.

4. Administrative, clerical & secretarial occupations

Over the period to 2014 employment in this SOC major group is projected to decline by 8 thousand jobs. This represents a slower rate of loss (0.3 per cent per annum) than the UK average (1 per cent per annum)

Secretarial & related occupations account for nearly all of the projected loss of around 15 thousand jobs. Employment for clerical & administrative occupations remains fairly stable, increasing by about 5 thousand.

Up to 10 thousand jobs are projected to be filled by males, which is in direct contrast to women who are expected to lose 20 thousand jobs.

5. Skilled trades occupations

By 2014 skilled trades occupations are expected to lose up to 20 thousand jobs.

Skilled metal & electrical trades account for 30 thousand of the projected job losses. Skilled construction & building trades are projected to see an increase of 15 thousand jobs, and other skilled trades are projected to account for the loss of a further 10 thousand jobs. Employment in skilled agricultural trades is projected to increase slightly by 5 thousand.

Males bear the brunt of projected job losses in skilled trades occupations.

6. Personal services occupations

The projected increase in personal service occupations in Scotland is, at a projected rate of growth of 0.8 per cent per annum, more modest than in other parts of the UK.

Virtually all of the projected employment increase of around 15 thousand jobs is accounted for by caring personal service occupations, while in leisure occupations a small decline of around a thousand jobs is expected, contrasting with a modest increase at UK level.

The majority of jobs are projected to be filled by women, with only 3 thousand jobs projected to be filled by men.

7. Sales & customer service occupations

There is a projected employment gain of 25 thousand jobs in sales & customer service occupations between 2004 and 2014.

While the projected 15 thousand gain in employment in customer service occupations represents growth at a faster rate than the UK average, the expected gain of 10 thousand jobs in sales occupations represents a much slower rate of growth than across the UK as a whole.

Over 15 thousand jobs are projected to be taken by women.

8. Machine & transport operatives

At 0.6 per cent per annum, the projected rate of employment decline for this SOC major group in Scotland slightly exceeds that for the UK as a whole. By 2014, it is projected that 15 thousand jobs will be lost in this occupation.

Process machine operatives account for an expected reduction of 22 thousand jobs in this SOC major group. Employment levels for drivers & other operatives are expected to increase by 10 thousand.

The entire loss of 15 thousand jobs is projected to affect women.

9. Elementary Occupations

About 70 thousand jobs are expected to be lost in this SOC major group by 2014.

Some 34 thousand jobs are expected to be lost in both elementary service, and elementary trades between 2004 and 2014.

Twice as many women are projected to lose jobs than males in this occupation by 2014. For females this is a 3 per cent per annum reduction, which is below the average rate of loss for the UK.

8.6 Projections of Replacement Demands

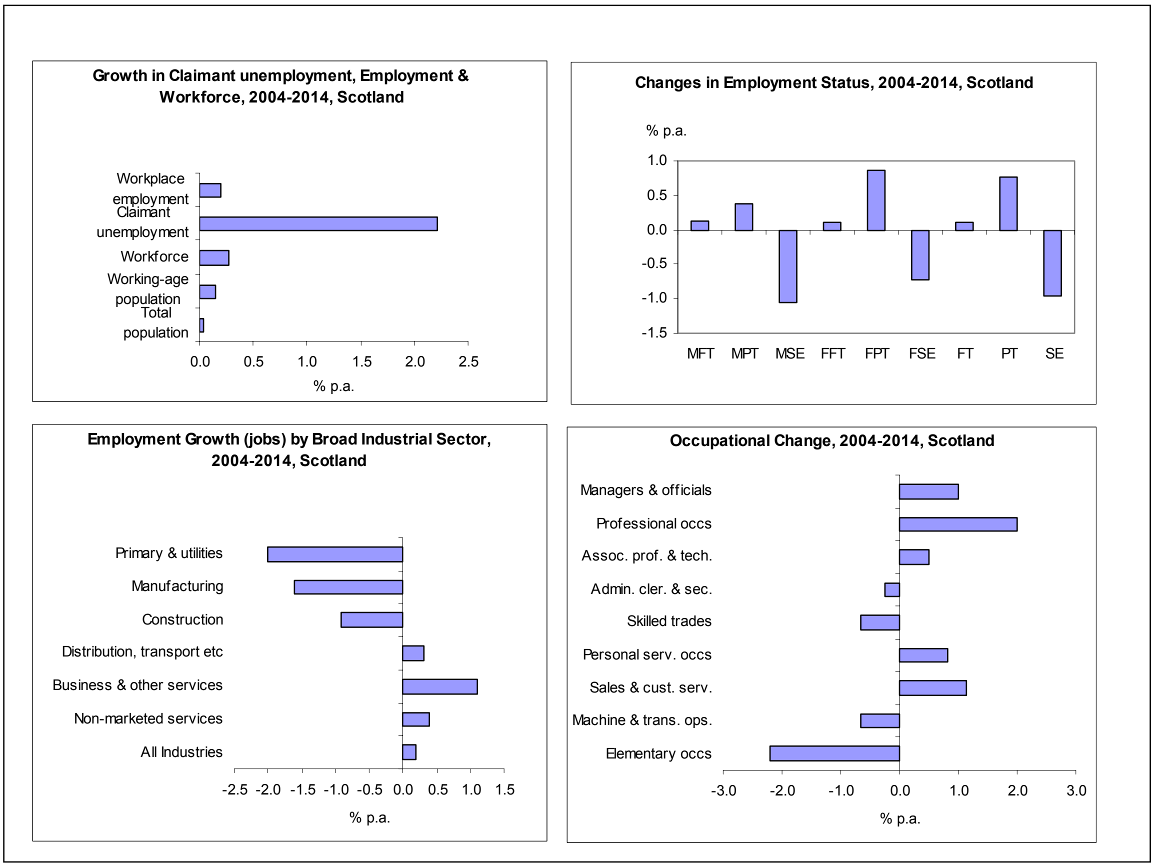
The key component of replacement demands is retirements from the workforce, especially for older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Total requirements for all SOC major groups are positive, regardless of whether expansion demand projections suggest an increase or decrease in employment levels.

Total net requirements of over 100 thousand jobs are projected for each of managers & senior officials, professional, associate professional & technical and administrative, clerical & secretarial occupations.

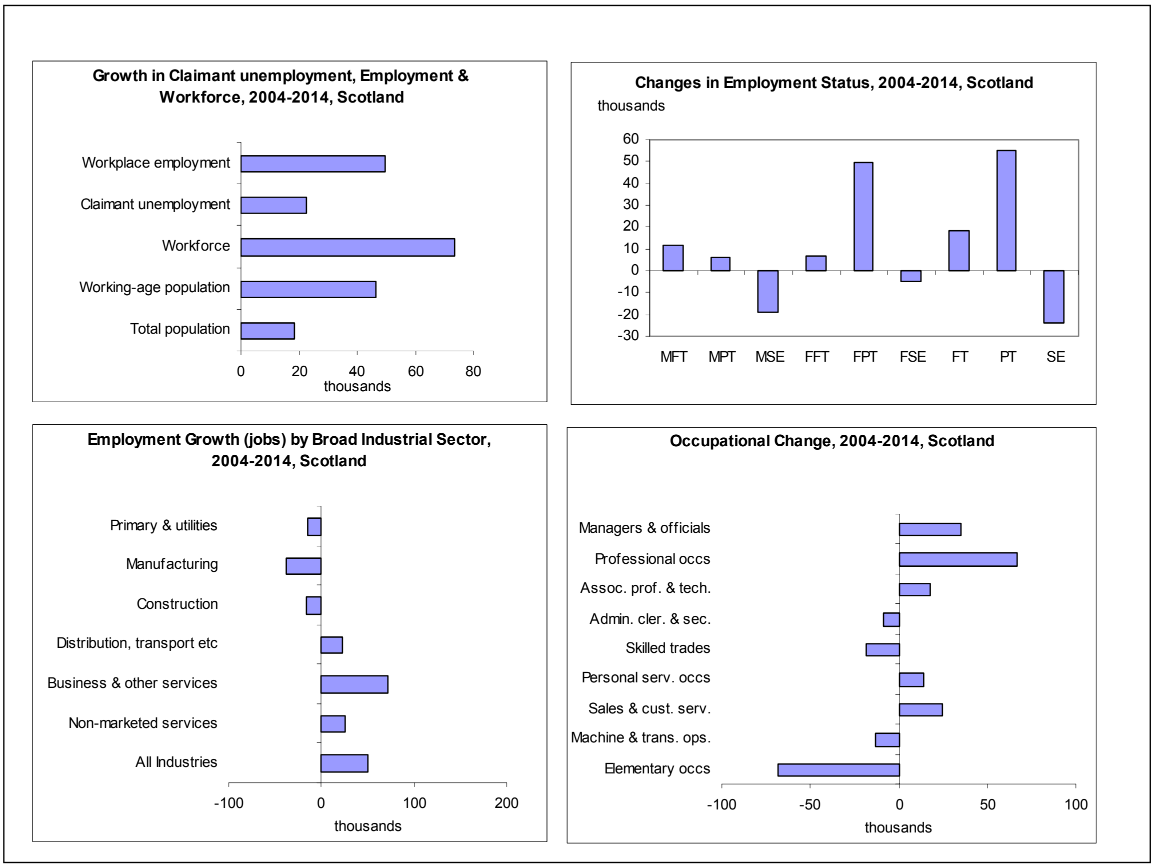
Smaller replacement demands are expected for other occupations, but even where expansion demands are negative, as is the case for skilled trades and elementary occupations, net requirements remains substantial.

Figure 13.2: Key Changes in Scotland, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 13.3: Key Changes in Scotland, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 13.2: Sectoral Change in Scotland

					Scotland							**UK**	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum
1. Agriculture, etc	65	63	46	35	2.9	2.7	1.8	1.4	-10	-22.7	-2.5	-15.0	-1.6
2. Mining & quarrying	39	21	24	20	1.7	0.9	0.9	0.8	-3	-14.2	-1.5	-17.6	-1.9
6. Electricity, gas & water	19	17	15	13	0.8	0.7	0.6	0.5	-2	-11.5	-1.2	-16.7	-1.8
Primary sector & utilities	*123*	*101*	*84*	*69*	*5.5*	*4.3*	*3.3*	*2.7*	*-15*	*-18.3*	*-2.0*	*-15.6*	*-1.7*
3. Food, drink & tobacco	70	55	49	47	3.1	2.3	2.0	1.8	-2	-5.0	-0.5	-10.0	-1.1
4. Engineering	96	78	57	44	4.3	3.3	2.3	1.7	-13	-22.7	-2.5	-9.5	-1.0
5. Rest of manufacturing	261	204	148	126	11.7	8.6	5.9	4.9	-23	-15.3	-1.6	-11.3	-1.2
Manufacturing	*427*	*336*	*255*	*217*	*19.1*	*14.2*	*10.1*	*8.4*	*-38*	*-15.0*	*-1.6*	*-10.8*	*-1.1*
7. Construction	183	187	188	171	8.2	7.9	7.4	6.7	-17	-8.8	-0.9	-4.4	-0.4
8. Retail, distribution	373	378	392	407	16.7	16.0	15.6	15.8	15	3.8	0.4	6.7	0.6
9. Hotels & restaurants	128	166	182	184	5.7	7.0	7.2	7.1	2	0.9	0.1	5.7	0.6
10. Transport & comm.	139	138	143	150	6.2	5.8	5.7	5.8	6	4.3	0.4	2.7	0.3
Distribution transport etc.	*640*	*682*	*718*	*740*	*28.6*	*28.8*	*28.5*	*28.8*	*23*	*3.2*	*0.3*	*5.6*	*0.5*
11. Financial services	64	87	110	106	2.9	3.7	4.3	4.1	-4	-3.3	-0.3	2.8	0.3
12. Other business activities	189	260	346	403	8.5	11.0	13.7	15.7	57	16.6	1.5	15.7	1.5
16. Other services	105	138	164	182	4.7	5.8	6.5	7.1	18	10.7	1.0	9.3	0.9
Business & other services	*359*	*485*	*619*	*691*	*16.1*	*20.5*	*24.5*	*26.9*	*71*	*11.5*	*1.1*	*12.2*	*1.2*
13. Public admin. & defence	141	138	152	149	6.3	5.8	6.0	5.8	-3	-1.8	-0.2	-2.3	-0.2
14. Education	170	169	211	224	7.6	7.1	8.4	8.7	12	5.8	0.6	5.7	0.6
15. Health & social work	192	270	295	311	8.6	11.4	11.7	12.1	16	5.4	0.5	9.7	0.9
Non-marketed services	*503*	*577*	*658*	*684*	*22.5*	*24.3*	*26.1*	*26.6*	*26*	*3.9*	*0.4*	*5.8*	*0.6*
All Sectors	2235	2369	2522	2572	100.0	100.0	100.0	100.0	50	2.0	0.2	4.3	0.4

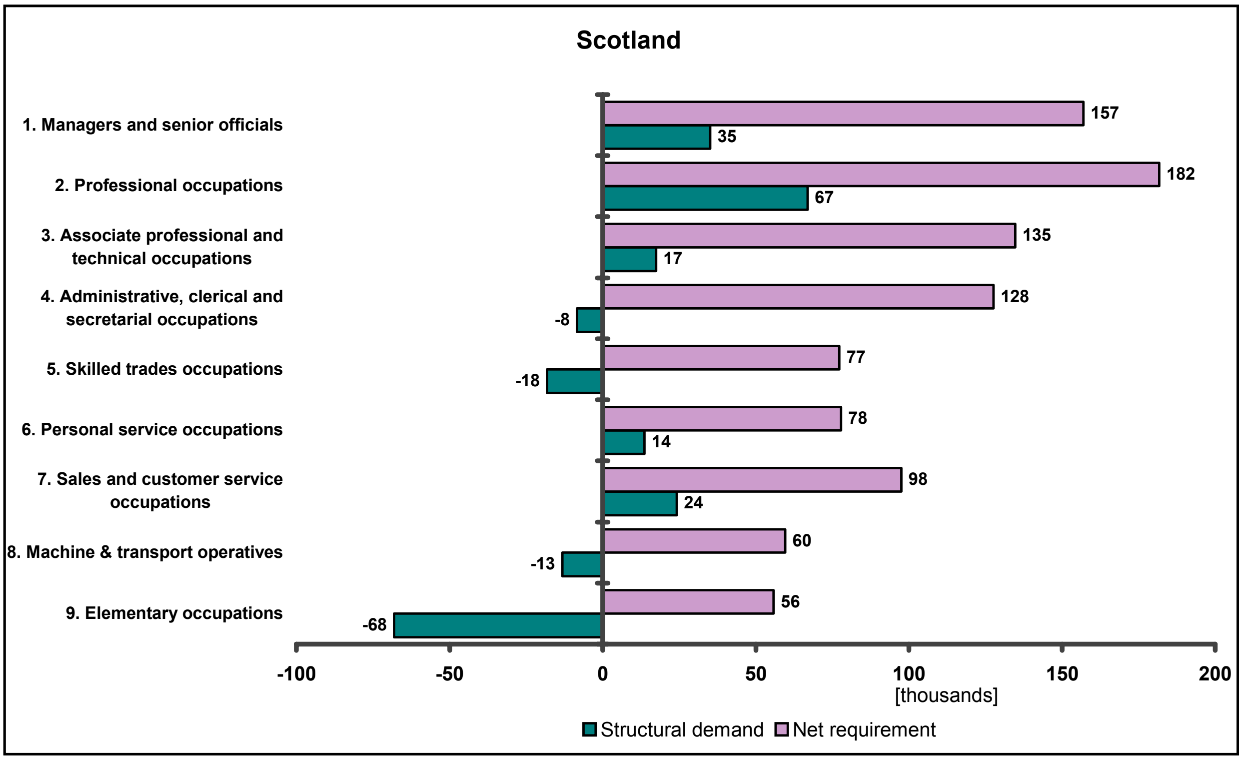
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 13.3: Occupational Change in Scotland

	Scotland											UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**	
Occupational sub-major group	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum
Corporate managers	147	190	247	290	6.6	8.0	9.8	11.3	43	17.3	1.6	19.9	1.8
Managers / proprietors	78	86	87	79	3.5	3.6	3.4	3.1	-8	-8.9	-0.9	-7.1	-0.7
Sc. & tech. profs.	46	59	79	91	2.1	2.5	3.1	3.5	12	15.9	1.5	18.3	1.7
Health professionals	15	20	25	31	0.7	0.8	1.0	1.2	6	25.5	2.3	29.4	2.6
Teaching & res. Profs.	86	105	146	192	3.8	4.4	5.8	7.5	46	31.6	2.8	21.6	2.0
Business professionals	40	46	54	56	1.8	2.0	2.2	2.2	2	3.5	0.3	14.5	1.4
Sc. & tech. assoc. profs.	34	42	53	60	1.5	1.8	2.1	2.3	7	13.3	1.3	12.4	1.2
Health assoc. profs.	76	91	104	110	3.4	3.9	4.1	4.3	5	5.0	0.5	7.8	0.8
Protect. serv. occs	23	29	41	40	1.0	1.2	1.6	1.6	-1	-2.9	-0.3	0.1	0.0
Culture, med. & sports	18	27	41	46	0.8	1.1	1.6	1.8	4	10.5	1.0	23.5	2.1
Business assoc. profs.	75	88	106	109	3.4	3.7	4.2	4.2	2	2.0	0.2	9.2	0.9
Admin & clerical	215	241	260	265	9.6	10.2	10.3	10.3	5	2.1	0.2	-3.1	-0.3
Secretarial and related	88	98	79	65	3.9	4.1	3.1	2.5	-14	-17.5	-1.9	-25.2	-2.9
Skilled agric. trades	33	31	36	41	1.5	1.3	1.4	1.6	5	12.8	1.2	15.5	1.5
Skilled metal & electrical	164	132	98	68	7.4	5.6	3.9	2.7	-30	-30.4	-3.6	-27.1	-3.1
Skilled cons. & building	103	94	94	110	4.6	4.0	3.7	4.3	16	17.2	1.6	19.4	1.8
Other skilled trades	73	71	59	50	3.3	3.0	2.4	2.0	-9	-15.4	-1.7	-14.6	-1.6
Caring personal service	50	79	118	133	2.2	3.3	4.7	5.2	14	12.2	1.2	22.8	2.1
Leisure occupations	44	47	43	43	2.0	2.0	1.7	1.7	-1	-1.6	-0.2	6.7	0.7
Sales occupations	136	154	165	176	6.1	6.5	6.6	6.9	11	6.6	0.6	12.0	1.1
Customer service occs.	12	18	36	49	0.5	0.8	1.4	1.9	13	36.7	3.2	32.2	2.8
Process machine ops.	167	144	113	91	7.5	6.1	4.5	3.5	-22	-19.7	-2.2	-24.5	-2.8
Drivers & other ops.	100	93	96	105	4.5	3.9	3.8	4.1	9	9.6	0.9	17.2	1.6
Elementary: trades	159	134	106	72	7.1	5.6	4.2	2.8	-34	-32.0	-3.8	-35.5	-4.3
Elementary: service	252	250	234	200	11.3	10.5	9.3	7.8	-34	-14.6	-1.6	-12.9	-1.4
All occupations	2235	2369	2522	2572	100.0	100.0	100.0	100.0	50	2.0	0.2	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 13.4: Replacement Demands in Scotland



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, ReplacementDemands.xls (RegionsRD).

14. NORTHERN IRELAND

14.1 Overview

Political stability in Northern Ireland is one factor influencing prospects for long-term prosperity. As in other parts of the UK, the structure of the Northern Ireland economy has shifted towards services. The relative importance of both manufacturing and construction has diminished over recent years. Belfast is easily the main employment centre in Northern Ireland,

In Northern Ireland the projected rate of unemployment exceeds the UK average. The labour force is expected to grow at a similar rate to the UK, while workplace employment is expected to grow more slowly than across the UK as a whole.

Projected employment gains are confined to distribution, transport etc., business & other services and non-marketed services. Expected job losses in the primary sector and utilities and in manufacturing occur at a slower rate than the UK average, while the reduction in construction is projected to be faster than the national average.

Professional occupations account for the largest single projected employment increase of any SOC Major Group over the period to 2014. Managers & officials and associate professional & technical occupations account for the next largest gains. Skilled trades occupations and elementary occupations dominate projected job losses. Projected replacement demands are such that even in those SOC Major Groups expected to see job losses, total requirements are positive.

14.2 Labour Supply and Demand

There are a number of different measures of labour supply and demand that are in common usage. Box 2.1 or Annex B describes these in detail. Table 14.1 provides a general overview, while Figure 14.1 presents a graphical summary of the supply side. Figures 14.2 and 14.3 focus more upon the demand side, although some related supply side indicators (population of working age, workforce and claimant unemployment) are included. The remainder of this section provides a brief summary of each of the main indicators used.

Total Population

The total population of Northern Ireland is projected to increase only marginally between 2004 and 2014, to reach over 1.7 million. This represents a rate of population growth of 0.1 per cent per annum, which exceeds that projected across the UK as a whole.

Population 16+

The 16+ population is expected to grow by 2.6 per cent over 2004-09 and 2.3 per cent over 2009-14. This is less then the UK averages and brought about by below average male population growth over 2004-09 and below average female population growth over 2009-14.

Working-age Populatio**n**

The working age population is projected to increase by just over 20 thousand between 2004 and 2014.

Workf**orce**

The workforce is projected to increase by less than 40 thousand, to reach around 875 thousand in 2014.

Labour force

The labour force is projected to increase by a modest 35 thousand between 2004 and 2014. Females account for the bulk of this increase.

ILO unemployment

ILO unemployment in Northern Ireland is expected to increase by just over 10 thousand over the period 2004-14, rather faster than the rate of increase forecast for the UK. Female unemployment is expected to increase only slightly, so males bears the brunt of the increase.

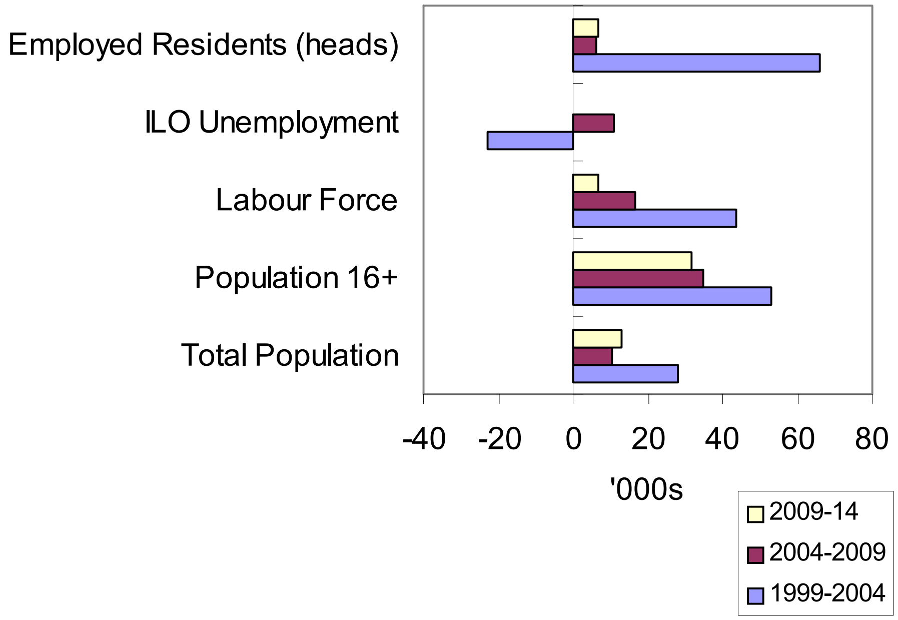
Claimant Unemployment
Claimant unemployment is projected to increase by about 10 thousand between 2004 and 2014. This represents a higher rate of increase than that projected across the UK as a whole. Along with the East of England, the West Midlands and Wales, Northern Ireland is expected to maintain one of the highest unemployment rates of any part of the UK.

Employed Residents
The number of employed residents is projected to increase bt around 2 per cent between 2004 and 2014. All the increase will benefit the female labour pool which is expected to increase by about 5 per cent, while male employment is expected to fall slightly.

Workplace Employment
Total workplace employment in Northern Ireland is projected to increase by nearly 30 thousand over the period from 2004 to 2014, to about 816 thousand. The projected growth rate between 2004 and 2014, at 0.2 per cent per annum, is below the UK average of 0.4 per cent per annum. This is the measure used in most of the remaining detailed tables and charts.

Labour Market Residual
Finally, the *labour market residual* measures the difference between the number of employed residents (heads) and workplace employment (jobs). At a UK level the main element of this is “double jobbing” (some people have more that one job). At a more disaggregated level, net commuting across geographical boundaries plays a significant role. Statistical errors and other differences in measurement between data from different sources also contribute to the residual. In Northern Ireland the labour market residual is around 60-80 thousand. This mainly reflects double jobbing.

Figure 14.1: Changes in Population and the Labour Force in Northern Ireland



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes: See Box 2.1 for detailed definitions.

Table 14.1: Population and Labour Force [1]

	1999	2004	2009	2014	1999-2004	2004-09	2009-14
					percentage change over period		
Male							
Total Population	819	834	836	846	1.9	0.3	1.2
Population 16+	610	639	654	672	4.8	2.3	2.8
Labour Force	412	434	437	440	5.3	0.8	0.5
Activity Rate	67.6	67.9	66.9	65.4	0.3	-1.0	-1.5
ILO Unemployment	39	25	33	33	-35.4	30.8	0.3
ILO Unemployment rate (%)	9.4	5.8	7.5	7.5	-3.6	1.7	0.0
Employed Residents (heads)	370	411	405	407	11.2	-1.6	0.5
Labour Market Residual (2)	28	19	26	19			
Female							
Total Population	861	873	882	884	1.5	0.9	0.3
Population 16+	662	686	706	719	3.6	2.9	1.9
Labour Force	317	338	352	356	6.8	4.0	1.3
Activity Rate	47.9	49.3	49.8	49.5	1.4	0.5	-0.3
ILO Unemployment	19	10	13	13	-47.6	31.0	0.0
ILO Unemployment rate (%)	6.0	3.0	3.7	3.7	-3.1	0.8	0.0
Employed Residents (heads)	301	326	339	343	8.3	3.9	1.3
Labour Market Residual (2)	32	44	50	58			
Total							
Total Population	1,679	1,707	1,718	1,731	1.7	0.6	0.8
Population 16+	1,272	1,325	1,359	1,391	4.2	2.6	2.3
Working-age Population	1,014	1,048	1,055	1,072	3.4	0.6	1.6
Labour Force	729	772	789	796	6.0	2.2	0.8
Workforce	793	838	868	875	5.6	3.6	0.9
Activity Rate	57.3	58.3	58.0	57.2	1.0	-0.3	-0.8
ILO Unemployment	58	35	46	46	-39.4	30.6	0.4
ILO Unemployment rate (%)	7.9	4.5	5.8	5.8	-3.4	1.3	0.0
Claimant Unemployment	51	31	40	40	-39.1	30.7	0.2
Claimant Unemployment rate	5.0	2.9	3.8	3.8	-2.1	0.9	-0.1
Employed Residents (heads)	671	737	743	750	9.9	0.8	0.9
Workplace employment (jobs)	720	789	807	816	9.6	2.4	1.1
Labour Market Residual[2]	60	63	76	78			

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, UKand RegionsLS fromCETables1.xls
Notes:
(1) Levels are in thousands except for the activity rate and ILO Unemployment rate, which are in percentages. Changes are percentage differences over the period except for the activity rate and unemployment rate which are percentage points.
(2) Labour Market Residual is the difference between workplace employment (number of jobs) and resident employment (heads).

14.3 Industrial Employment Structure

Overview of Broad sectors

At the broad sectoral level, the picture for Northern Ireland is one of employment losses in the primary sector & utilities, manufacturing and construction, and employment gains in distribution, transport, etc, business and other services and non-marketed services (see Figure 14.2). In absolute terms, both manufacturing and construction are the largest contributors to projected employment loss, although in relative terms the rate of decline in manufacturing - unlike construction - is slower than across the UK as a whole. This employment decline contrasts with gains of at least 20 thousand jobs in business and other services and 15 thousand extra jobs in each of distribution, transport, etc and in non-marketed services.

Primary sector & utilities

Within the primary sector and utilities, agriculture dominates the 3 thousand projected job losses between 2004 and 2014, as part of a trend of long-term decline. 2 thousand jobs are projected to be lost, representing an annual average rate of loss that is lower than the UK average. Job losses are also expected in electricity gas and water, whereas mining and quarrying is projected to show no change in employment levels.

Males account for twice as many as the projected job losses in this sector.

Manufacturing

8 thousand out of the 9 thousand job losses across the broad industrial sector are accounted for by rest of manufacturing. In engineering and food drink and tobacco employment levels hold up better, but there are still some job losses expected.

Expected job losses fall fairly equally on both on males and females.

Construction

Employment in construction in Northern Ireland is projected to decline at a faster rate than the UK average. Over the period to 2014 a loss of 10 thousand jobs is expected as construction employment declines to under 50 thousand.

Males account for virtually all of the projected job losses.

Distribution, transport etc.

The annual average rate of employment growth in distribution, transport, etc in Northern Ireland, at 0.6 per cent per annum, is higher than the UK average. Within this broad sector retail distribution dominates employment growth, accounting for 13 of the 14 thousand extra jobs expected by 2014. Projected employment increases in transport storage and communications are much more modest, while employment levels in hotels and restaurants are expected to remain unchanged.

Projected employment gains of 10 thousand are expected to be accounted for by females.

Business & other services

Annual employment increase in business and other services is projected to be faster than the UK average (1.4 per cent compared to 1.2 per cent). The projected growth rate of 1.9 per cent per annum in other business activities exceeds the UK average, as employment is expected to increase by over 15 thousand jobs over the decade to 2014. Projected absolute increases in banking and insurance are more modest, although the rate of increase projected in Northern Ireland exceeds that in the UK. By 2014 employment in this broad sector is projected to have reached 160 thousand, compared with less than 60 thousand in 1984.

Males are expected to be the beneficiaries of new jobs in this broad sector to a greater extent than females

Non-marketed services

Over the period to 2014, employment in non-marketed services is projected to expand at annual average rate akin to the UK average. Health and social work and education account for all of the increase in this broad sector with employment gains of 10 thousand and 6 thousand projected, respectively. By contrast, employment in public administration & defence is projected to decline slightly, although by 2014 it is still projected to account for over 8 per cent of total employment.

Over the period to 2014, a decline in male employment in non-marketed services is projected, compared with substantial increases for females.

14.4 Change in Employment by Gender and Employment Status

Males

Between 2004 and 2014 it is projected that Northern Ireland will lose full-time male jobs, at a rate of 0.4 per cent per annum. This is the only region part of the UK where such a reduction is expected. Meanwhile, part–time employment is expected to increase at a rate of 1.7 per cent per annum (this exceeds the UK rate), with the creation of an additional 11 thousand jobs. A loss of 4 thousand jobs is expected in self-employment.

Females

Whereas males are projected to lose over 10 thousand full-time jobs between 2004 and 2014, there is a projected increase of 12 thousand female full-time employees over the same period. This represents a 0.7 per cent per annum increase, which is one of highest in the UK (alongside London and the East of England). The number of female part-time employees is expected to increase at a rate of 1.3 per cent per annum (the highest rate of increase of any part of the UK). A 4 thousand reduction in self-employment is projected.

14.5 Occupational Prospects

Overview

This section concentrates on the employment projections for different occupations. It should be remembered that such ‘structural demand’ provides only part of the overall picture of occupational change. For a fuller picture of the changing requirements for different occupations it is necessary to bear in mind the impact of retirements, inter-occupational moves, etc, as captured by ‘replacement demand’.

At the level of SOC Major Groups, the largest increase in occupational employment between 2004 and 2014 is projected for professional occupations, with an expected increase of nearly 20 thousand jobs (see Figure 14.2). This represents an increase of approximately 20 per cent, and represents a rate of growth akin to the UK average. The next largest projected increases are for personal service occupations with expected net gains of about 15 thousand jobs. Increases of 12 thousand jobs are projected for both managers & officials and associate professional and technical occupations. Finally an additional 10 thousand jobs are projected for sales and customer service occupations.

Projected job losses are concentrated in skilled trades occupations (nearly 8 thousand jobs), with a faster expected annual average rate of job loss than the UK average, and elementary occupations (over 20 thousand jobs). Employment for machine and transport operatives is expected to decline by 5 thousand, and a loss of about 2 thousand jobs is projected for administrative, clerical and secretarial occupations.

1. Managers & senior officials

Over the period to 2014, the level of employment in this Major Group is projected to increase at an annual average rate of 1.2 per cent, compared with a growth rate of 1.3 per cent per annum across the UK as a whole. A projected increase of 15 thousand jobs for corporate administrators is offset by an expected loss of 2 thousand jobs for managers and proprietors (see Table 14.2).

Females are expected to account for the vast majority of the employment gains,

2. Professional occupations

With a projected annual average rate of increase of 1.8 per cent per annum, expected employment gains in this Major Group in Northern Ireland are projected to occur at a rate akin to the UK average. The largest contribution to the projected increase in employment in this Major Group is made by teaching and research professionals, with a projected 13 thousand extra jobs by 2014, representing a growth rate of 2.5 per cent per annum, which is in excess of the UK average. Much more modest employment gains are expected for health professionals, and business professionals, with expected growth rates at rates only about half the UK average. A thousand additional jobs are projected for science/technology professionals.

Females are projected to account for the majority of the extra jobs.

3. Associate professional & technical occupations

Associate professional and technical occupations are projected to gain 18 thousand jobs. At 1.8 per cent per annum, the projected annual average growth rate is the same as that expected for the UK as a whole. 10 thousand Nearly half of the projected job gains are accounted for by health associate professionals, with the annual average rate of employment growth easily exceeding the UK average. More modest increases are projected for business associate professionals, culture, media and sports occupations and science and technology associate professionals. Minor employment losses in protective service occupations are expected.

Females account for nearly all of the projected job gains between 2004 and 2014.

4. Administrative, clerical & secretarial occupations

Administrative, clerical and secretarial occupations are projected to lose about 2 thousand jobs over the period to 2014. However, at 0.2 per cent per annum, the projected rate of job loss is slower than the UK average (0.9 per cent per annum). All of the projected job losses are in secretarial and related occupations, while for administrative and clerical occupations employment levels are expected to increase by 3 thousand.

The expected job losses fall entirely on females, with a small increase projected in male employment.

5. Skilled trades occupations

About 8 thousand jobs are expected to be lost to skilled trades occupations between 2004 and 2014. At 0.8 per cent per annum, the projected rate of employment decrease is greater than in any other part of the UK, with the exception of the East Midlands and West Midlands. Skilled metal and electrical trades alone are projected to lose 10 thousand jobs. Losses of about 3 thousand jobs are expected in other skilled trades. Whereas employment levels for skilled agricultural trades are expected to remain stable, an increase in employment (4 thousand jobs) in skilled construction and building trades is expected.

Over twice as many job losses are projected to fall on males as on females.

6. Personal services occupations

Employment is projected to increase at 1.8 per cent per annum over the period to 2014, adding almost 15 thousand jobs to this occupation. Caring personal service occupations are projected to contribute the majority of employment gains, with only 1 thousand jobs expected in leisure occupations.

Females account for all of these gains, while male employment in this SOC Major Group is projected to fall slightly.

7. Sales & customer service occupations

At 1.5 per cent per annum, the projected growth rate over the period from 2004 to 2014 is similar to the UK average. The projected gain of about 10 thousand jobs is split fairly evenly between sales occupations and customer service occupations.

More females than males are expected to gain these additional jobs.

8. Machine & transport operatives

Employment in this SOC Major Group is projected to decline at 1.1 per cent per annum over the period to 2014. This is the fastest rate of loss projected for any part of the UK. The projected absolute employment loss for machine and transport operatives is over 5 thousand. Process machine operatives account for all of the projected losses, with a very small increase of 2 thousand jobs expected for drivers and other operatives.

Females are expected to account for 4 thousand of the projected employment losses.

9. Elementary Occupations

At 2.7 per cent per annum, the projected rate of employment loss in Northern Ireland over the period to 2014 is faster than the UK average (2.2 per cent per annum). Only the West Midlands and East Midlands are projected to see faster rates of job loss.

About 13 thousand jobs are expected to be lost in elementary service occupations, while a loss of 9 thousand jobs is projected for elementary trades occupations. By 2014 there are expected to be just under 75 thousand jobs in elementary occupations in Northern Ireland.

8.6 Projections of Replacement Demands

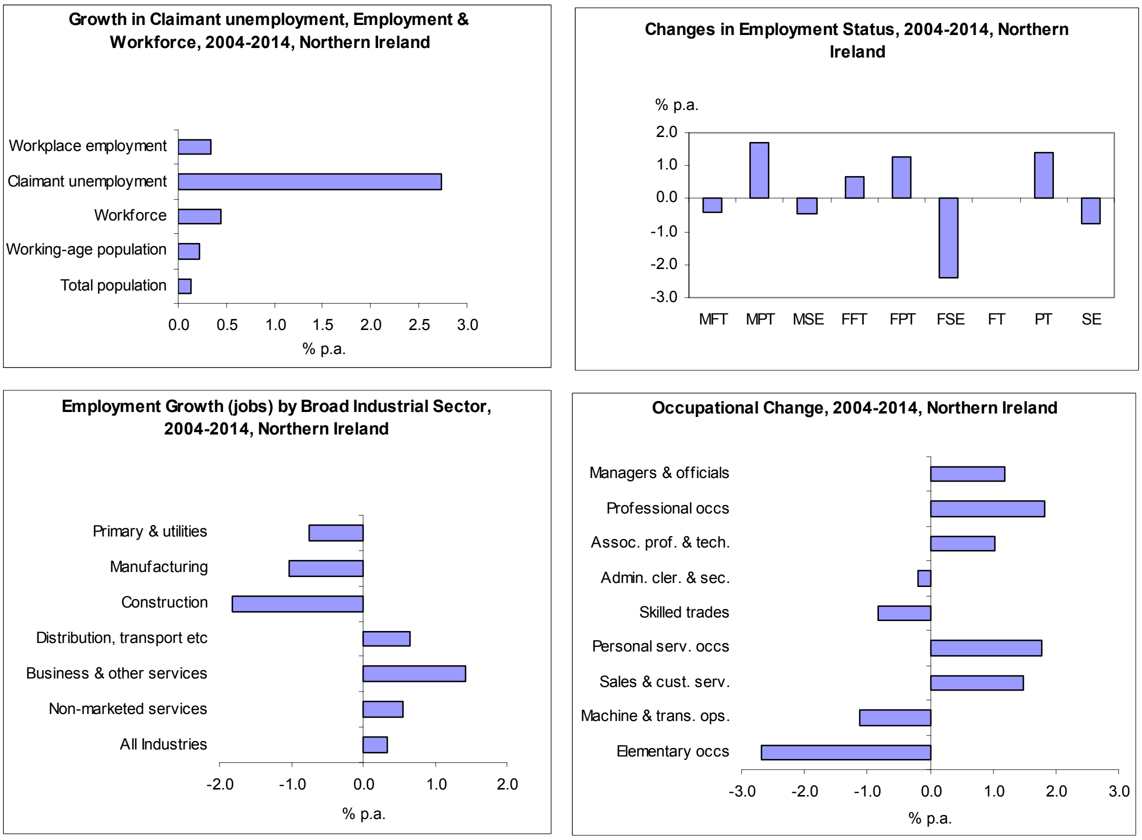
The key component of replacement demands is retirements from the workforce, especially those of older workers. However, replacement requirements for specific occupational groups, in particular geographical areas, can also arise for a number of other reasons. These include occupational mobility, as individuals change jobs for reasons of career progression (as well as other causes), and geographical mobility. Potentially, the latter may be quite important at a regional level. Unfortunately there are few reliable data on such flows, so the estimates presented here exclude replacement needs arising as a consequence of both occupational and geographical mobility. In both cases, there may be offsetting inflows to counterbalance some of the losses.

Regardless of whether expansion demand projections indicate an increase or decrease in employment levels, total requirements are positive for all SOC Major Groups. Viewing all occupations collectively, the expansion demand is for 28 thousand jobs, the replacement demand for an additional ¼ of a million jobs, thus making the replacement demand for Northern Ireland over 300 thousand.

Of those occupations projected positive expansion demands, professional occupations have the highest overall requirement (53 thousand) followed by associate professional & technical occupations (49 thousand), managers & senior officials (45 thousand), personal service occupations (45 thousand) and sales and customer service occupations (33 thousand).

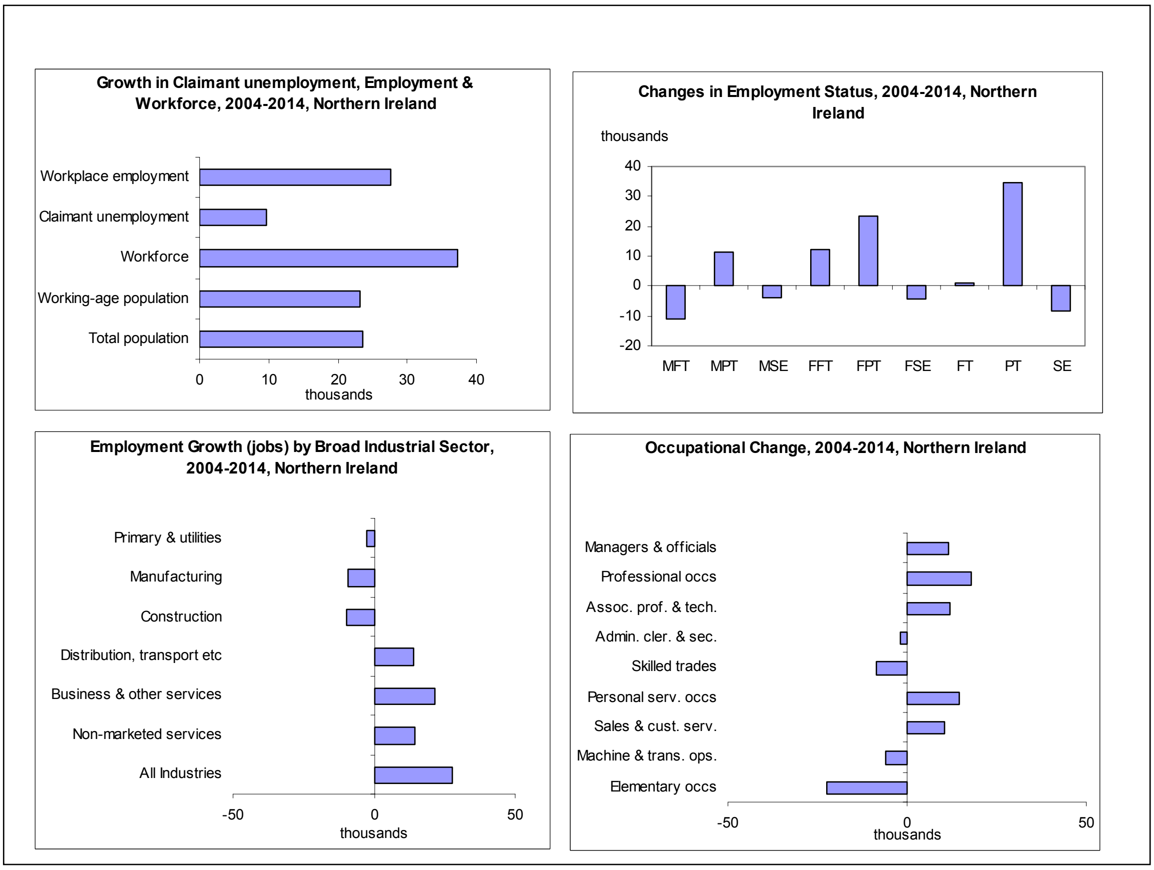
The occupations with projected negative expansion demands all have positive overall requirements. The highest is for administrative, clerical & secretarial occupations (38 thousand) followed by skilled trades occupations (27 thousand), machine & transport operatives (13 thousand) and finally elementary occupations (11 thousand).

Figure 14.2: Key Changes in Northern Ireland, % p.a.



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts %.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Figure 14.3: Key Changes in Northern Ireland, 000s



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional charts 000s.xls
Notes: Top left hand panel shows – Workplace employment; Claimant unemployment, Workforce; Working-age population and Total population. For detailed definitions see Box 2.1 or Annex B.
MFT =Male full-time employees, MPT =male part-time employees, MSE= Male self employment
FFT =Female full-time employees, FPT =Female part-time employees, FSE= Female self employment
FT = All full-time employees , PT = All part-time employees, SE =All self employment.

Table 14.1: Sectoral Change in Northern Ireland

	Northern Ireland											UK	
	1984	**1994**	**2004**	**2014**	**1984**	**1994**	**2004**	**2014**	**2004-2014** change			**2004-2014**	
Sectoral categories	000s	000s	000s	000s	% of total	% of total	% of total	% of total	000s	% change	% per annum	% change	% per annum
1. Agriculture, etc	42	35	31	30	7.4	5.5	4.0	3.6	-2	-5.2	-0.5	-15.0	-1.6
2. Mining & quarrying	2	2	2	2	0.4	0.3	0.3	0.2	0	-21.4	-2.4	-17.6	-1.9
6. Electricity, gas & water	8	5	3	3	1.4	0.8	0.4	0.3	-1	-19.6	-2.2	-16.7	-1.8
Primary sector & utilities	*52*	*42*	*36*	*34*	*9.2*	*6.6*	*4.6*	*4.1*	*-3*	*-7.3*	*-0.8*	*-15.6*	*-1.7*
3. Food, drink & tobacco	22	21	20	19	3.8	3.2	2.5	2.3	-1	-3.5	-0.4	-10.0	-1.1
4. Engineering	14	14	17	16	2.5	2.2	2.1	2.0	-1	-3.2	-0.3	-9.5	-1.0
5. Rest of manufacturing	73	70	58	50	12.8	10.9	7.3	6.1	-8	-14.0	-1.5	-11.3	-1.2
Manufacturing	*109*	*105*	*94*	*85*	*19.1*	*16.3*	*11.9*	*10.4*	*-9*	*-9.9*	*-1.0*	*-10.8*	*-1.1*
7. Construction	44	42	59	49	7.7	6.5	7.5	6.0	-10	-16.9	-1.8	-4.4	-0.4
8. Retail, distribution	83	97	133	145	14.6	15.2	16.8	17.8	13	9.6	0.9	6.7	0.6
9. Hotels & restaurants	16	27	42	42	2.8	4.2	5.4	5.2	0	0.0	0.0	5.7	0.6
10. Transport & comm.	22	25	33	34	3.9	3.9	4.1	4.1	1	3.1	0.3	2.7	0.3
Distribution transport etc.	*121*	*149*	*208*	*221*	*21.3*	*23.2*	*26.3*	*27.1*	*14*	*6.6*	*0.6*	*5.6*	*0.5*
11. Financial services	13	15	19	21	2.3	2.4	2.4	2.5	2	8.1	0.8	2.8	0.3
12. Other business activities	21	38	76	91	3.7	5.8	9.6	11.2	16	20.8	1.9	15.7	1.5
16. Other services	23	35	45	49	4.1	5.4	5.7	6.0	4	9.2	0.9	9.3	0.9
Business & other services	*58*	*88*	*140*	*161*	*10.1*	*13.6*	*17.7*	*19.7*	*21*	*15.3*	*1.4*	*12.2*	*1.2*
13. Public admin. & defence	55	60	65	64	9.6	9.3	8.2	7.8	-1	-1.5	-0.1	-2.3	-0.2
14. Education	60	64	72	78	10.5	10.0	9.2	9.6	6	7.9	0.8	5.7	0.6
15. Health & social work	72	93	115	124	12.6	14.5	14.6	15.2	10	8.4	0.8	9.7	0.9
Non-marketed services	*186*	*217*	*252*	*266*	*32.7*	*33.7*	*32.0*	*32.6*	*14*	*5.7*	*0.6*	*5.8*	*0.6*
All Sectors	570	643	789	816	100.0	100.0	100.0	100.0	28	3.5	0.3	4.3	0.4

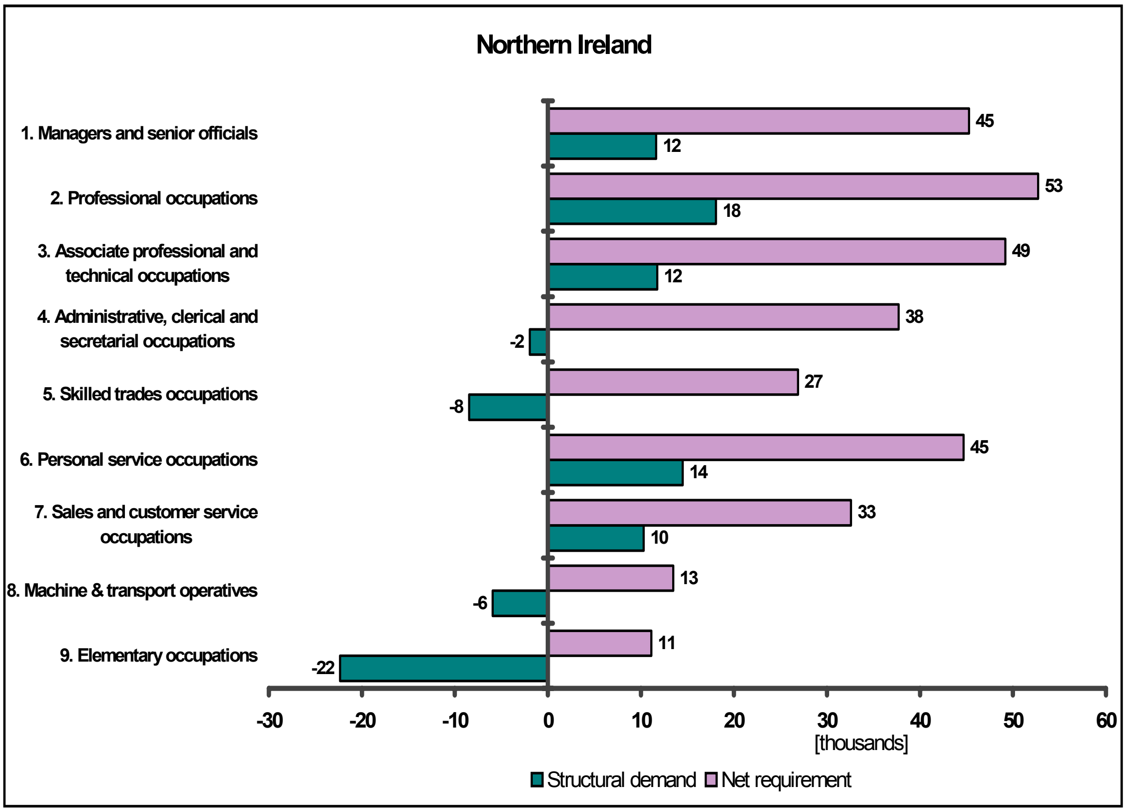
Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.14b).

Table 14.2: Occupational Change in Northern Ireland

	Northern Ireland											UK	
	1984	1994	2004	2014	1984	1994	2004	2014	2004-2014 change			2004-2014	
					% of	% of	% of	% of		%	% per	%	% per
Occupational sub-major group	000s	000s	000s	000s	total	total	total	total	000s	change	annum	change	annum
Corporate managers	36	50	72	86	6.3	7.8	9.2	10.6	14	19.5	1.8	19.9	1.8
Managers / proprietors	19	20	21	18	3.3	3.0	2.6	2.3	-2	-11.7	-1.2	-7.1	-0.7
Sc. & tech. profs.	10	14	21	24	1.7	2.1	2.6	2.9	3	15.3	1.4	18.3	1.7
Health professionals	4	6	7	8	0.7	0.9	0.9	1.0	1	12.4	1.2	29.4	2.6
Teaching & res. Profs.	27	35	45	58	4.7	5.4	5.7	7.1	13	28.2	2.5	21.6	2.0
Business professionals	9	13	18	19	1.6	2.0	2.3	2.4	1	7.0	0.7	14.5	1.4
Sc. & tech. assoc. profs.	8	10	13	15	1.3	1.5	1.7	1.8	1	10.9	1.0	12.4	1.2
Health assoc. profs.	20	26	37	45	3.4	4.1	4.7	5.5	7	20.2	1.9	7.8	0.8
Protect. serv. occs	8	10	14	13	1.4	1.6	1.8	1.5	-1	-10.6	-1.1	0.1	0.0
Culture, med. & sports	4	7	12	13	0.7	1.0	1.5	1.6	2	15.7	1.5	23.5	2.1
Business assoc. profs.	18	24	34	36	3.1	3.7	4.3	4.4	3	7.4	0.7	9.2	0.9
Admin & clerical	57	64	76	79	10.0	10.0	9.6	9.7	3	4.1	0.4	-3.1	-0.3
Secretarial and related	23	25	23	18	4.0	3.9	3.0	2.3	-5	-21.5	-2.4	-25.2	-2.9
Skilled agric. trades	25	20	20	21	4.3	3.1	2.6	2.5	0	1.5	0.1	15.5	1.5
Skilled metal & electrical	38	35	34	24	6.6	5.5	4.3	2.9	-10	-30.2	-3.5	-27.1	-3.1
Skilled cons. & building	27	25	34	38	4.7	3.9	4.3	4.7	4	12.1	1.1	19.4	1.8
Other skilled trades	18	19	17	14	3.2	2.9	2.2	1.8	-3	-15.6	-1.7	-14.6	-1.6
Caring personal service	18	32	61	74	3.2	5.0	7.7	9.0	13	21.5	2.0	22.8	2.1
Leisure occupations	10	13	14	16	1.8	2.0	1.8	1.9	1	10.0	1.0	6.7	0.7
Sales occupations	29	37	54	60	5.0	5.8	6.9	7.4	6	11.2	1.1	12.0	1.1
Customer service occs.	3	5	11	15	0.5	0.7	1.4	1.8	4	39.3	3.4	32.2	2.8
Process machine ops.	45	40	29	21	8.0	6.2	3.7	2.6	-8	-27.7	-3.2	-24.5	-2.8
Drivers & other ops.	21	22	27	29	3.7	3.5	3.4	3.6	2	8.2	0.8	17.2	1.6
Elementary: trades	38	34	32	23	6.7	5.3	4.1	2.8	-9	-29.2	-3.4	-35.5	-4.3
Elementary: service	56	58	62	49	9.9	9.0	7.9	6.0	-13	-20.9	-2.3	-12.9	-1.4
All occupations	570	643	789	816	100.0	100.0	100.0	100.0	28	3.5	0.3	5.2	0.5

Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

Figure 14.4: Replacement Demands in Northern Ireland



Source: CE/IER estimates, MDM01R1 C51F8A Forecast, SSDACrossRegional tables.xls (TableR.15).

15. LOCAL LSC RESULTS

15.1 Introduction

This chapter sets out statistics on employment and projected employment change at local *Learning and Skills Council (LLSC) area* level.[1] There are 47 local LSC areas in England. In the Tables the local LSC areas are ordered by region, for ease of comparison:

- London
- South East
- East of England
- South West
- West Midlands
- East Midlands
- Yorkshire and the Humber
- North West
- North East

Accompanying tables present statistics at *regional* level. In most instances, a short commentary follows – in bullet point format – the regional level table, highlighting the main features of variation at local LSC area and regional levels. The tables presented in this Chapter are intended to be used for reference purposes, providing information on employment levels, shares and rates of change, and so can be referred to alongside Chapters 2-10 on the English regions. In those Chapters, reference is made to intra-regional variations in experience.

The tables presented in this Chapter cover the following dimensions of employment:

1: Total employment and employment change, 1994, 2004 and 2014.

2-7: Employment and employment change by broad sector, 2004 and 2014.

8-13: Employment and employment change by gender and status, 2004 and 2014.

14-22: Employment and employment change by SOC Major Group, 2004 and 2014.

23: Activity rates, 1999-2014.

[1] Hence, the statistics cover England only.

Table 15.1: Total Employment by LLSC Area, 1994-2014

	1994	1994-2004			2004	2004-2014			2014
		%change	%pa	rank on %pa		%change	%pa	rank on % pa	
England	22550	13.2	1.2		25517	4.6	0.5		26694
London North	328	12.0	1.1	25	368	6.0	0.6	11	390
London West	654	19.4	1.8	4	781	5.9	0.6	12	827
London Central	1374	19.0	1.8	6	1635	7.0	0.7	5	1750
London East	936	20.7	1.9	2	1129	6.0	0.6	10	1197
London South	526	10.7	1.0	32	583	6.4	0.6	7	620
Milton Keynes, Oxon and Bucks	639	17.2	1.6	11	749	8.0	0.8	2	810
Berkshire	432	18.2	1.7	8	511	8.0	0.8	3	551
Hampshire and Isle of Wight	777	17.7	1.6	9	914	5.5	0.5	15	964
Surrey	500	20.6	1.9	3	603	8.1	0.8	1	652
Sussex	637	13.2	1.3	19	721	5.7	0.6	13	762
Kent and Medway	654	11.7	1.1	27	730	6.4	0.6	8	776
Norfolk	338	12.8	1.2	21	381	3.7	0.4	26	395
Cambridgeshire	346	19.0	1.8	7	412	7.3	0.7	4	442
Suffolk	306	9.6	0.9	35	335	3.8	0.4	25	348
Luton and Bedfordshire	254	2.2	0.2	45	260	2.5	0.2	37	266
Hertfordshire	499	16.6	1.5	12	582	6.3	0.6	9	619
Essex	611	27.8	2.5	1	781	4.3	0.4	20	815
Devon and Cornwall	642	13.1	1.2	20	726	4.0	0.4	24	755
Somerset	212	9.9	1.0	34	233	3.2	0.3	31	241
Bournemouth, Dorset and Poole	289	13.7	1.3	17	328	4.3	0.4	21	343
West of England	522	16.5	1.5	13	608	4.7	0.5	16	636
Wiltshire	297	15.3	1.4	14	343	4.5	0.4	19	358
Gloucestershire	270	13.3	1.3	18	306	2.4	0.2	39	314
Shropshire	184	11.3	1.1	29	205	4.6	0.4	17	214
Staffordshire	432	11.2	1.1	30	480	4.2	0.4	22	500
Black Country	496	1.8	0.2	46	505	0.7	0.1	47	509
Birmingham and Solihull	606	9.1	0.9	36	661	3.3	0.3	30	683
Herefordshire & Worcestershire	302	12.0	1.1	24	338	3.6	0.4	27	350
Coventry and Warwickshire	365	12.6	1.2	22	411	5.5	0.5	14	433
Derbyshire	395	8.8	0.8	37	429	3.1	0.3	32	442
Nottinghamshire	460	7.6	0.7	38	494	2.2	0.2	40	505
Lincolnshire and Rutland	266	14.5	1.4	15	304	2.6	0.3	35	312
Leicestershire	441	1.2	0.1	47	446	1.9	0.2	43	454
Northamptonshire	282	17.3	1.6	10	331	3.5	0.3	29	342
North Yorkshire	330	19.3	1.8	5	393	6.5	0.6	6	419
West Yorkshire	995	7.0	0.7	39	1064	4.5	0.4	18	1112
South Yorkshire	517	11.6	1.1	28	578	2.5	0.3	36	592
Humberside	399	2.3	0.2	44	409	1.9	0.2	42	416
Cumbria	212	10.7	1.0	33	235	1.7	0.2	44	239
Lancashire	601	10.8	1.0	31	666	2.1	0.2	41	680
Greater Merseyside	538	12.0	1.1	26	602	2.4	0.2	38	617
Greater Manchester	1174	12.3	1.2	23	1318	3.5	0.3	28	1365
Cheshire and Warrington	470	14.3	1.3	16	537	4.1	0.4	23	559
Northumberland	109	3.3	0.3	43	112	1.7	0.2	45	114
Tyne and Wear	491	4.8	0.5	41	514	2.7	0.3	34	528
County Durham	169	6.7	0.6	40	180	1.6	0.2	46	183
Tees Valley	277	3.7	0.4	42	287	2.8	0.3	33	295

Table 15.1a: Total Employment by Region, 1994-2014

	1994	1994-2004			2004	2004-2014			2014
		%change	%pa	rank on %pa		%change	%pa	rank on %pa	
England	22550	13.2	1.2		25517	4.6	0.5		26694
London	3818	17.8	1.6	1	4496	6.4	0.6	2	4785
South East	3638	16.2	1.5	3	4227	6.8	0.7	1	4514
East of England	2354	16.8	1.6	2	2751	4.9	0.5	3	2885
South West	2233	14.0	1.3	4	2545	4.0	0.4	4	2646
West Midlands	2384	9.0	0.9	7	2599	3.5	0.3	6	2689
East Midlands	1842	8.8	0.8	8	2004	2.6	0.3	8	2056
Yorkshire and the Humber	2241	9.0	0.9	6	2444	3.9	0.4	5	2540
North West	2994	12.1	1.2	5	3358	3.0	0.3	7	3459
North East	1045	4.6	0.5	9	1093	2.5	0.2	9	1120

15.2 Employment change

- Across *England* total employment increased by 1.2 per cent per annum between 1994 and 2004 to reach 25.5 million. The annual average rate of increase is expected to slow to 0.5 per cent from 2004 with a projected 26.7 million jobs in England by 2014.
  - ➢ There are substantial intra-regional variations in projected rates of employment change in most, but not all regions.
  - ➢ Local LSC areas projected to see the fastest rates of employment growth are drawn predominantly from the South East, London and the western parts of the East of England, the South East and London. Outside these regions the local LSCs with the largest projected gains are North Yorkshire, Coventry and Warwickshire, the West of England and Shropshire.
  - ➢ The slowest rates of employment growth are recorded in the Black Country and in northern England (County Durham, Northumberland and Cumbria).

Table 15.2: Total Employment, Primary Sector & Utilities, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Primary sector & utilities	000s	share %	000s	share %	%	%pa
England	454	1.8	383	1.4	-15.7	-1.7
London North	1	0.3	1	0.2	-15.4	-1.7
London West	2	0.2	1	0.1	-23.1	-2.6
London Central	6	0.4	4	0.2	-26.4	-3.0
London East	3	0.3	2	0.2	-34.8	-4.2
London South	3	0.6	2	0.4	-30.4	-3.6
Milton Keynes, Oxon and Bucks	12	1.6	11	1.4	-6.3	-0.6
Berkshire	8	1.5	7	1.3	-7.3	-0.8
Hampshire and Isle of Wight	23	2.6	22	2.3	-4.1	-0.4
Surrey	14	2.4	13	2.1	-5.8	-0.6
Sussex	16	2.2	14	1.8	-10.8	-1.1
Kent and Medway	20	2.8	19	2.5	-6.7	-0.7
Norfolk	13	3.5	11	2.7	-21.2	-2.4
Cambridgeshire	12	2.8	9	2.0	-22.9	-2.6
Suffolk	11	3.2	9	2.5	-18.0	-2.0
Luton and Bedfordshire	3	1.3	2	0.8	-33.9	-4.1
Hertfordshire	6	1.1	5	0.8	-26.6	-3.0
Essex	12	1.5	9	1.1	-22.1	-2.5
Devon and Cornwall	30	4.2	27	3.6	-10.5	-1.1
Somerset	8	3.4	7	2.8	-16.0	-1.7
Bournemouth, Dorset and Poole	8	2.5	7	1.9	-19.5	-2.1
West of England	8	1.4	7	1.1	-20.7	-2.3
Wiltshire	14	4.0	12	3.4	-11.5	-1.2
Gloucestershire	11	3.7	10	3.1	-15.1	-1.6
Shropshire	9	4.4	7	3.3	-20.4	-2.3
Staffordshire	9	1.8	7	1.4	-20.3	-2.2
Black Country	5	0.9	4	0.7	-18.0	-2.0
Birmingham and Solihull	6	0.9	5	0.7	-17.3	-1.9
Herefordshire & Worcestershire	16	4.7	12	3.4	-24.6	-2.8
Coventry and Warwickshire	11	2.6	8	1.9	-21.7	-2.4
Derbyshire	6	1.5	5	1.2	-16.0	-1.7
Nottinghamshire	9	1.8	7	1.4	-19.9	-2.2
Lincolnshire and Rutland	18	5.9	15	4.8	-15.8	-1.7
Leicestershire	11	2.5	10	2.1	-13.9	-1.5
Northamptonshire	3	0.8	2	0.6	-18.0	-2.0
North Yorkshire	20	5.0	16	3.9	-16.1	-1.7
West Yorkshire	12	1.1	9	0.8	-25.6	-2.9
South Yorkshire	4	0.8	3	0.6	-21.9	-2.4
Humberside	14	3.3	10	2.4	-27.2	-3.1
Cumbria	6	2.4	5	2.1	-9.9	-1.0
Lancashire	10	1.5	10	1.4	-7.4	-0.8
Greater Merseyside	2	0.3	1	0.2	-14.3	-1.5
Greater Manchester	7	0.5	6	0.4	-12.0	-1.3
Cheshire and Warrington	11	2.1	10	1.8	-12.0	-1.3
Northumberland	6	5.1	4	3.8	-23.0	-2.6
Tyne and Wear	6	1.2	5	1.0	-9.5	-1.0
County Durham	5	2.7	4	2.1	-19.2	-2.1
Tees Valley	6	1.9	5	1.8	-5.0	-0.5

Table 15.2a: Total Employment, Primary Sector & Utilities, by Region, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Primary sector & utilities	000s	share %	000s	share %	%	%pa
England	454	1.8	383	1.4	-15.7	-1.7
London	15	0.3	11	0.2	-27.9	-3.2
South East	93	2.2	87	1.9	-6.6	-0.7
East of England	57	2.1	44	1.5	-22.5	-2.5
South West	80	3.1	69	2.6	-13.9	-1.5
West Midlands	55	2.1	43	1.6	-21.3	-2.4
East Midlands	47	2.3	39	1.9	-16.3	-1.8
Yorkshire and the Humber	49	2.0	38	1.5	-21.9	-2.4
North West	36	1.1	32	0.9	-10.4	-1.1
North East	22	2.0	19	1.7	-13.9	-1.5

15.3 Employment change by broad sector

- Employment in the *primary sector and utilities* in *England* is projected to decline at 1.5 per cent per annum from 454 thousand (just under 2 per cent of total employment) in 2004 to just over 380 thousand (1.4 per cent of total employment) in 2014.

➢ The shares of total employment in this broad sector are greatest in 'rural' areas, such as Lincolnshire & Rutland, Northumberland and North Yorkshire. In these local LSC areas the share of such employment is at least 5 per cent.

➢ The smallest proportions are found in London and large metropolitan areas.

➢ All local LSC areas are projected to experience a reduction in employment in this broad sector between 2004 and 2014. Local LSC areas in the South East record some of the slowest rates of decrease, whereas faster than average rates of decrease are recorded in much of the East of England (including Hertfordshire, Cambridgeshire and Essex), Yorkshire & the Humber and the West Midlands (Herefordshire & Worcestershire and Coventry & Warwickshire).

Table 15.3: Total Employment, Manufacturing, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Manufacturing	000s	share %	000s	share %	%	%pa
England	3013	11.8	2686	10.1	-10.9	-1.1
London North	27	7.4	23	5.9	-14.5	-1.6
London West	57	7.3	49	5.9	-14.2	-1.5
London Central	75	4.6	69	3.9	-8.3	-0.9
London East	70	6.2	62	5.1	-12.4	-1.3
London South	34	5.9	31	4.9	-11.3	-1.2
Milton Keynes, Oxon and Bucks	83	11.1	78	9.6	-6.5	-0.7
Berkshire	44	8.7	41	7.4	-7.3	-0.8
Hampshire and Isle of Wight	94	10.3	85	8.9	-9.2	-1.0
Surrey	38	6.3	36	5.5	-6.1	-0.6
Sussex	68	9.5	64	8.3	-7.1	-0.7
Kent and Medway	71	9.7	67	8.6	-5.0	-0.5
Norfolk	50	13.2	44	11.2	-11.8	-1.2
Cambridgeshire	51	12.4	47	10.6	-8.6	-0.9
Suffolk	44	13.1	39	11.1	-12.2	-1.3
Luton and Bedfordshire	37	14.3	34	12.7	-8.5	-0.9
Hertfordshire	57	9.9	54	8.7	-6.7	-0.7
Essex	86	11.1	78	9.5	-10.0	-1.0
Devon and Cornwall	72	9.9	62	8.2	-13.8	-1.5
Somerset	37	15.9	30	12.7	-17.6	-1.9
Bournemouth, Dorset and Poole	32	9.6	27	7.9	-14.0	-1.5
West of England	59	9.6	50	7.8	-14.9	-1.6
Wiltshire	44	12.9	41	11.4	-7.9	-0.8
Gloucestershire	44	14.2	36	11.6	-16.4	-1.8
Shropshire	35	17.1	32	14.8	-9.4	-1.0
Staffordshire	85	17.6	73	14.6	-13.3	-1.4
Black Country	105	20.9	90	17.7	-14.7	-1.6
Birmingham and Solihull	88	13.4	75	11.0	-15.2	-1.6
Herefordshire & Worcestershire	57	16.9	50	14.3	-12.2	-1.3
Coventry and Warwickshire	63	15.3	56	12.8	-11.7	-1.2
Derbyshire	87	20.2	72	16.3	-16.4	-1.8
Nottinghamshire	62	12.5	54	10.7	-12.3	-1.3
Lincolnshire and Rutland	52	17.0	47	14.9	-9.8	-1.0
Leicestershire	80	17.9	70	15.4	-12.7	-1.4
Northamptonshire	58	17.5	52	15.2	-10.4	-1.1
North Yorkshire	41	10.4	37	8.9	-8.6	-0.9
West Yorkshire	160	15.1	145	13.1	-9.3	-1.0
South Yorkshire	87	15.1	80	13.5	-8.5	-0.9
Humberside	73	17.9	70	16.7	-4.7	-0.5
Cumbria	42	17.9	39	16.1	-8.2	-0.9
Lancashire	119	17.8	106	15.7	-10.4	-1.1
Greater Merseyside	61	10.2	55	9.0	-9.7	-1.0
Greater Manchester	158	12.0	139	10.2	-12.0	-1.3
Cheshire and Warrington	73	13.5	63	11.3	-12.9	-1.4
Northumberland	13	11.4	11	9.7	-13.4	-1.4
Tyne and Wear	64	12.4	58	11.0	-8.5	-0.9
County Durham	36	20.3	33	17.8	-10.8	-1.1
Tees Valley	40	13.9	34	11.6	-14.7	-1.6

Table 15.3a: Total Employment, Manufacturing, by Region, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Manufacturing	000s	share %	000s	share %	%	%pa
England	3013	11.8	2686	10.1	-10.9	-1.1
London	264	5.9	233	4.9	-11.7	-1.2
South East	398	9.4	370	8.2	-7.0	-0.7
East of England	326	11.9	295	10.2	-9.6	-1.0
South West	287	11.3	247	9.3	-14.0	-1.5
West Midlands	433	16.7	375	14.0	-13.3	-1.4
East Midlands	338	16.8	295	14.3	-12.8	-1.4
Yorkshire and the Humber	361	14.8	332	13.1	-8.1	-0.8
North West	453	13.5	403	11.6	-11.1	-1.2
North East	153	14.0	136	12.1	-11.1	-1.2

- Employment in *manufacturing* in *England* is projected to decline at 1.1 per cent per annum from 3.01 million (just under 12 per cent of total employment) in 2004 to 2.69 million (just over 10 per cent of total employment) in 2014.
  - The shares of total employment in this broad sector in 2004 range from under 10 per cent in London LSC areas, some neighbouring 'Home Counties' areas and further west in local LSC areas such as the West of England and Devon and Cornwall, to more than 20 per cent in the Black Country, Country Durham and Derbyshire. In general, the share of total employment accounted for by manufacturing tends to be greater in the midlands (nearly 17 per cent of total employment in the East Midlands and West Midlands in 2014) and northern regions than in south-eastern England.
  - All local LSC areas are projected to experience a reduction in employment in this broad sector between 2004 and 2014. Local LSC areas in the 'Greater South East' (such as Kent & Medway, Surrey, Milton Keynes Oxfordshire & Buckinghamshire, Hertfordshire, Sussex and Berkshire) record some of the slowest rates of decrease. Fastest rates of loss are recorded in Somerset, Derbyshire, Gloucestershire, Birmingham & Solihull, the West of England, Tees Valley and the West of England. This is indicative of higher than average rates of decline in manufacturing employment the South West, West Midlands and East Midlands.

Table 15.4: Total Employment, Construction, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Construction	000s	share %	000s	share %	%	%pa
England	1757	6.9	1706	6.4	-2.9	-0.3
London North	29	7.8	30	7.7	3.4	0.3
London West	55	7.0	56	6.8	2.4	0.2
London Central	58	3.6	62	3.5	5.7	0.6
London East	69	6.1	69	5.8	0.7	0.1
London South	56	9.6	57	9.3	2.5	0.2
Milton Keynes, Oxon and Bucks	39	5.2	39	4.9	1.5	0.1
Berkshire	31	6.0	31	5.7	1.4	0.1
Hampshire and Isle of Wight	75	8.2	76	7.9	1.4	0.1
Surrey	44	7.3	45	6.8	1.2	0.1
Sussex	44	6.1	45	5.8	1.1	0.1
Kent and Medway	76	10.4	77	9.9	1.8	0.2
Norfolk	34	8.8	34	8.5	0.6	0.1
Cambridgeshire	23	5.7	22	5.1	-4.1	-0.4
Suffolk	23	6.9	22	6.3	-5.5	-0.6
Luton and Bedfordshire	19	7.3	18	6.9	-2.2	-0.2
Hertfordshire	53	9.1	53	8.6	0.0	0.0
Essex	83	10.6	83	10.2	-0.1	0.0
Devon and Cornwall	56	7.7	57	7.5	1.8	0.2
Somerset	15	6.3	15	6.2	1.5	0.2
Bournemouth, Dorset and Poole	25	7.5	25	7.3	1.4	0.1
West of England	47	7.7	48	7.5	2.2	0.2
Wiltshire	16	4.7	16	4.6	1.0	0.1
Gloucestershire	19	6.2	19	6.1	1.7	0.2
Shropshire	12	5.8	10	4.9	-11.8	-1.3
Staffordshire	34	7.0	29	5.7	-14.9	-1.6
Black Country	42	8.4	36	7.0	-15.8	-1.7
Birmingham and Solihull	40	6.0	35	5.1	-13.3	-1.4
Herefordshire & Worcestershire	24	7.0	21	6.1	-9.7	-1.0
Coventry and Warwickshire	23	5.6	21	4.9	-7.6	-0.8
Derbyshire	29	6.7	27	6.2	-4.6	-0.5
Nottinghamshire	40	8.2	39	7.6	-4.9	-0.5
Lincolnshire and Rutland	24	7.9	23	7.3	-5.6	-0.6
Leicestershire	30	6.8	29	6.4	-4.0	-0.4
Northamptonshire	25	7.4	22	6.6	-8.5	-0.9
North Yorkshire	27	6.8	25	6.0	-6.7	-0.7
West Yorkshire	67	6.3	60	5.4	-10.9	-1.2
South Yorkshire	52	8.9	44	7.4	-14.9	-1.6
Humberside	31	7.6	27	6.4	-13.8	-1.5
Cumbria	14	5.8	13	5.2	-7.6	-0.8
Lancashire	44	6.6	43	6.3	-3.0	-0.3
Greater Merseyside	27	4.4	25	4.0	-7.6	-0.8
Greater Manchester	79	6.0	75	5.5	-5.4	-0.6
Cheshire and Warrington	40	7.4	39	6.9	-2.7	-0.3
Northumberland	7	5.9	6	5.7	-1.6	-0.2
Tyne and Wear	27	5.2	26	4.9	-2.1	-0.2
County Durham	14	7.8	14	7.4	-3.9	-0.4
Tees Valley	20	7.1	19	6.6	-4.0	-0.4

Table 15.4a: Total Employment, Construction, by Region, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Construction	000s	share %	000s	share %	%	%pa
England	1757	6.9	1706	6.4	-2.9	-0.3
London	267	5.9	274	5.7	2.8	0.3
South East	309	7.3	313	6.9	1.4	0.1
East of England	235	8.5	232	8.0	-1.1	-0.1
South West	177	7.0	180	6.8	1.7	0.2
West Midlands	174	6.7	152	5.6	-12.9	-1.4
East Midlands	148	7.4	140	6.8	-5.4	-0.5
Yorkshire and the Humber	177	7.2	156	6.1	-12.0	-1.3
North West	203	6.1	194	5.6	-4.8	-0.5
North East	68	6.2	66	5.9	-3.0	-0.3

- Employment in *construction* in *England* is projected to decline at 0.3 per cent per annum from 1.76 million (nearly 7 per cent of total employment) in 2004 to 1.71 million (6.4 per cent of total employment) in 2014.
  - There is no clear regional or urban-rural pattern of variation in the shares of total employment in this broad sector: in 2004 shares of total employment range from over 10 per cent in Essex and Kent & Medway to under 5 per cent in London Central, Greater Merseyside and Wiltshire.
  - Eighteen out of forty-seven local LSC areas are projected to see a growth in construction employment over the period to 2014, and in a further two areas employment levels are projected to remain unchanged. Projected rates of increase are greatest in London, the South West and the South East. Local LSC areas in the West Midlands (the Black Country, Staffordshire, Birmingham & Solihull and Shropshire) and Yorkshire & the Humber (notably South Yorkshire and West Yorkshire) display amongst the fastest rates of projected job loss according to these ‘benchmark’ projections.

Table 15.5: Total Employment, Distribution, Transport, etc, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Distribution & transport, etc.	000s	share %	000s	share %	%	%pa
England	7554	29.6	7999	30.0	5.9	0.6
London North	119	32.4	126	32.4	6.1	0.6
London West	298	38.2	314	37.9	5.3	0.5
London Central	451	27.6	475	27.2	5.4	0.5
London East	251	22.3	265	22.1	5.4	0.5
London South	173	29.8	184	29.6	5.9	0.6
Milton Keynes, Oxon and Bucks	222	29.6	248	30.6	11.6	1.1
Berkshire	149	29.2	161	29.3	8.3	0.8
Hampshire and Isle of Wight	263	28.8	283	29.4	7.7	0.7
Surrey	179	29.7	197	30.3	10.4	1.0
Sussex	231	32.0	245	32.2	6.4	0.6
Kent and Medway	231	31.6	251	32.3	8.7	0.8
Norfolk	109	28.6	114	28.9	5.0	0.5
Cambridgeshire	116	28.1	124	28.0	7.0	0.7
Suffolk	111	33.1	120	34.6	8.3	0.8
Luton and Bedfordshire	75	29.0	79	29.5	4.3	0.4
Hertfordshire	184	31.7	194	31.3	5.1	0.5
Essex	250	32.1	268	32.9	7.1	0.7
Devon and Cornwall	234	32.3	246	32.5	4.9	0.5
Somerset	68	29.3	73	30.5	7.4	0.7
Bournemouth, Dorset and Poole	105	31.8	110	32.1	5.1	0.5
West of England	167	27.5	174	27.4	4.2	0.4
Wiltshire	115	33.4	120	33.6	5.0	0.5
Gloucestershire	88	28.6	92	29.4	5.1	0.5
Shropshire	59	29.0	64	29.7	7.2	0.7
Staffordshire	147	30.5	157	31.4	7.3	0.7
Black Country	145	28.7	150	29.5	3.4	0.3
Birmingham and Solihull	168	25.5	173	25.3	2.7	0.3
Herefordshire & Worcestershire	95	28.1	103	29.4	8.3	0.8
Coventry and Warwickshire	127	31.0	135	31.2	6.1	0.6
Derbyshire	121	28.3	127	28.7	4.6	0.5
Nottinghamshire	139	28.1	143	28.2	2.8	0.3
Lincolnshire and Rutland	89	29.2	94	30.2	6.3	0.6
Leicestershire	131	29.3	137	30.2	4.9	0.5
Northamptonshire	100	30.2	106	30.9	5.6	0.6
North Yorkshire	135	34.4	147	35.1	8.6	0.8
West Yorkshire	306	28.7	321	28.9	5.1	0.5
South Yorkshire	163	28.2	172	29.1	5.8	0.6
Humberside	121	29.5	128	30.7	6.0	0.6
Cumbria	82	34.7	85	35.4	3.7	0.4
Lancashire	190	28.5	195	28.7	2.8	0.3
Greater Merseyside	176	29.2	180	29.1	2.2	0.2
Greater Manchester	407	30.8	421	30.9	3.5	0.3
Cheshire and Warrington	168	31.3	177	31.8	5.7	0.6
Northumberland	31	27.9	34	29.7	8.5	0.8
Tyne and Wear	140	27.2	149	28.2	6.5	0.6
County Durham	46	25.7	50	27.1	7.4	0.7
Tees Valley	81	28.1	88	29.8	9.0	0.9

Table 15.5a: Total Employment, Distribution, Transport, etc, by Region, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Distribution & transport, etc.	000s	share %	000s	share %	%	%pa
England	7554	29.6	7999	30.0	5.9	0.6
London	1293	28.8	1364	28.5	5.5	0.5
South East	1274	30.1	1386	30.7	8.8	0.8
East of England	846	30.7	899	31.2	6.3	0.6
South West	777	30.5	816	30.8	5.0	0.5
West Midlands	742	28.5	782	29.1	5.4	0.5
East Midlands	580	28.9	607	29.5	4.7	0.5
Yorkshire and the Humber	725	29.6	769	30.3	6.1	0.6
North West	1021	30.4	1058	30.6	3.6	0.3
North East	298	27.2	320	28.6	7.5	0.7

- Employment in *distribution and transport* in *England* is projected to increase at 0.6 per cent per annum from 7.55 million 2004 to 8 million in 2014. This broad sector is expected to continue to account for 30 per cent of total employment by 2014.

➢ The shares of total employment in this broad sector in 2004 range from less than 23 per cent in London East and less than 26 per cent in Birmingham & Solihull and County Durham to over 35 per cent in London West (including Heathrow) and in excess of 33 per cent in Cumbria, North Yorkshire, Wiltshire and Suffolk.

➢ All local LSC areas are projected to experience an increase in employment in this broad sector between 2004 and 2014. The fastest rates of employment growth (at least 1 per cent per annum) are expected in Milton Keynes Oxfordshire and Buckinghamshire, and Surrey. The slowest rates of employment increase (0.3 per cent per annum or less) are projected for Greater Merseyside, Birmingham & Solihull, Nottinghamshire, Lancashire, the Black Country and Greater Manchester.

Table 15.6: Total Employment, Business & Other Services, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Business & other services	000s	share %	000s	share %	%	%pa
England	6813	26.7	7639	28.6	12.1	1.2
London North	94	25.4	106	27.3	13.7	1.3
London West	233	29.8	266	32.1	14.0	1.3
London Central	697	42.6	771	44.1	10.6	1.0
London East	521	46.1	573	47.9	10.1	1.0
London South	188	32.3	213	34.3	13.1	1.2
Milton Keynes, Oxon and Bucks	231	30.8	261	32.3	13.1	1.2
Berkshire	190	37.1	213	38.7	12.5	1.2
Hampshire and Isle of Wight	251	27.4	273	28.3	8.8	0.8
Surrey	213	35.4	240	36.9	12.5	1.2
Sussex	185	25.7	202	26.6	9.1	0.9
Kent and Medway	161	22.0	176	22.7	9.4	0.9
Norfolk	89	23.2	97	24.5	9.1	0.9
Cambridgeshire	109	26.5	130	29.3	18.7	1.7
Suffolk	75	22.4	82	23.6	9.3	0.9
Luton and Bedfordshire	69	26.5	75	28.2	9.0	0.9
Hertfordshire	178	30.5	206	33.2	15.8	1.5
Essex	191	24.5	212	26.0	10.8	1.0
Devon and Cornwall	143	19.6	157	20.8	10.2	1.0
Somerset	47	20.2	53	21.9	11.6	1.1
Bournemouth, Dorset and Poole	80	24.4	87	25.5	8.6	0.8
West of England	178	29.3	199	31.3	12.0	1.1
Wiltshire	80	23.3	90	25.2	12.9	1.2
Gloucestershire	70	22.9	77	24.7	10.5	1.0
Shropshire	35	16.9	40	18.8	16.4	1.5
Staffordshire	89	18.6	106	21.1	18.6	1.7
Black Country	96	18.9	108	21.3	13.2	1.2
Birmingham and Solihull	183	27.7	210	30.7	14.5	1.4
Herefordshire & Worcestershire	73	21.6	84	24.1	15.6	1.5
Coventry and Warwickshire	97	23.6	114	26.3	17.6	1.6
Derbyshire	73	17.1	84	19.0	14.6	1.4
Nottinghamshire	113	22.9	125	24.7	10.4	1.0
Lincolnshire and Rutland	46	15.2	51	16.4	11.2	1.1
Leicestershire	91	20.4	101	22.2	10.7	1.0
Northamptonshire	82	24.8	94	27.5	14.7	1.4
North Yorkshire	82	20.9	100	23.9	21.9	2.0
West Yorkshire	271	25.4	317	28.5	16.9	1.6
South Yorkshire	122	21.0	138	23.2	13.2	1.2
Humberside	67	16.4	74	17.8	10.7	1.0
Cumbria	39	16.5	42	17.7	8.6	0.8
Lancashire	124	18.6	137	20.2	11.0	1.0
Greater Merseyside	133	22.1	144	23.3	7.8	0.8
Greater Manchester	362	27.4	404	29.6	11.8	1.1
Cheshire and Warrington	138	25.7	158	28.3	14.7	1.4
Northumberland	18	16.2	20	17.4	9.3	0.9
Tyne and Wear	117	22.8	127	24.1	8.5	0.8
County Durham	30	16.8	34	18.7	13.2	1.2
Tees Valley	60	21.0	66	22.5	10.1	1.0

Table 15.6a: Total Employment, Business & Other Services, by Region, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Business & other services	000s	share %	000s	share %	%	%pa
England	6813	26.7	7639	28.6	12.1	1.2
London	1733	38.5	1929	40.3	11.3	1.1
South East	1231	29.1	1366	30.3	10.9	1.0
East of England	711	25.8	801	27.8	12.7	1.2
South West	598	23.5	664	25.1	11.0	1.1
West Midlands	572	22.0	662	24.6	15.7	1.5
East Midlands	406	20.2	455	22.1	12.2	1.2
Yorkshire and the Humber	541	22.2	628	24.7	16.0	1.5
North West	795	23.7	886	25.6	11.4	1.1
North East	226	20.7	248	22.1	9.6	0.9

- Employment in *business and other services* in *England* is projected to increase at 1.2 per cent per annum from 6.81 million (nearly 27 per cent of total employment) in 2004 to about 7.64 million (nearly 29 per cent of total employment) in 2014.
  - Along with the primary sector and utilities, there are more pronounced sub-regional variations in the distribution of employment in this broad sector than for any other.
  - London East (including the City of London) and London Central local LSC areas display easily the largest shares of total employment in this broad sector at 46 per cent and 43 per cent, respectively, in 2004. However, the projected rate of increase in these two local LSC areas is, at 1 per cent per annum, somewhat slower than the England average.
  - ‘Rural’ and more ‘peripheral’ local LSC areas (such as Lincolnshire & Rutland, Northumberland, Humberside, Cumbria and Shropshire) display amongst the smallest proportions of such employment (less than 17 per cent of total employment in 2004).
  - All local LSC areas are projected to display job gains in business and other services over the period to 2014. Parts of the West Midlands (such as Staffordshire and Coventry & Warwickshire) and Yorkshire & the Humber (notably North Yorkshire and West Yorkshire), along with Cambridgeshire and Hertfordshire, display amongst the fastest rates of employment increase. Greater Merseyside, Tyne & Wear, Cumbria, Bournemouth Dorset & Poole and Hampshire & the Isle of Wight display the slowest rate of increase (albeit at 0.8 per cent per annum over the period).

Table 15.7: Total Employment, Non-marketed Services, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Non-marketed services	000s	share %	000s	share %	%	%pa
England	5925	23.2	6281	23.5	6.0	0.6
London North	98	26.7	103	26.5	5.3	0.5
London West	137	17.5	142	17.1	3.7	0.4
London Central	348	21.3	369	21.1	6.1	0.6
London East	215	19.0	226	18.9	5.2	0.5
London South	127	21.8	133	21.5	4.8	0.5
Milton Keynes, Oxon and Bucks	162	21.7	172	21.3	6.0	0.6
Berkshire	90	17.5	98	17.7	9.0	0.9
Hampshire and Isle of Wight	207	22.7	223	23.2	7.8	0.8
Surrey	114	19.0	120	18.5	5.4	0.5
Sussex	177	24.5	192	25.2	8.5	0.8
Kent and Medway	172	23.5	186	24.0	8.7	0.8
Norfolk	86	22.7	96	24.2	10.7	1.0
Cambridgeshire	101	24.5	111	25.0	9.5	0.9
Suffolk	71	21.3	77	22.0	7.4	0.7
Luton and Bedfordshire	56	21.7	58	21.8	3.0	0.3
Hertfordshire	103	17.8	108	17.5	4.8	0.5
Essex	158	20.3	165	20.3	4.2	0.4
Devon and Cornwall	191	26.3	206	27.3	7.9	0.8
Somerset	58	24.9	62	26.0	7.6	0.7
Bournemouth, Dorset and Poole	79	24.1	87	25.3	9.4	0.9
West of England	149	24.5	158	24.8	6.3	0.6
Wiltshire	74	21.6	78	21.9	5.7	0.6
Gloucestershire	75	24.4	79	25.1	5.4	0.5
Shropshire	55	27.0	61	28.6	10.8	1.0
Staffordshire	117	24.4	128	25.7	9.5	0.9
Black Country	112	22.2	121	23.9	8.2	0.8
Birmingham and Solihull	175	26.5	186	27.2	6.0	0.6
Herefordshire & Worcestershire	73	21.7	80	22.7	8.2	0.8
Coventry and Warwickshire	90	21.9	99	22.8	10.1	1.0
Derbyshire	113	26.4	127	28.6	11.9	1.1
Nottinghamshire	131	26.6	138	27.3	4.9	0.5
Lincolnshire and Rutland	76	24.9	82	26.3	8.2	0.8
Leicestershire	103	23.1	108	23.8	5.0	0.5
Northamptonshire	64	19.2	66	19.3	3.8	0.4
North Yorkshire	89	22.5	93	22.2	5.2	0.5
West Yorkshire	248	23.3	260	23.4	4.7	0.5
South Yorkshire	150	26.0	155	26.2	3.5	0.3
Humberside	103	25.3	108	26.0	4.7	0.5
Cumbria	53	22.7	56	23.5	5.1	0.5
Lancashire	179	26.9	189	27.8	5.2	0.5
Greater Merseyside	204	33.8	212	34.4	4.1	0.4
Greater Manchester	306	23.2	319	23.4	4.3	0.4
Cheshire and Warrington	107	20.0	111	19.9	3.7	0.4
Northumberland	38	33.7	39	33.7	1.7	0.2
Tyne and Wear	161	31.3	162	30.7	0.9	0.1
County Durham	48	26.7	49	26.8	2.0	0.2
Tees Valley	80	27.8	81	27.6	2.0	0.2

Table 15.7a: Total Employment, Non-marketed Services, by Region, 2004-2014

	2004		2014		2004-2014	
		Industry		Industry	Change	
Non-marketed services	000s	share %	000s	share %	%	%pa
England	5925	23.2	6281	23.5	6.0	0.6
London	925	20.6	973	20.3	5.3	0.5
South East	922	21.8	992	22.0	7.6	0.7
East of England	577	21.0	614	21.3	6.5	0.6
South West	626	24.6	670	25.3	7.1	0.7
West Midlands	624	24.0	675	25.1	8.3	0.8
East Midlands	487	24.3	520	25.3	6.9	0.7
Yorkshire and the Humber	590	24.2	617	24.3	4.5	0.4
North West	850	25.3	887	25.7	4.4	0.4
North East	327	29.9	331	29.6	1.4	0.1

- Employment in *non-marketed services* in *England* is projected to increase at 0.6 per cent per annum from 5.93 million in 2004 to 6.28 million in 2014. The share of total employment accounted for by this broad sector is expected to increase only marginally to 23.5 per cent.
- ➢ The shares of total employment in this broad sector range from less than 20 per cent in some local LSC areas drawn predominantly from London and the 'Greater South East' (such as London West, Berkshire, Hertfordshire, Surrey, London East and Northamptonshire) to more than 30 per cent in Greater Merseyside, Northumberland and Tyne & Wear. This underlines the importance of the public sector as a local economic driver in many of the 'traditionally' depressed urban areas and the greater preponderance of private sector business drivers in London and south-eastern England. In general, the non-marketed services sector accounts for smaller share of total employment in local LSC areas in south-eastern England than in northern England (especially the North East).
- ➢ All local LSC areas are projected to see an increase in employment in non-marketed services. Local LSC areas in the North East display amongst the slowest projected rates of employment increase (0.1 to 0.2 per cent per annum) while parts of the midlands (Derbyshire, Shropshire and Coventry & Warwickshire, along with Norfolk) display the greatest rates of increase (at least 1 per cent per annum).

15.4 Employment by gender and status

- Across *England males* accounted for 13.7 million jobs (54 per cent of total employment) in 2004, while 11.8 million jobs were filled by *females*. By 2014 the respective projected numbers and shares are 14.3 million jobs for males (54 per cent of total employment) and 12.4 million jobs for females. 15.2 million employee jobs (60 per cent of total employment) were *full-time* and just under 7 million were *part-time* in 2004. By 2014 there are projected to be 15.9 million full-time employees in England and 7.7 million part-time employees.

➢ In 2004 *males* accounted for a majority of those in employment in all local LSC areas, although the share of total employment accounted for by males ranged from 51 per cent in Greater Merseyside, Northumberland, Devon & Cornwall and Sussex to at least 56 per cent in London West, the Black Country, London East and Berkshire (i.e. some traditional manufacturing areas and some of the most dynamic local economies in England).

➢ The share of total employment accounted for by *full-time employees* was highest in London (especially in London East, London Central and London West, where over a third of employees worked on a full-time basis) in 2004. These same three local areas are projected to exhibit the largest shares of full-time employees in 2014. By contrast, in parts of the South West (Devon and Cornwall, Bournemouth Dorset & Poole, Wiltshire and Somerset) 51-54 per cent total employment was accounted for by full-time workers. By 2014 only 50 per cent of employment in Devon & Cornwall is projected to be accounted for by full-time employees, with a further 36 per cent comprising part-time employees and 15 per cent self-employed.

➢ *Self-employment* is most prevalent in the South West (accounting for about 16 per cent of total employment) and accounts for the smallest shares of total employment (9 per cent) in the North East in 2004. By 2014 the self-employed are projected to account for only 14 per cent of total employment in the South West and the East of England. Other local LSC areas with amongst the highest proportions of self-employed in 2004 were Kent & Medway, Essex and Hertfordshire, while Greater Merseyside, Birmingham & Solihull and the Black Country displayed the lowest shares of self-employed, along with the North East local LSC areas.

Table 15.8: Total Employment by Gender and Status, LLSC Area, 2004

000s

2004	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	13720	11798	15184	9555	5629	6994	1764	5229	3340
London North	196	172	222	132	90	96	30	67	49
London West	453	328	513	322	191	166	56	110	102
London Central	889	746	1090	637	452	344	118	226	201
London East	628	501	768	461	307	228	72	157	133
London South	316	267	352	212	140	150	46	104	81
Milton Keynes, Oxon and Bucks	402	347	446	277	169	197	50	147	106
Berkshire	284	227	317	201	117	121	31	90	72
Hampshire and Isle of Wight	490	424	501	320	181	274	70	204	139
Surrey	321	282	343	213	130	167	43	124	93
Sussex	371	350	400	247	153	215	51	164	106
Kent and Medway	389	341	401	251	149	211	52	160	118
Norfolk	205	176	210	136	74	112	26	86	59
Cambridgeshire	221	191	241	152	88	113	28	85	59
Suffolk	177	158	187	122	65	98	21	77	50
Luton and Bedfordshire	136	123	152	93	59	69	17	53	39
Hertfordshire	311	271	327	205	122	164	40	123	91
Essex	417	364	440	277	163	218	51	167	123
Devon and Cornwall	372	353	367	226	141	242	63	179	118
Somerset	125	108	126	82	44	71	17	54	36
Bournemouth, Dorset and Poole	171	158	172	107	65	105	27	78	51
West of England	328	280	342	217	124	171	42	130	95
Wiltshire	184	159	184	119	65	106	27	78	53
Gloucestershire	162	144	171	106	64	88	22	67	47
Shropshire	111	94	122	79	43	59	14	45	24
Staffordshire	256	224	279	182	97	147	34	113	54
Black Country	286	219	322	213	109	127	29	98	55
Birmingham and Solihull	351	310	419	259	160	172	40	132	70
Herefordshire & Worcestershire	179	159	196	127	69	99	21	79	43
Coventry and Warwickshire	223	188	255	166	89	110	23	87	46
Derbyshire	225	204	236	158	78	142	31	111	51
Nottinghamshire	258	236	277	175	102	153	37	116	64
Lincolnshire and Rutland	165	139	177	114	63	86	20	67	41
Leicestershire	240	206	268	170	98	123	31	92	55
Northamptonshire	179	152	199	127	72	89	21	68	43
North Yorkshire	216	177	221	148	73	122	29	92	50
West Yorkshire	580	485	649	420	229	294	71	223	121
South Yorkshire	310	267	341	223	118	170	38	132	67
Humberside	223	185	235	160	75	125	26	99	48
Cumbria	122	113	132	89	43	77	14	63	27
Lancashire	362	304	408	263	145	183	45	138	75
Greater Merseyside	306	296	364	219	144	175	44	132	63
Greater Manchester	706	612	805	498	307	358	98	260	155
Cheshire and Warrington	295	242	327	215	112	145	33	112	64
Northumberland	58	55	64	40	24	37	9	28	12
Tyne and Wear	270	244	326	202	124	142	34	108	46
County Durham	99	81	114	76	38	48	9	39	18
Tees Valley	151	136	179	115	64	81	16	65	27

Key:

M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.8a: Total Employment by Gender and Status by Region, 2004

000s

2004	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	13720	11798	15184	9555	5629	6994	1764	5229	3340
London	2482	2014	2945	1765	1180	985	321	664	566
South East	2256	1971	2408	1509	899	1185	296	889	634
East of England	1468	1283	1556	985	571	774	184	590	421
South West	1342	1202	1362	858	504	784	198	586	399
West Midlands	1406	1193	1593	1026	567	715	161	554	292
East Midlands	1067	937	1157	744	413	593	139	454	254
Yorkshire and the Humber	1329	1115	1447	952	495	711	164	547	286
North West	1790	1568	2035	1285	751	938	234	705	385
North East	578	515	683	433	250	308	67	241	103

Key:

M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.9: Total Employment by Gender and Status, LLSC Area, 2014

000s

2014	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	14328	12366	15908	9977	5931	7687	2084	5603	3099
London North	207	183	239	136	102	99	35	64	52
London West	481	347	538	332	207	182	69	113	107
London Central	947	803	1140	667	473	394	137	257	216
London East	672	525	819	480	338	237	92	145	141
London South	335	285	370	221	150	165	55	110	85
Milton Keynes, Oxon and Bucks	439	371	505	311	193	209	58	151	96
Berkshire	300	252	348	216	131	140	36	104	64
Hampshire and Isle of Wight	508	455	525	331	194	315	86	229	124
Surrey	342	309	380	233	147	191	50	141	81
Sussex	389	373	425	267	158	241	54	186	96
Kent and Medway	414	363	436	271	165	233	62	171	107
Norfolk	213	182	208	139	69	131	32	98	57
Cambridgeshire	229	213	252	158	95	134	33	101	56
Suffolk	174	175	186	119	67	116	24	92	46
Luton and Bedfordshire	135	132	158	91	67	74	20	54	34
Hertfordshire	323	295	347	214	133	183	46	137	89
Essex	434	380	474	291	183	227	59	168	114
Devon and Cornwall	384	371	375	226	150	270	76	194	110
Somerset	132	109	128	85	43	78	21	57	35
Bournemouth, Dorset and Poole	183	160	177	114	63	117	31	86	49
West of England	345	291	355	228	127	189	47	141	92
Wiltshire	193	165	184	122	63	125	34	90	49
Gloucestershire	164	149	178	106	72	92	25	67	43
Shropshire	117	97	126	83	43	68	18	50	20
Staffordshire	267	234	280	186	94	175	46	129	46
Black Country	279	230	318	207	111	146	36	110	45
Birmingham and Solihull	354	329	423	260	163	203	49	154	57
Herefordshire & Worcestershire	187	164	208	136	72	107	23	84	36
Coventry and Warwickshire	226	207	278	174	105	118	24	94	37
Derbyshire	227	215	231	156	75	165	37	128	47
Nottinghamshire	274	231	279	188	91	166	41	125	60
Lincolnshire and Rutland	173	139	192	122	70	85	22	62	36
Leicestershire	242	212	270	172	98	134	33	100	51
Northamptonshire	178	164	210	129	81	94	22	72	38
North Yorkshire	238	181	238	164	74	134	36	97	47
West Yorkshire	614	498	686	440	246	319	90	229	107
South Yorkshire	313	280	343	224	119	194	45	149	55
Humberside	228	188	238	163	74	137	31	106	41
Cumbria	119	120	131	91	39	86	13	73	22
Lancashire	374	306	420	280	140	194	49	145	66
Greater Merseyside	339	278	400	244	155	162	56	106	54
Greater Manchester	734	631	841	520	321	387	121	266	137
Cheshire and Warrington	306	253	344	230	115	157	36	120	58
Northumberland	57	57	62	39	23	41	9	31	12
Tyne and Wear	289	239	340	215	125	144	40	104	43
County Durham	100	82	115	79	36	51	8	42	17
Tees Valley	151	144	188	117	71	82	15	67	25

Key:

M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.9a: Total Employment by Gender and Status by Region, 2014

000s

2014	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	14328	12366	15908	9977	5931	7687	2084	5603	3099
London	2642	2143	3106	1835	1270	1078	388	690	601
South East	2392	2122	2618	1629	990	1328	347	982	567
East of England	1508	1377	1625	1013	613	864	214	650	396
South West	1400	1246	1398	881	517	870	235	635	378
West Midlands	1430	1260	1633	1045	589	816	195	620	241
East Midlands	1093	962	1181	767	415	643	155	488	231
Yorkshire and the Humber	1394	1146	1505	993	512	785	203	582	250
North West	1871	1588	2136	1366	770	986	275	711	337
North East	597	522	705	449	256	318	73	245	97

Key:
M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.10: Change in Employment by Gender and Status, LLSC Area, 2004-14 (% change)

2004-2014	Change %								
	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	4.4	4.8	4.8	4.4	5.4	9.9	18.1	7.1	-7.2
London North	5.6	6.5	7.3	2.9	13.9	2.7	17.1	-3.7	6.5
London West	6.1	5.7	5.0	3.0	8.3	9.8	24.4	2.4	4.5
London Central	6.4	7.7	4.6	4.6	4.6	14.5	16.0	13.7	7.3
London East	7.0	4.7	6.6	4.2	10.3	3.7	27.7	-7.2	6.3
London South	6.2	6.7	5.2	3.9	7.1	10.1	19.8	5.9	5.0
Milton Keynes, Oxon and Bucks	9.1	6.8	13.1	12.3	14.6	6.1	15.2	3.0	-9.9
Berkshire	5.6	10.9	9.5	7.8	12.6	15.6	15.4	15.6	-11.7
Hampshire and Isle of Wight	3.8	7.3	4.8	3.3	7.5	15.0	23.5	12.1	-11.1
Surrey	6.7	9.7	10.9	9.6	12.9	14.3	17.8	13.0	-13.0
Sussex	4.9	6.5	6.2	7.9	3.6	11.9	6.0	13.7	-9.3
Kent and Medway	6.4	6.4	8.8	7.7	10.6	10.3	21.1	6.9	-8.9
Norfolk	4.3	3.1	-0.9	2.4	-7.0	16.6	24.1	14.3	-4.2
Cambridgeshire	3.4	11.8	4.8	3.5	7.1	19.1	17.6	19.5	-5.2
Suffolk	-2.1	10.5	-0.3	-1.8	2.7	17.9	11.5	19.7	-8.5
Luton and Bedfordshire	-1.3	6.7	4.0	-2.2	13.7	6.7	19.1	2.7	-10.8
Hertfordshire	4.0	9.0	6.2	4.6	8.7	11.8	14.0	11.0	-2.7
Essex	4.0	4.6	7.7	5.1	12.1	3.8	14.6	0.5	-6.8
Devon and Cornwall	3.0	5.0	2.4	0.1	6.1	11.8	20.9	8.6	-6.9
Somerset	5.3	0.7	1.5	3.3	-1.9	9.0	22.3	4.8	-2.5
Bournemouth, Dorset and Poole	7.0	1.4	2.9	6.5	-3.0	10.9	15.6	9.3	-5.0
West of England	5.1	4.1	4.0	5.0	2.1	10.0	13.1	9.0	-2.6
Wiltshire	4.8	4.0	-0.1	2.1	-4.0	18.1	25.3	15.5	-6.9
Gloucestershire	1.4	3.5	4.3	-0.4	12.1	4.2	13.7	1.1	-7.9
Shropshire	5.6	3.4	2.5	4.3	-0.8	16.4	31.5	11.8	-13.9
Staffordshire	4.0	4.6	0.3	1.9	-2.8	18.6	34.6	13.9	-14.5
Black Country	-2.4	4.8	-1.3	-3.1	2.4	14.3	22.0	12.0	-18.8
Birmingham and Solihull	0.8	6.2	1.1	0.4	2.4	17.6	22.5	16.1	-18.9
Herefordshire & Worcestershire	4.1	3.1	6.3	7.1	4.9	7.2	9.5	6.6	-17.2
Coventry and Warwickshire	1.6	10.0	9.3	5.0	17.2	6.8	2.8	7.9	-19.2
Derbyshire	0.7	5.7	-2.2	-1.4	-3.7	15.7	18.6	14.9	-8.0
Nottinghamshire	6.0	-2.0	0.6	7.3	-11.0	8.6	11.1	7.8	-6.2
Lincolnshire and Rutland	4.6	0.1	8.2	6.4	11.6	-1.7	14.3	-6.4	-12.9
Leicestershire	0.8	3.2	0.8	1.5	-0.4	8.7	7.9	9.0	-8.1
Northamptonshire	-0.3	8.0	5.9	2.1	12.6	5.3	4.3	5.6	-11.5
North Yorkshire	10.3	2.0	7.5	10.7	1.1	10.1	25.2	5.4	-6.4
West Yorkshire	6.0	2.7	5.7	4.9	7.1	8.5	27.3	2.5	-11.8
South Yorkshire	0.8	4.6	0.6	0.7	0.5	14.3	19.6	12.8	-17.5
Humberside	2.2	1.5	1.0	1.9	-0.9	10.0	19.1	7.6	-14.5
Cumbria	-2.1	5.9	-0.6	2.8	-7.7	12.3	-2.6	15.6	-17.2
Lancashire	3.3	0.6	3.1	6.6	-3.4	6.0	8.1	5.3	-12.8
Greater Merseyside	10.7	-6.2	10.0	11.5	7.6	-7.3	28.7	-19.2	-14.2
Greater Manchester	3.9	3.1	4.4	4.3	4.5	8.0	23.0	2.3	-11.4
Cheshire and Warrington	3.8	4.5	5.3	6.8	2.2	7.9	10.5	7.1	-10.2
Northumberland	-0.4	3.9	-3.0	-2.6	-3.6	11.3	10.3	11.6	-3.0
Tyne and Wear	6.9	-1.8	4.4	6.5	0.9	1.4	17.9	-3.7	-5.1
County Durham	1.5	1.8	1.0	3.5	-4.1	5.2	-9.1	8.6	-3.9
Tees Valley	-0.1	6.0	5.1	1.7	11.3	1.3	-5.7	3.0	-8.5

Key:
M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.10a: Change in Employment by Gender and Status by Region, 2004-14 (% change)

2004-2014	Change %								
	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	4.4	4.8	4.8	4.4	5.4	9.9	18.1	7.1	-7.2
London	6.4	6.4	5.5	4.0	7.7	9.4	20.7	3.9	6.2
South East	6.0	7.7	8.7	7.9	10.1	12.1	17.0	10.4	-10.5
East of England	2.7	7.3	4.4	2.8	7.2	11.6	16.3	10.1	-5.9
South West	4.3	3.6	2.7	2.7	2.7	11.0	18.5	8.5	-5.4
West Midlands	1.7	5.6	2.5	1.8	3.9	14.0	21.2	11.9	-17.5
East Midlands	2.4	2.7	2.1	3.1	0.4	8.4	11.5	7.4	-9.0
Yorkshire and the Humber	4.9	2.8	4.0	4.3	3.4	10.4	23.8	6.4	-12.6
North West	4.5	1.3	4.9	6.3	2.6	5.1	17.9	0.8	-12.4
North East	3.4	1.4	3.3	3.9	2.4	3.2	7.8	1.9	-5.5

Key:

M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.11: Change in Employment by Gender and Status, LLSC Area, 2004-14 (% p.a.)

2004-2014	Change %pa								
	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	0.4	0.5	0.5	0.4	0.5	1.0	1.7	0.7	-0.7
London North	0.5	0.6	0.7	0.3	1.3	0.3	1.6	-0.4	0.6
London West	0.6	0.6	0.5	0.3	0.8	0.9	2.2	0.2	0.4
London Central	0.6	0.7	0.5	0.4	0.5	1.4	1.5	1.3	0.7
London East	0.7	0.5	0.6	0.4	1.0	0.4	2.5	-0.7	0.6
London South	0.6	0.6	0.5	0.4	0.7	1.0	1.8	0.6	0.5
Milton Keynes, Oxon and Bucks	0.9	0.7	1.2	1.2	1.4	0.6	1.4	0.3	-1.0
Berkshire	0.5	1.0	0.9	0.7	1.2	1.5	1.4	1.5	-1.2
Hampshire and Isle of Wight	0.4	0.7	0.5	0.3	0.7	1.4	2.1	1.1	-1.2
Surrey	0.7	0.9	1.0	0.9	1.2	1.3	1.7	1.2	-1.4
Sussex	0.5	0.6	0.6	0.8	0.4	1.1	0.6	1.3	-1.0
Kent and Medway	0.6	0.6	0.8	0.7	1.0	1.0	1.9	0.7	-0.9
Norfolk	0.4	0.3	-0.1	0.2	-0.7	1.5	2.2	1.3	-0.4
Cambridgeshire	0.3	1.1	0.5	0.3	0.7	1.8	1.6	1.8	-0.5
Suffolk	-0.2	1.0	0.0	-0.2	0.3	1.7	1.1	1.8	-0.9
Luton and Bedfordshire	-0.1	0.6	0.4	-0.2	1.3	0.6	1.8	0.3	-1.1
Hertfordshire	0.4	0.9	0.6	0.5	0.8	1.1	1.3	1.1	-0.3
Essex	0.4	0.5	0.7	0.5	1.1	0.4	1.4	0.0	-0.7
Devon and Cornwall	0.3	0.5	0.2	0.0	0.6	1.1	1.9	0.8	-0.7
Somerset	0.5	0.1	0.1	0.3	-0.2	0.9	2.0	0.5	-0.3
Bournemouth, Dorset and Poole	0.7	0.1	0.3	0.6	-0.3	1.0	1.5	0.9	-0.5
West of England	0.5	0.4	0.4	0.5	0.2	1.0	1.2	0.9	-0.3
Wiltshire	0.5	0.4	0.0	0.2	-0.4	1.7	2.3	1.5	-0.7
Gloucestershire	0.1	0.3	0.4	0.0	1.1	0.4	1.3	0.1	-0.8
Shropshire	0.5	0.3	0.2	0.4	-0.1	1.5	2.8	1.1	-1.5
Staffordshire	0.4	0.4	0.0	0.2	-0.3	1.7	3.0	1.3	-1.6
Black Country	-0.2	0.5	-0.1	-0.3	0.2	1.3	2.0	1.1	-2.1
Birmingham and Solihull	0.1	0.6	0.1	0.0	0.2	1.6	2.1	1.5	-2.1
Herefordshire & Worcestershire	0.4	0.3	0.6	0.7	0.5	0.7	0.9	0.6	-1.9
Coventry and Warwickshire	0.2	1.0	0.9	0.5	1.6	0.7	0.3	0.8	-2.1
Derbyshire	0.1	0.6	-0.2	-0.1	-0.4	1.5	1.7	1.4	-0.8
Nottinghamshire	0.6	-0.2	0.1	0.7	-1.2	0.8	1.1	0.8	-0.6
Lincolnshire and Rutland	0.5	0.0	0.8	0.6	1.1	-0.2	1.3	-0.7	-1.4
Leicestershire	0.1	0.3	0.1	0.1	0.0	0.8	0.8	0.9	-0.8
Northamptonshire	0.0	0.8	0.6	0.2	1.2	0.5	0.4	0.6	-1.2
North Yorkshire	1.0	0.2	0.7	1.0	0.1	1.0	2.3	0.5	-0.7
West Yorkshire	0.6	0.3	0.6	0.5	0.7	0.8	2.4	0.3	-1.2
South Yorkshire	0.1	0.4	0.1	0.1	0.1	1.3	1.8	1.2	-1.9
Humberside	0.2	0.2	0.1	0.2	-0.1	1.0	1.8	0.7	-1.6
Cumbria	-0.2	0.6	-0.1	0.3	-0.8	1.2	-0.3	1.5	-1.9
Lancashire	0.3	0.1	0.3	0.6	-0.3	0.6	0.8	0.5	-1.4
Greater Merseyside	1.0	-0.6	1.0	1.1	0.7	-0.8	2.6	-2.1	-1.5
Greater Manchester	0.4	0.3	0.4	0.4	0.4	0.8	2.1	0.2	-1.2
Cheshire and Warrington	0.4	0.4	0.5	0.7	0.2	0.8	1.0	0.7	-1.1
Northumberland	0.0	0.4	-0.3	-0.3	-0.4	1.1	1.0	1.1	-0.3
Tyne and Wear	0.7	-0.2	0.4	0.6	0.1	0.1	1.7	-0.4	-0.5
County Durham	0.2	0.2	0.1	0.3	-0.4	0.5	-0.9	0.8	-0.4
Tees Valley	0.0	0.6	0.5	0.2	1.1	0.1	-0.6	0.3	-0.9

Key:

M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.11a: Change in Employment by Gender and Status by Region, 2004-14 (% p.a.)

2004-2014	Change %pa								
	M	F	FT	MFT	FFT	PT	MPT	FPT	SE
England	0.4	0.5	0.5	0.4	0.5	1.0	1.7	0.7	-0.7
London	0.6	0.6	0.5	0.4	0.7	0.9	1.9	0.4	0.6
South East	0.6	0.7	0.8	0.8	1.0	1.1	1.6	1.0	-1.1
East of England	0.3	0.7	0.4	0.3	0.7	1.1	1.5	1.0	-0.6
South West	0.4	0.4	0.3	0.3	0.3	1.1	1.7	0.8	-0.6
West Midlands	0.2	0.5	0.3	0.2	0.4	1.3	1.9	1.1	-1.9
East Midlands	0.2	0.3	0.2	0.3	0.0	0.8	1.1	0.7	-0.9
Yorkshire and the Humber	0.5	0.3	0.4	0.4	0.3	1.0	2.2	0.6	-1.3
North West	0.4	0.1	0.5	0.6	0.3	0.5	1.7	0.1	-1.3
North East	0.3	0.1	0.3	0.4	0.2	0.3	0.8	0.2	-0.6

Key:
M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.12: Shares of Employment by Gender and Status, LLSC Area, 2004 (%)

2004									%
	M	F	MFT	FFT	MPT	FPT	FT	PT	SE
England	54	46	63	37	25	75	60	27	13
London North	53	47	60	40	31	69	60	26	13
London West	58	42	63	37	34	66	66	21	13
London Central	54	46	58	42	34	66	67	21	12
London East	56	44	60	40	31	69	68	20	12
London South	54	46	60	40	31	69	60	26	14
Milton Keynes, Oxon and Bucks	54	46	62	38	26	74	60	26	14
Berkshire	56	44	63	37	26	74	62	24	14
Hampshire and Isle of Wight	54	46	64	36	25	75	55	30	15
Surrey	53	47	62	38	26	74	57	28	15
Sussex	51	49	62	38	24	76	55	30	15
Kent and Medway	53	47	63	37	24	76	55	29	16
Norfolk	54	46	65	35	23	77	55	29	16
Cambridgeshire	54	46	63	37	25	75	58	27	14
Suffolk	53	47	65	35	22	78	56	29	15
Luton and Bedfordshire	53	47	61	39	24	76	58	27	15
Hertfordshire	53	47	63	37	25	75	56	28	16
Essex	53	47	63	37	23	77	56	28	16
Devon and Cornwall	51	49	62	38	26	74	51	33	16
Somerset	54	46	65	35	24	76	54	31	15
Bournemouth, Dorset and Poole	52	48	62	38	26	74	52	32	16
West of England	54	46	64	36	24	76	56	28	16
Wiltshire	54	46	65	35	26	74	54	31	15
Gloucestershire	53	47	62	38	25	75	56	29	15
Shropshire	54	46	65	35	23	77	60	29	12
Staffordshire	53	47	65	35	23	77	58	31	11
Black Country	57	43	66	34	23	77	64	25	11
Birmingham and Solihull	53	47	62	38	23	77	63	26	11
Herefordshire & Worcestershire	53	47	65	35	21	79	58	29	13
Coventry and Warwickshire	54	46	65	35	21	79	62	27	11
Derbyshire	53	47	67	33	22	78	55	33	12
Nottinghamshire	52	48	63	37	24	76	56	31	13
Lincolnshire and Rutland	54	46	65	35	23	77	58	28	14
Leicestershire	54	46	63	37	25	75	60	28	12
Northamptonshire	54	46	64	36	23	77	60	27	13
North Yorkshire	55	45	67	33	24	76	56	31	13
West Yorkshire	54	46	65	35	24	76	61	28	11
South Yorkshire	54	46	65	35	22	78	59	29	12
Humberside	55	45	68	32	21	79	58	31	12
Cumbria	52	48	68	32	18	82	56	33	11
Lancashire	54	46	65	35	25	75	61	28	11
Greater Merseyside	51	49	60	40	25	75	60	29	11
Greater Manchester	54	46	62	38	27	73	61	27	12
Cheshire and Warrington	55	45	66	34	23	77	61	27	12
Northumberland	51	49	62	38	23	77	57	33	11
Tyne and Wear	53	47	62	38	24	76	63	28	9
County Durham	55	45	67	33	19	81	63	27	10
Tees Valley	53	47	64	36	19	81	62	28	9

Key:

M: Males
MFT: Male Full-time
MPT: Male Part-time
F: Females
FFT: Female Full-time
FPT: Female Part-time
FT: Full-time
PT: Part-time
SE: Self-employed

Table 15.12a: Shares of Employment by Gender and Status by Region, 2004 (%)

2004	M	F	MFT	FFT	MPT	FPT	FT	PT	SE
England	54	46	63	37	25	75	60	27	13
London	55	45	60	40	33	67	65	22	13
South East	53	47	63	37	25	75	57	28	15
East of England	53	47	63	37	24	76	57	28	15
South West	53	47	63	37	25	75	54	31	16
West Midlands	54	46	64	36	23	77	61	28	11
East Midlands	53	47	64	36	23	77	58	30	13
Yorkshire and the Humber	54	46	66	34	23	77	59	29	12
North West	53	47	63	37	25	75	61	28	11
North East	53	47	63	37	22	78	62	28	9

Key:

M: Males
MFT: Male Full-time
MPT: Male Part-time
F: Females
FFT: Female Full-time
FPT: Female Part-time
FT: Full-time
PT: Part-time
SE: Self-employed

Table 15.13: Shares of Employment by Gender and Status, LLSC Area, 2014 (%)

2014	M	F	MFT	FFT	MPT	FPT	FT	PT	% SE
England	54	46	63	37	27	73	60	29	12
London North	53	47	57	43	35	65	61	25	13
London West	58	42	62	38	38	62	65	22	13
London Central	54	46	58	42	35	65	65	23	12
London East	56	44	59	41	39	61	68	20	12
London South	54	46	60	40	33	67	60	27	14
Milton Keynes, Oxon and Bucks	54	46	62	38	28	72	62	26	12
Berkshire	54	46	62	38	26	74	63	25	12
Hampshire and Isle of Wight	53	47	63	37	27	73	55	33	13
Surrey	53	47	61	39	26	74	58	29	12
Sussex	51	49	63	37	23	77	56	32	13
Kent and Medway	53	47	62	38	27	73	56	30	14
Norfolk	54	46	67	33	25	75	53	33	14
Cambridgeshire	52	48	62	38	24	76	57	30	13
Suffolk	50	50	64	36	20	80	54	33	13
Luton and Bedfordshire	51	49	58	42	27	73	59	28	13
Hertfordshire	52	48	62	38	25	75	56	30	14
Essex	53	47	61	39	26	74	58	28	14
Devon and Cornwall	51	49	60	40	28	72	50	36	15
Somerset	55	45	67	33	27	73	53	32	14
Bournemouth, Dorset and Poole	53	47	64	36	27	73	52	34	14
West of England	54	46	64	36	25	75	56	30	15
Wiltshire	54	46	66	34	27	73	51	35	14
Gloucestershire	52	48	60	40	27	73	57	29	14
Shropshire	55	45	66	34	26	74	59	32	10
Staffordshire	53	47	66	34	26	74	56	35	9
Black Country	55	45	65	35	25	75	63	29	9
Birmingham and Solihull	52	48	61	39	24	76	62	30	8
Herefordshire & Worcestershire	53	47	65	35	21	79	59	30	10
Coventry and Warwickshire	52	48	62	38	20	80	64	27	9
Derbyshire	51	49	67	33	22	78	52	37	11
Nottinghamshire	54	46	67	33	25	75	55	33	12
Lincolnshire and Rutland	55	45	63	37	26	74	61	27	11
Leicestershire	53	47	64	36	25	75	59	29	11
Northamptonshire	52	48	62	38	23	77	61	27	11
North Yorkshire	57	43	69	31	27	73	57	32	11
West Yorkshire	55	45	64	36	28	72	62	29	10
South Yorkshire	53	47	65	35	23	77	58	33	9
Humberside	55	45	69	31	23	77	57	33	10
Cumbria	50	50	70	30	16	84	55	36	9
Lancashire	55	45	67	33	25	75	62	29	10
Greater Merseyside	55	45	61	39	35	65	65	26	9
Greater Manchester	54	46	62	38	31	69	62	28	10
Cheshire and Warrington	55	45	67	33	23	77	62	28	10
Northumberland	50	50	63	37	23	77	54	36	10
Tyne and Wear	55	45	63	37	28	72	64	27	8
County Durham	55	45	68	32	16	84	63	28	9
Tees Valley	51	49	62	38	18	82	64	28	8

Key:

M: Males
F: Females
FT: Full-time
MFT: Male Full-time
FFT: Female Full-time
PT: Part-time
MPT: Male Part-time
FPT: Female Part-time
SE: Self-employed

Table 15.13a: Shares of Employment by Gender and Status by Region, 2014 (%)

2014	M	F	MFT	FFT	MPT	FPT	FT	PT	SE
England	54	46	63	37	27	73	60	29	12
London	55	45	59	41	36	64	65	23	13
South East	53	47	62	38	26	74	58	29	13
East of England	52	48	62	38	25	75	56	30	14
South West	53	47	63	37	27	73	53	33	14
West Midlands	53	47	64	36	24	76	61	30	9
East Midlands	53	47	65	35	24	76	57	31	11
Yorkshire and the Humber	55	45	66	34	26	74	59	31	10
North West	54	46	64	36	28	72	62	29	10
North East	53	47	64	36	23	77	63	28	9

Key:

M: Males	F: Females	FT: Full-time
MFT: Male Full-time	FFT: Female Full-time	PT: Part-time
MPT: Male Part-time	FPT: Female Part-time	SE: Self-employed

Table 15.14: Total Employment, Managers & Senior Officials, by LLSC Area, 2004-2014

Managers and Senior Officials	2004 000s	2004 Occupation share %	2014 000s	2014 Occupation share %	%	2004-2014 Change %pa
England	4025	15.8	4579	17.2	13.7	1.3
London North	62	16.9	75	19.2	20.5	1.9
London West	142	18.2	168	20.3	18.5	1.7
London Central	312	19.1	362	20.7	15.9	1.5
London East	203	18.0	245	20.5	20.8	1.9
London South	101	17.3	120	19.4	19.5	1.8
Milton Keynes, Oxon and Bucks	136	18.2	162	20.1	19.3	1.8
Berkshire	95	18.6	110	20.0	16.2	1.5
Hampshire and Isle of Wight	158	17.3	180	18.7	13.8	1.3
Surrey	111	18.5	131	20.1	17.3	1.6
Sussex	125	17.4	143	18.7	13.9	1.3
Kent and Medway	126	17.2	146	18.8	16.3	1.5
Norfolk	62	16.2	69	17.4	11.6	1.1
Cambridgeshire	69	16.7	80	18.0	15.9	1.5
Suffolk	53	16.0	60	17.2	11.8	1.1
Luton and Bedfordshire	43	16.5	48	18.1	12.4	1.2
Hertfordshire	98	16.9	112	18.1	13.8	1.3
Essex	132	16.9	155	19.0	17.2	1.6
Devon and Cornwall	108	14.9	116	15.4	7.4	0.7
Somerset	34	14.7	39	16.2	13.9	1.3
Bournemouth, Dorset and Poole	51	15.5	55	16.2	8.8	0.8
West of England	92	15.2	105	16.5	13.6	1.3
Wiltshire	52	15.2	57	16.0	9.8	0.9
Gloucestershire	47	15.5	52	16.7	10.6	1.0
Shropshire	28	13.8	32	15.2	14.6	1.4
Staffordshire	65	13.5	73	14.6	12.8	1.2
Black Country	70	13.8	76	14.9	8.7	0.8
Birmingham and Solihull	92	13.9	102	14.9	10.9	1.0
Herefordshire & Worcestershire	48	14.2	54	15.4	12.2	1.2
Coventry and Warwickshire	59	14.4	68	15.7	15.3	1.4
Derbyshire	62	14.5	69	15.5	10.5	1.0
Nottinghamshire	75	15.1	83	16.4	10.8	1.0
Lincolnshire and Rutland	46	15.1	54	17.4	18.6	1.7
Leicestershire	68	15.2	75	16.5	10.4	1.0
Northamptonshire	51	15.4	58	16.9	13.2	1.3
North Yorkshire	59	15.0	70	16.6	18.2	1.7
West Yorkshire	151	14.2	171	15.4	13.1	1.2
South Yorkshire	79	13.6	86	14.5	9.1	0.9
Humberside	55	13.6	61	14.7	10.3	1.0
Cumbria	33	14.0	35	14.7	6.3	0.6
Lancashire	92	13.8	100	14.7	8.7	0.8
Greater Merseyside	83	13.8	92	15.0	11.1	1.1
Greater Manchester	183	13.9	195	14.3	6.3	0.6
Cheshire and Warrington	76	14.2	84	15.1	11.0	1.0
Northumberland	14	12.7	15	12.7	1.9	0.2
Tyne and Wear	65	12.6	73	13.8	12.6	1.2
County Durham	21	11.9	23	12.3	4.9	0.5
Tees Valley	36	12.5	39	13.3	9.6	0.9

Table 15.14a: Total Employment, Managers & Senior Officials by Region, 2004-2014

Managers and Senior Officials	2004 000s	2004 Occupation share %	2014 000s	2014 Occupation share %	2004-2014 Change %	%pa
England	4025	15.8	4579	17.2	13.7	1.3
London	820	18.2	970	20.3	18.4	1.7
South East	752	17.8	873	19.3	16.1	1.5
East of England	457	16.6	523	18.1	14.5	1.4
South West	385	15.1	425	16.1	10.4	1.0
West Midlands	362	13.9	405	15.1	12.0	1.1
East Midlands	302	15.1	339	16.5	12.2	1.2
Yorkshire and the Humber	344	14.1	388	15.3	12.6	1.2
North West	467	13.9	506	14.6	8.4	0.8
North East	136	12.5	149	13.3	9.4	0.9

15.5 Employment change by occupation

- Employment for *managers and senior officials* in *England* is projected to increase at 1.3 per cent per annum from just over 4 million (nearly 16 per cent of total employment) in 2004 to 4.58 million (just over 17 per cent of total employment) in 2014.
  - The shares of total employment in this SOC Major Group range from around 13 per cent or less in 2004 in the North East local LSC areas to over 18 per cent in London Central, Berkshire, Surrey, Milton Keynes Oxfordshire & Buckinghamshire, London West and London East. A clear regional pattern is evident with shares of total employment in this SOC Major Group tending to be greatest in London and southern-eastern England.
  - All local LSC areas are projected to experience an increase in employment in this SOC Major Group. Local LSC areas in London and south-eastern England (including London East, London North and London South) display the fastest rates of employment increase. Local LSC areas in the North East (with the exception of Tyne & Wear), Greater Manchester and Devon & Cornwall display the slowest projected rates of increase (a less than 0.8 per cent per annum).

Table 15.15: Total Employment, Professional Occupations, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Professional occupations	000s	share %	000s	share %	%	%pa
England	3002	11.8	3586	13.4	19.4	1.8
London North	55	14.9	69	17.7	26.0	2.3
London West	102	13.1	129	15.5	25.5	2.3
London Central	242	14.8	304	17.4	25.3	2.3
London East	165	14.6	209	17.4	26.7	2.4
London South	82	14.0	102	16.5	25.5	2.3
Milton Keynes, Oxon and Bucks	97	12.9	112	13.8	16.0	1.5
Berkshire	65	12.8	76	13.8	16.6	1.5
Hampshire and Isle of Wight	108	11.8	123	12.8	14.1	1.3
Surrey	73	12.1	85	13.0	16.3	1.5
Sussex	85	11.7	99	13.1	17.5	1.6
Kent and Medway	80	10.9	92	11.8	15.4	1.4
Norfolk	40	10.6	48	12.2	19.2	1.8
Cambridgeshire	52	12.7	63	14.3	21.2	1.9
Suffolk	33	9.9	39	11.1	16.1	1.5
Luton and Bedfordshire	31	12.1	35	13.2	11.6	1.1
Hertfordshire	67	11.5	81	13.1	20.8	1.9
Essex	83	10.7	99	12.1	18.5	1.7
Devon and Cornwall	79	10.9	93	12.3	18.1	1.7
Somerset	26	11.3	32	13.2	20.5	1.9
Bournemouth, Dorset and Poole	37	11.1	45	13.0	21.6	2.0
West of England	74	12.2	89	14.0	19.8	1.8
Wiltshire	36	10.5	43	12.0	19.4	1.8
Gloucestershire	35	11.5	40	12.8	14.0	1.3
Shropshire	21	10.2	25	11.6	18.8	1.7
Staffordshire	50	10.3	61	12.2	22.9	2.1
Black Country	50	9.9	57	11.3	15.1	1.4
Birmingham and Solihull	79	12.0	92	13.5	16.2	1.5
Herefordshire & Worcestershire	32	9.6	39	11.1	19.5	1.8
Coventry and Warwickshire	45	10.9	53	12.3	19.6	1.8
Derbyshire	47	11.0	58	13.1	22.9	2.1
Nottinghamshire	57	11.4	67	13.2	17.7	1.6
Lincolnshire and Rutland	31	10.3	38	12.3	22.1	2.0
Leicestershire	47	10.5	54	11.8	14.6	1.4
Northamptonshire	34	10.2	40	11.8	19.3	1.8
North Yorkshire	38	9.8	47	11.1	21.3	1.9
West Yorkshire	111	10.5	132	11.9	18.5	1.7
South Yorkshire	62	10.7	70	11.8	13.6	1.3
Humberside	41	10.0	48	11.6	18.3	1.7
Cumbria	23	9.9	27	11.3	16.9	1.6
Lancashire	78	11.7	93	13.7	18.9	1.7
Greater Merseyside	77	12.7	91	14.8	19.1	1.8
Greater Manchester	156	11.8	183	13.4	17.6	1.6
Cheshire and Warrington	58	10.9	69	12.4	19.0	1.8
Northumberland	12	10.5	14	11.9	14.7	1.4
Tyne and Wear	57	11.1	65	12.2	13.4	1.3
County Durham	19	10.7	23	12.4	17.0	1.6
Tees Valley	30	10.5	35	11.7	14.8	1.4

Table 15.15a: Total Employment, Professional Occupations by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Professional occupations	000s	share %	000s	share %	%	%pa
England	3002	11.8	3586	13.4	19.4	1.8
London	646	14.4	812	17.0	25.8	2.3
South East	507	12.0	587	13.0	15.8	1.5
East of England	308	11.2	365	12.6	18.6	1.7
South West	287	11.3	342	12.9	18.9	1.7
West Midlands	277	10.6	327	12.2	18.4	1.7
East Midlands	216	10.8	257	12.5	19.1	1.8
Yorkshire and the Humber	252	10.3	297	11.7	17.7	1.6
North West	392	11.7	464	13.4	18.3	1.7
North East	118	10.8	135	12.1	14.5	1.4

- Employment in *professional occupations* in *England* is projected to increase at 1.8 per cent per annum from 3 million (nearly 12 per cent of total employment) in 2004 to 3.6 million (13.4 per cent of total employment) in 2014.
- ➢ The shares of total employment in this SOC Major Group in 2004 range from less than 10 per cent in various rural and more peripheral local LSC areas (such as Herefordshire & Worcestershire, North Yorkshire, Cumbria and Suffolk, plus the Black Country) to 13-15 per cent in London. The five London local LSC areas head the rankings on the share of total employment accounted for by this SOC Major Group, followed by Milton Keynes Oxfordshire & Buckinghamshire, Berkshire, Greater Merseyside and Cambridgeshire.
- ➢ All local LSC areas are projected to experience an increase in employment in this SOC Major Group. As in the case of managers and senior officials, local LSC areas in London and south-eastern England display the fastest projected rates of employment increase – indicating a general widening of the 'gap' in the uneven regional and local distribution of high level occupations. Luton & Bedfordshire, Tyne & Wear and South Yorkshire display amongst the slowest projected rates of increase.

Table 15.16: Total Employment, Associate Professional & Technical Occupations, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Associate Professional and Technical	000s	share %	000s	share %	%	%pa
England	3685	14.4	4097	15.3	11.2	1.1
London North	64	17.5	77	19.8	19.9	1.8
London West	141	18.1	168	20.3	19.3	1.8
London Central	330	20.2	396	22.6	20.0	1.8
London East	206	18.3	249	20.8	21.0	1.9
London South	104	17.9	125	20.2	19.9	1.8
Milton Keynes, Oxon and Bucks	115	15.3	129	15.9	12.4	1.2
Berkshire	78	15.4	87	15.8	11.1	1.1
Hampshire and Isle of Wight	134	14.7	143	14.9	6.9	0.7
Surrey	91	15.2	101	15.5	10.3	1.0
Sussex	110	15.2	119	15.6	8.5	0.8
Kent and Medway	104	14.3	115	14.8	10.0	1.0
Norfolk	52	13.7	56	14.2	7.7	0.7
Cambridgeshire	60	14.4	67	15.1	12.1	1.1
Suffolk	45	13.4	48	13.9	7.3	0.7
Luton and Bedfordshire	37	14.1	39	14.7	6.7	0.7
Hertfordshire	81	13.9	91	14.8	13.1	1.2
Essex	105	13.5	117	14.3	10.5	1.0
Devon and Cornwall	93	12.8	101	13.4	8.6	0.8
Somerset	30	13.0	32	13.5	7.0	0.7
Bournemouth, Dorset and Poole	43	13.2	47	13.7	8.8	0.8
West of England	84	13.9	91	14.3	8.1	0.8
Wiltshire	43	12.5	46	12.7	6.0	0.6
Gloucestershire	40	13.2	44	13.9	8.3	0.8
Shropshire	27	13.0	30	13.8	11.7	1.1
Staffordshire	61	12.6	69	13.8	13.5	1.3
Black Country	64	12.6	70	13.7	9.2	0.9
Birmingham and Solihull	94	14.2	102	15.0	8.9	0.9
Herefordshire & Worcestershire	43	12.6	48	13.7	12.7	1.2
Coventry and Warwickshire	53	12.9	61	14.1	15.4	1.4
Derbyshire	52	12.2	57	12.9	9.0	0.9
Nottinghamshire	65	13.1	69	13.7	7.0	0.7
Lincolnshire and Rutland	37	12.1	41	13.2	12.1	1.1
Leicestershire	56	12.6	61	13.4	8.4	0.8
Northamptonshire	41	12.4	46	13.4	11.3	1.1
North Yorkshire	46	11.7	50	12.0	8.7	0.8
West Yorkshire	137	12.9	148	13.3	7.8	0.8
South Yorkshire	72	12.5	75	12.7	3.9	0.4
Humberside	49	11.9	51	12.3	5.9	0.6
Cumbria	29	12.2	29	12.3	2.9	0.3
Lancashire	89	13.3	94	13.8	5.7	0.6
Greater Merseyside	89	14.7	95	15.4	7.2	0.7
Greater Manchester	178	13.5	186	13.7	4.8	0.5
Cheshire and Warrington	68	12.7	73	13.0	6.4	0.6
Northumberland	14	12.8	15	13.4	6.1	0.6
Tyne and Wear	70	13.6	73	13.9	4.3	0.4
County Durham	22	12.3	23	12.8	6.5	0.6
Tees Valley	37	13.0	39	13.3	5.5	0.5

Table 15.16a: Total Employment, Associate Professional & Technical Occupations by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Associate Professional and Technical	000s	share %	000s	share %	%	%pa
England	3685	14.4	4097	15.3	11.2	1.1
London	846	18.8	1017	21.2	20.1	1.8
South East	632	15.0	694	15.4	9.7	0.9
East of England	379	13.8	418	14.5	10.2	1.0
South West	334	13.1	361	13.6	8.0	0.8
West Midlands	341	13.1	380	14.1	11.5	1.1
East Midlands	252	12.5	275	13.4	9.2	0.9
Yorkshire and the Humber	304	12.5	325	12.8	6.7	0.6
North West	452	13.5	477	13.8	5.6	0.5
North East	144	13.2	151	13.5	5.1	0.5

- Employment for *associate professional and technical occupations* in *England* is projected to increase at 1.1 per cent per annum from 3.69 million (14.4 per cent of total employment) in 2004 to 4.1 million (over 15 per cent of total employment) in 2014.
  - The shares of total employment in this SOC Major Group in 2004 range from less than 12 per cent in 2004 in North Yorkshire and Humberside, with rural areas such as Cumbria and Lincolnshire & Rutland also displaying low proportions, to between 17 and 20 per cent in the London local LSC areas. Hence, there are key similarities here with the local and regional distribution of employment in professional occupations.
  - All local LSC areas are projected to experience an increase in employment in this SOC Major Group. Local LSC areas in London, display the fastest projected rates of employment increase, followed by Coventry & Warwickshire, Staffordshire and Hertfordshire. Five local LSC areas in northern England – Cumbria, South Yorkshire, Tyne & Wear, Greater Manchester and Tees Valley - record the slowest projected growth annual growth rates of 0.5 per cent or less.

Table 15.17: Total Employment, Administrative, Clerical & Secretarial Occupations, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Administrative and Secretarial	000s	share %	000s	share %	%	%pa
England	3207	12.6	2894	10.8	-9.7	-1.0
London North	40	10.9	29	7.4	-28.1	-3.2
London West	88	11.2	66	8.0	-24.8	-2.8
London Central	203	12.4	142	8.1	-30.0	-3.5
London East	181	16.0	137	11.5	-24.2	-2.7
London South	69	11.8	51	8.2	-26.4	-3.0
Milton Keynes, Oxon and Bucks	96	12.9	85	10.6	-11.5	-1.2
Berkshire	69	13.5	62	11.2	-10.4	-1.1
Hampshire and Isle of Wight	117	12.8	103	10.7	-12.0	-1.3
Surrey	82	13.6	75	11.5	-8.3	-0.9
Sussex	94	13.0	82	10.7	-13.1	-1.4
Kent and Medway	89	12.2	78	10.0	-12.6	-1.3
Norfolk	46	12.2	41	10.5	-10.4	-1.1
Cambridgeshire	51	12.4	48	10.9	-5.2	-0.5
Suffolk	43	12.9	42	12.0	-3.5	-0.4
Luton and Bedfordshire	33	12.7	31	11.7	-6.0	-0.6
Hertfordshire	76	13.1	69	11.2	-9.2	-1.0
Essex	102	13.0	91	11.2	-10.5	-1.1
Devon and Cornwall	81	11.1	72	9.6	-10.5	-1.1
Somerset	26	11.3	22	9.3	-14.8	-1.6
Bournemouth, Dorset and Poole	40	12.2	35	10.1	-13.4	-1.4
West of England	78	12.9	69	10.9	-11.2	-1.2
Wiltshire	41	11.9	36	10.1	-11.6	-1.2
Gloucestershire	36	11.8	32	10.2	-11.7	-1.2
Shropshire	24	11.7	24	11.3	0.6	0.1
Staffordshire	58	12.1	58	11.6	-0.2	0.0
Black Country	61	12.1	61	11.9	-0.7	-0.1
Birmingham and Solihull	91	13.8	93	13.6	1.7	0.2
Herefordshire & Worcestershire	40	11.8	38	10.9	-4.4	-0.4
Coventry and Warwickshire	52	12.6	53	12.3	2.9	0.3
Derbyshire	47	10.8	43	9.6	-8.5	-0.9
Nottinghamshire	57	11.6	50	9.9	-12.6	-1.3
Lincolnshire and Rutland	31	10.3	27	8.7	-12.6	-1.3
Leicestershire	54	12.1	50	11.1	-6.8	-0.7
Northamptonshire	41	12.4	40	11.7	-2.4	-0.2
North Yorkshire	46	11.6	47	11.3	3.5	0.3
West Yorkshire	140	13.1	140	12.6	0.4	0.0
South Yorkshire	69	12.0	70	11.8	0.7	0.1
Humberside	47	11.5	47	11.2	-0.9	-0.1
Cumbria	27	11.5	26	10.8	-4.0	-0.4
Lancashire	79	11.8	74	10.9	-5.5	-0.6
Greater Merseyside	79	13.2	72	11.8	-8.8	-0.9
Greater Manchester	179	13.6	183	13.4	2.0	0.2
Cheshire and Warrington	71	13.3	73	13.0	2.2	0.2
Northumberland	12	10.9	11	10.0	-7.0	-0.7
Tyne and Wear	67	12.9	64	12.1	-3.5	-0.4
County Durham	19	10.3	17	9.3	-7.8	-0.8
Tees Valley	33	11.6	32	11.0	-2.9	-0.3

Table 15.17a: Total Employment, Administrative, Clerical & Secretarial Occupations by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Administrative and Secretarial	000s	share %	000s	share %	%	%pa
England	3207	12.6	2894	10.8	-9.7	-1.0
London	581	12.9	425	8.9	-26.8	-3.1
South East	548	13.0	485	10.7	-11.4	-1.2
East of England	351	12.8	323	11.2	-8.2	-0.8
South West	302	11.9	267	10.1	-11.7	-1.2
West Midlands	326	12.6	327	12.2	0.3	0.0
East Midlands	230	11.5	210	10.2	-8.6	-0.9
Yorkshire and the Humber	302	12.4	305	12.0	0.7	0.1
North West	436	13.0	428	12.4	-1.7	-0.2
North East	131	11.9	125	11.2	-4.3	-0.4

- Employment in *administrative, clerical and secretarial occupations* in *England* is projected to decrease at 1 per cent per annum from 3.21 million (12.6 per cent of total employment) in 2004 to 2.89 million (just under 11 per cent of total employment) in 2014.

➢ London East records easily the highest share of total employment (16 per cent) in this SOC Major Group in 2004, with Birmingham & Solihull, Greater Manchester, Surrey and Berkshire occupying the next positions in the rankings on this indicator. ‘Rural’ and ‘peripheral’ areas – including Lincolnshire & Rutland, County Durham, Northumberland and Devon & Cornwall - record some of the smallest shares of total employment in this SOC Major Group (around 11 per cent), along with Derbyshire and London North.

➢ A clear regional dimension is evident in the pattern of projected employment change, with local LSC areas in London recording the greatest rates of employment loss (2.7-3.5 per cent per annum). Other local areas in the South East and South West display faster than average rates of employment decline. By contrast, seven local LSC areas (from the midlands and northern England) are projected to see employment growth, with North Yorkshire, Coventry & Warwickshire, Cheshire & Warrington, Greater Manchester and Birmingham & Solihull displaying projected gains of 0.2-0.3 per cent per annum. This is indicative of a decentralisation of such employment away from London and south-eastern England.

Table 15.18: Total Employment, Skilled Trades Occupations, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Skilled Trades Occupations	000s	share %	000s	share %	%	%pa
England	2882	11.3	2767	10.4	-4.0	-0.4
London North	36	9.9	35	8.9	-3.8	-0.4
London West	80	10.2	76	9.2	-4.2	-0.4
London Central	119	7.3	113	6.5	-4.9	-0.5
London East	94	8.3	89	7.4	-5.2	-0.5
London South	60	10.3	59	9.5	-2.1	-0.2
Milton Keynes, Oxon and Bucks	74	9.8	76	9.4	2.9	0.3
Berkshire	52	10.1	52	9.4	0.2	0.0
Hampshire and Isle of Wight	102	11.2	103	10.7	0.9	0.1
Surrey	61	10.1	62	9.5	1.7	0.2
Sussex	73	10.2	73	9.6	-0.2	0.0
Kent and Medway	89	12.2	92	11.9	4.0	0.4
Norfolk	47	12.3	47	11.9	0.5	0.1
Cambridgeshire	45	10.9	44	10.0	-1.3	-0.1
Suffolk	39	11.7	37	10.5	-6.8	-0.7
Luton and Bedfordshire	29	11.3	28	10.4	-5.6	-0.6
Hertfordshire	67	11.5	65	10.5	-2.7	-0.3
Essex	96	12.3	93	11.5	-2.6	-0.3
Devon and Cornwall	95	13.2	96	12.7	0.7	0.1
Somerset	31	13.2	30	12.5	-2.1	-0.2
Bournemouth, Dorset and Poole	41	12.4	41	12.0	1.3	0.1
West of England	74	12.2	74	11.6	-0.6	-0.1
Wiltshire	43	12.5	43	12.1	0.9	0.1
Gloucestershire	39	12.9	39	12.3	-1.9	-0.2
Shropshire	28	13.6	27	12.4	-4.3	-0.4
Staffordshire	65	13.5	60	11.9	-7.5	-0.8
Black Country	74	14.7	66	13.0	-10.6	-1.1
Birmingham and Solihull	76	11.4	68	9.9	-10.6	-1.1
Herefordshire & Worcestershire	48	14.2	47	13.3	-3.3	-0.3
Coventry and Warwickshire	53	12.9	48	11.1	-9.1	-0.9
Derbyshire	53	12.3	47	10.7	-10.7	-1.1
Nottinghamshire	57	11.4	51	10.2	-9.1	-0.9
Lincolnshire and Rutland	41	13.6	38	12.2	-7.7	-0.8
Leicestershire	53	11.9	47	10.3	-11.7	-1.2
Northamptonshire	39	11.7	34	9.8	-13.1	-1.4
North Yorkshire	49	12.4	49	11.7	0.6	0.1
West Yorkshire	123	11.5	117	10.5	-5.1	-0.5
South Yorkshire	75	13.0	70	11.8	-6.6	-0.7
Humberside	54	13.2	50	12.1	-6.7	-0.7
Cumbria	29	12.3	27	11.2	-7.4	-0.8
Lancashire	83	12.4	80	11.7	-3.8	-0.4
Greater Merseyside	57	9.4	55	8.9	-3.0	-0.3
Greater Manchester	141	10.7	131	9.6	-7.3	-0.8
Cheshire and Warrington	65	12.1	62	11.2	-4.2	-0.4
Northumberland	14	12.7	13	11.3	-9.3	-1.0
Tyne and Wear	57	11.2	55	10.5	-3.8	-0.4
County Durham	26	14.7	25	13.5	-6.5	-0.7
Tees Valley	36	12.4	33	11.2	-7.0	-0.7

Table 15.18a: Total Employment, Skilled Trades Occupations by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Skilled Trades Occupations	000s	share %	000s	share %	%	%pa
England	2882	11.3	2767	10.4	-4.0	-0.4
London	389	8.7	372	7.8	-4.3	-0.4
South East	451	10.7	459	10.2	1.7	0.2
East of England	323	11.7	314	10.9	-2.8	-0.3
South West	323	12.7	323	12.2	-0.1	0.0
West Midlands	343	13.2	315	11.7	-8.2	-0.9
East Midlands	243	12.1	217	10.6	-10.4	-1.1
Yorkshire and the Humber	301	12.3	286	11.3	-4.8	-0.5
North West	375	11.2	355	10.3	-5.4	-0.5
North East	134	12.2	126	11.2	-5.8	-0.6

- Employment in *skilled trades occupations* in *England* is projected to decline at 0.4 per cent per annum from 2.88 million (over 11 per cent of total employment) in 2004 to 2.77 million (over 10 per cent of total employment) in 2014.
  - ➢ The shares of total employment in this SOC Major Group range from 10 per cent or less in 2004 in London Central, London East, Greater Merseyside, Milton Keynes Oxfordshire & Buckinghamshire to over 14 per cent in County Durham, the Black Country and Herefordshire & Worcestershire.
  - ➢ Nine local LSC areas are projected to experience an increase in employment in this SOC Major Group over the period to 2014, with Kent & Medway, Milton Keynes Oxfordshire & Buckinghamshire and Surrey displaying rates of increase of at least 2 per cent per annum. Other increases are confined to local LSC areas in the South East and the South West, along with North Yorkshire. Local LSCs from the East Midlands (notably Northamptonshire, Leicestershire and Derbyshire) and the West Midlands (Birmingham & Solihull, the Black Country and Coventry & Warwickshire) record the fastest rates of employment loss.

Table 15.19: Total Employment, Personal Service Occupations, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Personal Service Occupations	000s	share %	000s	share %	%	%pa
England	1900	7.4	2274	8.5	19.7	1.8
London North	24	6.6	26	6.6	6.1	0.6
London West	46	5.9	49	6.0	6.4	0.6
London Central	99	6.1	109	6.2	9.9	0.9
London East	60	5.3	64	5.3	6.7	0.6
London South	37	6.4	42	6.7	12.1	1.1
Milton Keynes, Oxon and Bucks	52	7.0	63	7.8	21.6	2.0
Berkshire	33	6.4	41	7.5	25.5	2.3
Hampshire and Isle of Wight	68	7.4	86	8.9	26.9	2.4
Surrey	44	7.3	55	8.5	26.1	2.4
Sussex	57	7.9	71	9.3	23.6	2.1
Kent and Medway	54	7.4	66	8.5	21.9	2.0
Norfolk	29	7.6	35	9.0	21.8	2.0
Cambridgeshire	30	7.4	38	8.7	26.1	2.3
Suffolk	25	7.4	31	9.0	25.8	2.3
Luton and Bedfordshire	18	7.1	21	8.1	16.3	1.5
Hertfordshire	39	6.8	48	7.8	22.6	2.1
Essex	54	6.9	65	8.0	20.5	1.9
Devon and Cornwall	63	8.6	78	10.4	25.0	2.3
Somerset	19	8.0	22	9.1	17.4	1.6
Bournemouth, Dorset and Poole	27	8.2	32	9.3	18.8	1.7
West of England	47	7.7	57	8.9	20.1	1.8
Wiltshire	27	7.8	34	9.5	26.6	2.4
Gloucestershire	24	7.9	29	9.1	17.4	1.6
Shropshire	17	8.3	21	10.0	26.3	2.4
Staffordshire	38	8.0	48	9.5	24.1	2.2
Black Country	37	7.3	46	9.0	24.5	2.2
Birmingham and Solihull	55	8.3	68	9.9	23.9	2.2
Herefordshire & Worcestershire	28	8.4	36	10.3	26.8	2.4
Coventry and Warwickshire	32	7.8	41	9.5	28.0	2.5
Derbyshire	39	9.0	49	11.1	28.0	2.5
Nottinghamshire	45	9.0	53	10.6	19.6	1.8
Lincolnshire and Rutland	26	8.5	31	10.1	21.3	2.0
Leicestershire	34	7.7	41	9.0	19.7	1.8
Northamptonshire	26	7.8	32	9.3	22.5	2.0
North Yorkshire	31	7.9	38	9.1	23.8	2.2
West Yorkshire	82	7.7	98	8.8	19.8	1.8
South Yorkshire	47	8.2	59	9.9	24.3	2.2
Humberside	32	7.7	35	8.5	12.5	1.2
Cumbria	19	8.1	25	10.3	28.9	2.6
Lancashire	54	8.1	67	9.8	23.7	2.1
Greater Merseyside	54	9.0	59	9.6	10.1	1.0
Greater Manchester	102	7.8	121	8.8	17.8	1.7
Cheshire and Warrington	40	7.4	49	8.8	24.3	2.2
Northumberland	10	8.5	10	9.1	9.2	0.9
Tyne and Wear	41	7.9	43	8.1	5.4	0.5
County Durham	13	7.1	14	7.8	12.5	1.2
Tees Valley	23	8.1	26	8.9	13.3	1.3

Table 15.19a: Total Employment, Personal Service Occupations by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Personal Service Occupations	000s	share %	000s	share %	%	%pa
England	1900	7.4	2274	8.5	19.7	1.8
London	267	5.9	290	6.1	8.5	0.8
South East	308	7.3	382	8.5	24.3	2.2
East of England	196	7.1	240	8.3	22.3	2.0
South West	206	8.1	251	9.5	21.7	2.0
West Midlands	207	8.0	260	9.7	25.3	2.3
East Midlands	169	8.4	207	10.1	22.2	2.0
Yorkshire and the Humber	192	7.8	231	9.1	20.4	1.9
North West	269	8.0	320	9.3	19.2	1.8
North East	86	7.9	94	8.4	9.0	0.9

- Employment in *personal service occupations* in *England* is projected to increase at 1.8 per cent per annum from 1.9 million (7.4 per cent of total employment) in 2004 to 2.27 million (8.5 per cent of total employment) in 2014.
- ➢ The shares of total employment in this SOC Major Group in 2004 are lowest in London and surrounding local LSC areas and are greatest in parts of the midlands, northern England and the far South West (such as Nottinghamshire, Derbyshire, Greater Merseyside, Devon & Cornwall and Northumberland).
- ➢ All local LSC areas are projected to experience an increase in employment in this SOC Major Group. Local LSC areas in London and the North East display some of the slowest rates of employment increase (Tyne & Wear, Northumberland and four out of the five London local LSC areas record growth rates of less than 1 per cent per annum), while Cumbria, Coventry & Warwickshire and Derbyshire display the fastest rates of projected employment growth (at 2.5-2.6 per cent per annum).

Table 15.20: Total Employment, Sales & Customer Service Occupations, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Sales and Customer Service Occupations	000s	share %	000s	share %	%	%pa
England	2040	8.0	2372	8.9	16.2	1.5
London North	29	7.7	31	8.0	9.8	0.9
London West	54	6.9	63	7.6	16.5	1.5
London Central	93	5.7	115	6.5	23.7	2.2
London East	70	6.2	76	6.3	9.2	0.9
London South	44	7.6	49	7.9	11.3	1.1
Milton Keynes, Oxon and Bucks	58	7.7	70	8.7	21.6	2.0
Berkshire	38	7.4	46	8.4	23.2	2.1
Hampshire and Isle of Wight	72	7.9	84	8.8	16.8	1.6
Surrey	45	7.5	55	8.5	21.8	2.0
Sussex	57	7.9	68	8.9	19.1	1.8
Kent and Medway	59	8.1	69	8.9	16.7	1.6
Norfolk	30	8.0	35	8.8	14.1	1.3
Cambridgeshire	30	7.2	34	7.8	16.2	1.5
Suffolk	27	8.1	32	9.1	16.0	1.5
Luton and Bedfordshire	20	7.8	22	8.4	10.4	1.0
Hertfordshire	50	8.6	60	9.7	19.9	1.8
Essex	65	8.4	70	8.6	7.1	0.7
Devon and Cornwall	65	9.0	76	10.0	16.0	1.5
Somerset	22	9.4	26	10.7	17.1	1.6
Bournemouth, Dorset and Poole	31	9.5	37	10.7	17.6	1.6
West of England	52	8.5	60	9.5	16.2	1.5
Wiltshire	31	9.0	38	10.5	22.3	2.0
Gloucestershire	25	8.2	29	9.3	16.6	1.5
Shropshire	16	8.0	18	8.6	12.8	1.2
Staffordshire	40	8.4	46	9.3	15.7	1.5
Black Country	40	7.8	43	8.5	8.7	0.8
Birmingham and Solihull	46	7.0	52	7.7	13.8	1.3
Herefordshire & Worcestershire	26	7.7	28	8.0	7.6	0.7
Coventry and Warwickshire	32	7.8	37	8.5	15.1	1.4
Derbyshire	34	8.0	41	9.2	18.9	1.7
Nottinghamshire	42	8.5	50	9.9	18.5	1.7
Lincolnshire and Rutland	25	8.3	27	8.8	8.6	0.8
Leicestershire	38	8.6	48	10.5	24.7	2.2
Northamptonshire	27	8.1	32	9.3	19.0	1.8
North Yorkshire	35	8.9	40	9.4	12.7	1.2
West Yorkshire	95	8.9	111	10.0	17.2	1.6
South Yorkshire	50	8.7	58	9.9	16.7	1.6
Humberside	37	9.0	43	10.3	16.2	1.5
Cumbria	24	10.0	28	11.7	18.7	1.7
Lancashire	53	8.0	58	8.5	8.3	0.8
Greater Merseyside	50	8.3	51	8.3	2.7	0.3
Greater Manchester	114	8.7	137	10.1	20.3	1.9
Cheshire and Warrington	47	8.8	55	9.8	16.6	1.5
Northumberland	11	9.4	13	11.6	25.8	2.3
Tyne and Wear	49	9.5	58	11.0	18.5	1.7
County Durham	16	8.7	19	10.4	21.2	1.9
Tees Valley	27	9.4	32	11.0	20.1	1.9

Table 15.20a: Total Employment, Sales & Customer Service Occupations by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Sales and Customer Service Occupations	000s	share %	000s	share %	%	%pa
England	2040	8.0	2372	8.9	16.2	1.5
London	289	6.4	334	7.0	15.6	1.5
South East	329	7.8	393	8.7	19.4	1.8
East of England	223	8.1	253	8.8	13.5	1.3
South West	226	8.9	265	10.0	17.3	1.6
West Midlands	200	7.7	225	8.4	12.5	1.2
East Midlands	167	8.3	198	9.6	18.6	1.7
Yorkshire and the Humber	217	8.9	252	9.9	16.2	1.5
North West	288	8.6	329	9.5	14.3	1.3
North East	102	9.4	123	11.0	20.1	1.8

- Employment in *sales and customer service occupations* in *England* is projected to increase at 1.5 per cent per annum from 2.04 million (8 per cent of total employment) in 2004 to 2.37 million (nearly 9 per cent of total employment) in 2014.
  - The shares of total employment in this SOC Major Group in 2004 range from around 6 per cent or less in London Central and London East to between 9 and 10 per cent in Cumbria, Tyne & Wear, Bournemouth Dorset & Poole, Tees Valley, Northumberland and Somerset.
  - All local LSC areas are projected to experience an increase in employment in this SOC Major Group. There is no clear cut pattern of regional variation in rates of projected employment increase. Across England projected rates of annual change range from 0.3 in Greater Merseyside to 2.2-2.3 per cent in Northumberland, Leicestershire and London Central.

Table 15.21: Total Employment, Machine & Transport Operatives, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Machine and Transport Operatives	000s	share %	000s	share %	%	%pa
England	1968	7.7	1868	7.0	-5.1	-0.5
London North	20	5.3	18	4.7	-6.6	-0.7
London West	46	5.9	44	5.3	-4.4	-0.4
London Central	70	4.3	64	3.7	-7.9	-0.8
London East	51	4.5	48	4.0	-4.6	-0.5
London South	28	4.8	26	4.3	-5.4	-0.6
Milton Keynes, Oxon and Bucks	46	6.2	46	5.7	-0.5	0.0
Berkshire	30	6.0	30	5.5	0.0	0.0
Hampshire and Isle of Wight	56	6.2	56	5.8	-0.6	-0.1
Surrey	33	5.5	33	5.1	0.7	0.1
Sussex	44	6.1	42	5.5	-3.7	-0.4
Kent and Medway	48	6.6	48	6.2	-0.3	0.0
Norfolk	30	7.9	29	7.3	-4.4	-0.4
Cambridgeshire	29	7.1	27	6.2	-5.5	-0.6
Suffolk	28	8.5	27	7.7	-6.5	-0.7
Luton and Bedfordshire	20	7.7	19	7.1	-5.3	-0.5
Hertfordshire	41	7.0	39	6.4	-3.8	-0.4
Essex	57	7.3	55	6.7	-4.1	-0.4
Devon and Cornwall	51	7.1	48	6.3	-7.4	-0.8
Somerset	19	8.3	18	7.3	-8.2	-0.8
Bournemouth, Dorset and Poole	22	6.8	22	6.3	-3.9	-0.4
West of England	43	7.0	40	6.3	-6.5	-0.7
Wiltshire	28	8.0	26	7.3	-5.0	-0.5
Gloucestershire	24	7.7	22	6.9	-9.0	-0.9
Shropshire	20	10.0	19	9.0	-5.2	-0.5
Staffordshire	49	10.2	45	9.0	-8.2	-0.9
Black Country	57	11.4	51	10.0	-11.0	-1.2
Birmingham and Solihull	62	9.4	57	8.4	-8.2	-0.9
Herefordshire & Worcestershire	33	9.6	30	8.6	-6.8	-0.7
Coventry and Warwickshire	40	9.7	36	8.4	-9.0	-0.9
Derbyshire	43	10.1	40	9.1	-6.9	-0.7
Nottinghamshire	43	8.8	41	8.1	-5.3	-0.5
Lincolnshire and Rutland	30	9.9	29	9.2	-5.3	-0.5
Leicestershire	46	10.3	41	9.1	-10.2	-1.1
Northamptonshire	36	10.8	33	9.6	-7.7	-0.8
North Yorkshire	38	9.6	38	9.1	0.5	0.1
West Yorkshire	106	10.0	105	9.4	-1.3	-0.1
South Yorkshire	56	9.7	52	8.8	-6.9	-0.7
Humberside	43	10.5	41	9.8	-5.3	-0.5
Cumbria	22	9.4	20	8.4	-9.1	-1.0
Lancashire	62	9.2	57	8.3	-7.9	-0.8
Greater Merseyside	46	7.6	47	7.5	1.2	0.1
Greater Manchester	117	8.9	110	8.0	-6.5	-0.7
Cheshire and Warrington	49	9.2	46	8.3	-6.6	-0.7
Northumberland	10	8.6	9	7.9	-6.3	-0.6
Tyne and Wear	47	9.1	48	9.0	1.7	0.2
County Durham	19	10.8	18	10.0	-5.9	-0.6
Tees Valley	28	9.8	27	9.2	-3.7	-0.4

Table 15.21a: Total Employment, Machine & Transport Operatives by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Machine and Transport Operatives	000s	share %	000s	share %	%	%pa
England	1968	7.7	1868	7.0	-5.1	-0.5
London	214	4.8	201	4.2	-5.9	-0.6
South East	258	6.1	256	5.7	-0.8	-0.1
East of England	205	7.5	195	6.8	-4.7	-0.5
South West	187	7.3	174	6.6	-6.7	-0.7
West Midlands	261	10.1	239	8.9	-8.5	-0.9
East Midlands	199	9.9	185	9.0	-7.2	-0.7
Yorkshire and the Humber	243	9.9	236	9.3	-3.0	-0.3
North West	296	8.8	279	8.1	-5.8	-0.6
North East	104	9.5	102	9.1	-1.9	-0.2

- Employment for *machine operatives and transport* in *England* is projected to decline at an annual average rate of 0.5 per cent from 1.97 million (7.7 per cent of total employment) in 2004 to 1.87 million (7 per cent of total employment) in 2014.
  - ➢ The shares of total employment in this SOC Major Group range from 4-6 per cent in 2004 in the London local LSC areas, Surrey, Berkshire and Sussex to 10-11 per cent in parts of the West Midlands (the Black Country, Staffordshire and Shropshire), the East Midlands (Northamptonshire, Leicestershire and Derbyshire), Yorkshire & the Humber (Humberside and West Yorkshire) and County Durham. This is indicative of a broader regional pattern of under-representation of such employment relative to the England average in much of southern and eastern England and over-representation throughout much of the midlands, Yorkshire & the Humber and the North East.
  - ➢ In four local LSC areas (Tyne & Wear, Greater Merseyside, Surrey and North Yorkshire) a modest increase (0.1-0.2 per cent per annum) increase in employment is projected over the period to 2014, and in a further three local LSC areas (Berkshire, Kent & Medway and Milton Keynes Oxfordshire & Buckinghamshire) 2004 employment levels are projected to be maintained. Elsewhere, employment losses are projected, with local LSC areas in the West Midlands and the South West, along with Leicestershire and Cumbria expected to losses at a rate of 0.9-1.2 per cent per annum.

Table 15.22: Total Employment, Elementary Occupations, by LLSC Area, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Elementary Occupations	000s	share %	000s	share %	%	%pa
England	2808	11.0	2257	8.5	-19.6	-2.2
London North	38	10.3	30	7.7	-21.2	-2.3
London West	82	10.5	64	7.7	-22.1	-2.5
London Central	167	10.2	145	8.3	-13.2	-1.4
London East	100	8.9	80	6.6	-20.8	-2.3
London South	57	9.8	45	7.3	-21.5	-2.4
Milton Keynes, Oxon and Bucks	76	10.1	66	8.1	-13.3	-1.4
Berkshire	50	9.8	46	8.3	-8.5	-0.9
Hampshire and Isle of Wight	97	10.6	84	8.7	-13.8	-1.5
Surrey	62	10.3	54	8.4	-12.1	-1.3
Sussex	76	10.6	65	8.5	-14.5	-1.6
Kent and Medway	81	11.1	70	9.1	-12.8	-1.4
Norfolk	44	11.5	34	8.7	-21.6	-2.4
Cambridgeshire	47	11.3	39	8.9	-15.3	-1.7
Suffolk	40	12.0	33	9.6	-17.0	-1.9
Luton and Bedfordshire	28	10.7	23	8.5	-19.3	-2.1
Hertfordshire	62	10.7	53	8.5	-15.4	-1.7
Essex	87	11.1	71	8.8	-18.0	-2.0
Devon and Cornwall	90	12.4	74	9.8	-17.6	-1.9
Somerset	26	11.0	20	8.2	-22.7	-2.5
Bournemouth, Dorset and Poole	37	11.3	30	8.8	-18.8	-2.1
West of England	63	10.4	52	8.1	-18.4	-2.0
Wiltshire	43	12.5	35	9.8	-18.0	-2.0
Gloucestershire	35	11.4	28	8.8	-20.9	-2.3
Shropshire	23	11.5	17	8.0	-26.6	-3.0
Staffordshire	55	11.4	41	8.1	-25.7	-2.9
Black Country	53	10.4	39	7.6	-26.1	-3.0
Birmingham and Solihull	66	10.0	49	7.2	-25.7	-2.9
Herefordshire & Worcestershire	40	11.8	31	8.7	-23.7	-2.7
Coventry and Warwickshire	45	11.0	35	8.0	-23.0	-2.6
Derbyshire	52	12.0	38	8.6	-26.0	-3.0
Nottinghamshire	54	11.0	40	8.0	-25.4	-2.9
Lincolnshire and Rutland	36	11.9	25	8.0	-30.7	-3.6
Leicestershire	49	11.0	37	8.2	-24.3	-2.7
Northamptonshire	37	11.1	28	8.3	-23.1	-2.6
North Yorkshire	51	13.0	40	9.6	-21.8	-2.4
West Yorkshire	119	11.2	90	8.1	-24.4	-2.8
South Yorkshire	67	11.7	52	8.8	-22.6	-2.5
Humberside	51	12.5	39	9.5	-22.9	-2.6
Cumbria	30	12.6	22	9.3	-25.1	-2.8
Lancashire	77	11.6	59	8.6	-24.2	-2.7
Greater Merseyside	67	11.2	53	8.6	-21.5	-2.4
Greater Manchester	148	11.2	119	8.8	-19.1	-2.1
Cheshire and Warrington	62	11.5	47	8.4	-23.7	-2.7
Northumberland	16	13.8	14	12.0	-11.7	-1.2
Tyne and Wear	62	12.0	49	9.4	-20.0	-2.2
County Durham	24	13.5	21	11.4	-14.1	-1.5
Tees Valley	36	12.7	30	10.3	-16.5	-1.8

Table 15.22a: Total Employment, Elementary Occupations by Region, 2004-2014

	2004		2014		2004-2014	
		Occupation		Occupation	Change	
Elementary Occupations	000s	share %	000s	share %	%	%pa
England	2808	11.0	2257	8.5	-19.6	-2.2
London	445	9.9	363	7.6	-18.3	-2.0
South East	442	10.5	385	8.5	-12.8	-1.4
East of England	308	11.2	254	8.8	-17.6	-1.9
South West	293	11.5	238	9.0	-18.8	-2.1
West Midlands	282	10.9	211	7.9	-25.1	-2.9
East Midlands	228	11.4	169	8.2	-25.8	-2.9
Yorkshire and the Humber	288	11.8	221	8.7	-23.2	-2.6
North West	384	11.4	300	8.7	-21.8	-2.4
North East	138	12.6	114	10.2	-17.1	-1.9

- Employment in *elementary occupations* in *England* is projected to decline at 2.2 per cent per annum from 2.8 million (11 per cent of total employment) in 2004 to 2.26 million (8.5 per cent of total employment) in 2014.
  - The shares of total employment in this SOC Major Group in 2004 range from less than 10 per cent in the London East, Berkshire and London South, to over 13 per cent in Northumberland, County Durham and North Yorkshire. Other local LSC areas from the North East register greater than average shares of employment in elementary occupations, while local areas in London and the South East record amongst the smallest shares.
  - All local LSC areas are projected to experience a reduction in employment in this SOC Major Group. Projected rates of decrease range are greatest in local LSC areas in the midlands, with Lincolnshire & Rutland, Shropshire, the Black Country and Derbyshire recording projected rates of loss of at least 3 per cent per annum. By contrast, in parts of the South East (Berkshire, Surrey, Kent & Medway and Milton Keynes Oxfordshire & Buckinghamshire), the North East (Northumberland and County Durham) and London Central record the slowest rates of projected decline of 1.5 per cent per annum or less.

Table 15.23: Total Economic Activity Rates (population aged 16+), by LLSC area, 1999-2014

	%				Percentage point difference		
	1999	2004	2009	2014	1999-04	2004-09	2009-14
England	61.3	61.2	61.3	60.5	-0.1	0.0	-0.8
London North	61.5	61.3	60.8	59.9	-0.3	-0.5	-0.9
London West	61.9	62.2	64.1	65.5	0.3	1.9	1.4
London Central	61.5	61.1	61.8	61.7	-0.4	0.6	-0.1
London East	62.9	62.4	62.4	62.2	-0.5	0.1	-0.2
London South	61.7	61.9	64.1	66.3	0.2	2.2	2.1
Milton Keynes, Oxon and Bucks	66.1	64.6	63.0	61.5	-1.4	-1.6	-1.5
Berkshire	66.8	66.2	66.0	65.8	-0.6	-0.2	-0.2
Hampshire and Isle of Wight	63.8	63.4	63.2	62.8	-0.3	-0.3	-0.3
Surrey	67.4	67.2	68.4	69.4	-0.3	1.2	1.0
Sussex	62.5	61.5	60.9	60.2	-1.0	-0.7	-0.7
Kent and Medway	63.9	62.6	61.0	59.4	-1.3	-1.6	-1.7
Norfolk	67.6	67.8	68.5	68.4	0.2	0.7	0.0
Cambridgeshire	64.6	64.7	63.6	61.2	0.1	-1.0	-2.4
Suffolk	63.6	64.0	64.5	64.4	0.5	0.4	0.0
Luton and Bedfordshire	64.3	63.9	61.6	58.6	-0.4	-2.4	-3.0
Hertfordshire	60.1	59.8	58.9	57.1	-0.3	-0.9	-1.8
Essex	62.7	63.6	64.6	64.2	1.0	0.9	-0.4
Devon and Cornwall	61.3	60.4	60.8	59.9	-0.8	0.4	-0.9
Somerset	64.5	63.7	65.5	66.1	-0.8	1.8	0.6
Bournemouth, Dorset and Poole	59.8	58.9	59.3	58.5	-0.9	0.4	-0.8
West of England	58.4	57.6	55.4	52.4	-0.8	-2.2	-3.0
Wiltshire	63.1	62.2	61.2	59.0	-0.9	-1.0	-2.2
Gloucestershire	63.1	63.1	64.5	65.0	0.1	1.3	0.5
Shropshire	60.6	59.3	59.4	58.7	-1.3	0.1	-0.7
Staffordshire	58.9	57.7	58.0	57.2	-1.1	0.3	-0.8
Black Country	63.7	61.5	58.9	56.2	-2.2	-2.6	-2.7
Birmingham and Solihull	60.4	58.4	58.4	58.7	-2.1	0.0	0.3
Herefordshire & Worcestershire	61.9	60.1	59.5	58.8	-1.8	-0.6	-0.7
Coventry and Warwickshire	61.2	59.2	56.6	53.6	-2.0	-2.6	-3.1
Derbyshire	61.6	61.1	61.2	60.4	-0.5	0.1	-0.8
Nottinghamshire	62.6	61.3	61.5	60.6	-1.3	0.2	-0.9
Lincolnshire and Rutland	63.3	62.2	62.5	62.2	-1.2	0.4	-0.4
Leicestershire	64.0	62.6	61.4	59.4	-1.4	-1.1	-2.1
Northamptonshire	61.2	60.3	60.0	58.5	-0.8	-0.3	-1.5
North Yorkshire	59.9	60.3	60.5	59.3	0.3	0.2	-1.3
West Yorkshire	58.0	57.6	58.0	57.2	-0.3	0.4	-0.9
South Yorkshire	60.9	60.9	60.7	59.2	0.0	-0.2	-1.6
Humberside	63.1	63.4	65.5	66.6	0.3	2.1	1.0
Cumbria	63.1	63.6	63.3	61.9	0.5	-0.3	-1.4
Lancashire	58.6	59.4	61.1	61.8	0.8	1.7	0.6
Greater Merseyside	56.7	57.3	58.1	58.0	0.6	0.8	-0.2
Greater Manchester	57.4	58.0	57.8	56.6	0.6	-0.2	-1.3
Cheshire and Warrington	59.5	60.3	59.3	57.1	0.8	-1.0	-2.2
Northumberland	57.7	57.5	58.8	58.5	-0.2	1.3	-0.4
Tyne and Wear	62.9	62.9	66.6	69.4	-0.1	3.7	2.8
County Durham	52.8	52.7	52.8	50.8	-0.1	0.2	-2.1
Tees Valley	53.6	53.9	55.4	54.4	0.3	1.5	-0.9

Table 15.23a: Total Economic Activity Rates (population aged 16+) by Region, 1999-2014

	%				Percentage point difference		
	1999	2004	2009	2014	1999-04	2004-09	2009-14
England	61.7	61.4	61.5	60.8	-0.4	0.1	-0.7
London	62.0	61.7	62.5	62.9	-0.3	0.8	0.4
South East	64.9	64.1	63.6	63.1	-0.8	-0.5	-0.5
East of England	63.5	63.7	63.6	62.6	0.2	-0.1	-1.0
South West	61.6	60.9	61.0	60.0	-0.7	0.1	-1.0
West Midlands	62.0	60.3	59.7	58.9	-1.7	-0.6	-0.8
East Midlands	62.6	61.6	61.5	60.4	-1.0	-0.1	-1.1
Yorks & the Humber	60.3	60.5	61.1	60.3	0.2	0.6	-0.8
North West	58.9	59.6	59.9	59.0	0.7	0.3	-0.9
North East	55.9	55.8	56.7	55.5	-0.1	0.9	-1.2

15.6 Activity rates

- The total *activity rate* in *England* is remain fairly steady at just over 61 per cent between 2004 and 2009, before declining to 60.6 per cent in 2014. Activity rates are defined as the economically active population divided by the population aged 16+.
  - ➢ In 2004 economic activity rates range from in excess of 66 per cent in Norfolk, Surrey and Berkshire to less than 54 per cent in the Tees Valley and County Durham. Greater Merseyside, Northumberland, West Yorkshire and the West of England record the next lowest activity rates. These local patterns are indicative of higher than average regional activity rates in the South East and East of England in particular, but also in London and the East Midlands and the lowest activity rates in the North East and North West. By 2014 economic activity rates are projected to range from 70 per cent in Surrey to 52 per cent in County Durham. These local variations are indicative of the age profile of the population and the state of the local labour market. At regional level, the South East, East of England and London are projected to have higher economic activity rates than the England average in 2014, while the North East records the lowest projected economic activity rates.
  - ➢ No clear regional or urban-rural patterns of change in economic activity rates over the periods from 2004 to 2009 and from 2009 to 2014 are evident. Tyne & Wear, London South, London West, Humberside and Surrey record the largest percentage point gains in economic activity rates, while the West of England, Luton & Bedfordshire, the Black Country and Coventry & Warwickshire record the largest percentage point declines.

Annex A: SOURCES AND METHODS

This annex provides a brief technical description of the methods and data sources used to produce the projections. A more detailed explanation may be found in the separate *Technical Report* (Wilson *et al.* (2006a). The results described in the present document form part of a wider programme of work. The *National Report* (Wilson *et al.* 2006b), provides a more general description of this.

A.1 The macroeconomic model: Sectoral and Regional Dimensions

Labour market projections need to be firmly grounded on an understanding of how the economy as a whole is changing. Analysis of changes in employment structure is therefore intimately tied up with a detailed analysis of the development of the economy more generally. This has been operationalised in the form of the multi-sectoral dynamic model of the UK economy (MDM) developed by Cambridge Econometrics (CE). Details of MDM and its relationship with other model elements are given in the *Technical Report*.[1]

MDM is based on a detailed analysis of economic and other behavioural relationships, statistically estimated via robust econometric methods. The current version is based on a "bottom-up" treatment of regional economic prospects. The model offers a combination of great detail, and a high level of sophistication. The use of a fully specified, formal macroeconomic regional multi-sectoral model provides a number of advantages over more *ad hoc* extrapolation methods. These include enforcement of logical and accounting constraints, and emphasis on making explicit the underlying assumptions built into the projections.

MDM therefore projects future trends using a complex set of behavioural equations. Together these provide an explanation of the various phenomena which have resulted in past patterns of structural change. These relate the derived demand for labour to the prospects for output growth in each sector and the relative costs of labour and other inputs. The model reflects the various sources of demand for goods and services. It also incorporates the various technical linkages between different sectors, including the impact of technological change on productivity levels as well as the effects of changes in the way activities are classified as a result of the sub-contracting out of many functions.

The sectoral analysis therefore derives directly from the multi-sectoral regional macroeconomic model of the economy as described above. This model is used to generate estimates for output and productivity for the main industrial sectors and projections of total employment by industry, based on the 2003 Standard Industrial Classification (SIC2003). In all, 67 industries are distinguished. Although for presentational purposes these have often been reduced to a smaller number of more aggregate sectors. The estimates and projections of employment produced are consistent with the official ONS estimates.

The latest version of MDM incorporates the system of UK National Accounts consistent with ESA95, and a 2001 input-output table and classification converters. The latest National Accounts (with chained volume measures and reference year 2001) and associated data from the ONS have also been incorporated into the model database and equation estimates.

[1] See Wilson *et al.* (2006a).

A.2 Occupational Projections

Methodology

The methods for projecting occupational employment change are based on extrapolative procedures. The present methodology is based on the use of the SOC 2000 classification. Projections were developed for the 25 Sub-major Groups. The approach involves two stages. First, projections of the likely changes in industrial employment by region are made using the multi-sectoral dynamic macroeconomic model of the economy. Secondly, projections of the occupational structure of employment within each industry are made based on information from the Censuses of Population 2001 and the Labour Force Survey. These occupational coefficients are then combined with the projected levels of industrial employment to obtain projected levels of employment by occupation. All this is undertaken at a regional level for the 25 sub-major groups.

The occupational employment projections are therefore based on a sub-model which takes as input the regional/industrial projections produced by the macroeconomic model. It is a 'top-down' approach, the industrial and regional employment projections being disaggregated into the 25 occupational categories for each industry.

Margins of Error

The employment estimates make use of a wide variety of sources, as described in more detail below. As a consequence, it is not possible to calculate precise margins of error.[2] From an analysis of previous projections it is clear that these margins can be quite large. Industry employment levels are typically projected within ±10 per cent over a 5-10 year horizon. The directions of change are projected correctly in almost 90 per cent of cases. The errors in terms of annual percentage growth rates are usually of the same order of magnitude as the observed changes.

Occupational employment levels are typically projected within ±7 per cent over a 5-10 year horizon. The direction of change is correctly projected in about 80 per cent of all cases. Occupational shares are usually projected within ±2 percentage points. (The typical share is around 4 percentage points).

Historical revisions to the data account for a very large part of the forecast errors. However, it is important to appreciate that the purpose of the projections is not to make precise forecasts of employment **levels**. Rather, the aim is to provide policy analysts with useful information about the general nature of **changing employment patterns** and their implications for skill requirements.

The results provide a useful benchmark for debate and policy deliberations about underlying employment trends. However, they should not be regarded as more precise than the general statements in the text. Many years of international research have demonstrated that detailed manpower planning is not a practicable proposition. The results presented here should be regarded as indicative of general trends and orders of magnitude, given the continuation of past patterns of behaviour and performance , rather than precise forecasts of what will necessarily happen.

[2] For further discussion see the *Technical Report* (Wilson *et al.,* 2006a).

A.3 Development of Databases and Procedures

Data Sources and Methods: The *Working Futures* Database

The *Working Futures* employment database has been developed specifically to meet the requirements of the present set of projections. These developments fall into 3 main categories:

- extended sectoral detail, covering all 2-digit SIC2003 categories;
- revised geographies covering the LLSC areas;
- treatment of occupations, based on SOC 2000 historical data series and projections, for the new sectors and local areas described above.

This requires:

- establishing a consistent historical database of employment and output by detailed sector and LLSC area;
- development of occupational data and relating to the new sectors and geographical areas;
- development of models and procedures to generate consistent projections across these various dimensions;
- development of a new replacement demand (RD) module to generate RD estimates across the various dimensions.

Detailed Sectoral estimates

The starting point was existing databases. Historical data on employees in employment for male and female, full-time and part-time and estimates for self-employment, by 41 industries, for all the local authority districts, were available based on information from the ABI. This was expanded using various official data to cover 67 SIC2003 two digit categories and all 47 LLSC areas. The results incorporate the latest sectoral employment data from ONS, including the 2003 Annual Business Inquiry.

For economic indicators such as GVA, the total employment estimates by 41 industries for the LLSCs was multiplied by regional productivity to create an estimate of GVA for the area. Other variables were treated in an analagous fashion, using data from CE's counties and LADs databanks to do the reallocation and create historical data.

Occupation Gender and Status

Historical data on employment for male and female, full-time and part-time and estimates for self-employment by 41 industries for all the local authority districts were available from the original CE/IER database. These were expanded to provide an occupation dimension within each sector using data from the Census of Population and LFS. These were extended to 67 SIC2003 categories assuming common patterns of occupation, gender and status mix as for the broader sectoral categories.

The revised occupational employment projections are based on data taken from the Census of Population (CoP), supplemented by information from the Labour Force Survey (LFS). Together these were used to generate a series of employment matrices based on 49 industries (SIC2003) and the 25 SOC 2000 Sub-Major occupational groups for each of the RDA areas. Details of the occupational groupings are shown in Table A.11. Information from the Census of Population 2001 was used to calibrate the estimates at an aggregate level.

These matrices were then used to develop projections of occupational employment in selected future years by applying projected occupational shares in each industry to the sectoral forecasts from the macroeconomic model. This was then extended to LLSC areas using analogous methods. Details of the basic procedures are given in the *Technical Report*.[3]

[3] See Wilson *et al.* (2006a)

Projections of occupational shares at this level place considerable demands on the data available and the situation on the ground can be changed rapidly and substantially by technological and other changes. It is important to appreciate the assumptions used and the range of factors which it is felt are likely to influence immediate future trends, including how these may diverge from previous patterns of change. These issues are discussed in more detail in the main text.

A.4 Replacement Demand

Net changes in occupational employment are only one indicator of future demand. Another measure, which is important for assessing education and training provision, is the replacement demand needed to offset outflows due to retirements, occupational mobility etc. Procedures have been developed to produce such estimates linked to the main occupational projections.

The analysis of occupational trends and prospects described above provide predictions of the changes in the number of people employed in particular occupational categories. However, education and training requirements are not simply dependent on which occupations are growing rapidly. Even in those occupations where employment levels are expected to decline substantially, there may be a need to train, simply to maintain the existing stock of skills at the required level. In addition to examining likely **net changes** in the numbers in each occupational category, it is also important, therefore, to assess **replacement demands**. These represent the numbers needed to maintain the existing stock of skills due to losses resulting from retirements and other outflows.

The use of common assumptions across all geographical areas and sectors ensures that the estimates add up. In practice such parameters are likely to vary across these dimensions.

The key components are:

- information on the age and gender structure of occupational employment;
- information on rates of outflows due to retirement (and other reasons for leaving the workforce);
- inter-occupational mobility;
- mortality.

Data on age structure are required, since many of the flows, especially retirements and mortality, are age specific. Age structures also vary significantly by occupation.

Retirement rates also vary by gender and by age. The estimates are based on data from the LFS which show the percentage of those employed one year ago who have retired from employment either temporarily or permanently. For males the main outflows are associated with retirement *per se*. For females, in particular, there is a significant outflow for younger age groups associated with family formation.

Another potential outflow is due to mortality. Information on mortality rates is available by age and gender from ONS. While losses due to death are not great for individual age groups up to the age of 65, they can cumulate to produce significant losses over an extended period of time. The rates used are again based on data for the whole of the UK. However, mortality rates are unlikely to vary very much across broad occupational categories.

Potentially, occupational mobility is a more important source of loss for many occupations. Some occupations tend to gain employment as people are promoted from other occupations. For other occupations, losses due to retirement understate the overall replacement demands. Although data on such flows are available from the LFS, for the whole of the UK, they proved insufficiently robust to obtain estimates customised by industry and geographical areas. The replacement demand estimates presented here, therefore exclude both occupational and geographical mobility flows.

A.5 Choice of Sectors for analysis and reporting

Industries used in RMDM

The industries used in the CE multisectoral dynamic macroeconomic model (MDM) are as set out in Table A.1. These are based on data on 41 industries available from the ONS, especially data relating to input-output information which is central to MDM. They are classified according to the updated 1992/2003 Standard Industrial classification (SIC2003), as shown in the table.

Detailed Industries

For the purposes of the present project, the analysis has been extended to cover all 2-digit categories. These are shown in Table A.2. Including employment in private households and extra territorial organisations expands the total number of categories to 67. However, very few data are available for these last two categories. Also, it is not possible to identify any output data for Sector 6, Uranium Mining. So effectively there are 64 substantive industries for which there are comprehensive data. These are the groupings for which most of the detailed analysis was undertaken. They are referred to as **detailed industries**. They form the basis for the development of estimates for the SSC industrial footprints. Effectively each SSC is defined in terms of whole of part of each detailed industry. The shares for those detailed industries split over more than one SSCs are based on ABI data.

The other projections are presented at a variety of different sectoral levels using two main types of definition:

Broad sectoral definitions are based on groups of 6, 14 or 27 sectors, and defined by Standard Industrial Classification (SIC 2003) codes. These preserve the traditional manufacturing, services and public sector groupings of the economy. They are hierarchically related, with the 6 broadest sectors being a more aggregated grouping of the 14 sectors, and so on. The 14 and 27 groups have been adopted by the SSDA in their Sector Skills Matrix database and hence are referred to as the Sector Matrix Industries (SMI). These are not coterminous with the SSCs' footprints; and

Sector Skills Councils definitions use SIC code groupings that most closely match the SSC footprints. These definitions are a 'best fit' of each SSC's core business sectors. These specify the *core* SIC codes that are undisputed and do not overlap with any other SSC. The extent to which this is an exact fit varies between SSCs. In some cases, the use of the core SIC codes excludes elements of the SSC footprint because they are included in other areas. SSCs can provide further depth analysis of skills and future employment within their sector (see their individual websites for details, Annex D provides addresses).

Reporting at national (UK) level (Sector Matrix Industries)

The SSDA and LSC have adopted 27 industrial categories for the *New Employer Skills Survey* and other purposes. These are referred to as the Sector Matrix Industries (SMIs) These are shown in Table A.3.

The 27-fold categorization has obvious attractions from the point of view of consistency with other things the SSDA and LSC are doing. However, a number of the categories used in Table A.3 (and also in Table A.4) are very small (notably mining and quarrying, wood and paper, other manufacturing & recycling, and electricity, gas and water). These pose problems in terms of obtaining statistically reliable historical and projected employment data, especially when additional breaks are required by gender, employment status and occupation.

For the purpose of reporting of the national projections in the *National Report* for the UK, a slightly more aggregated set of categories (as shown in Table A.5) is used. There are 25 categories here, most of which correspond to those in Table A.3. Even so, categories 2 (Mining & quarrying and electricity, gas & water), 4 (textiles and clothing) and 10 (other manufacturing & recycling) remain small. These are referred to as **Industries.**

Reporting at Sectoral level (SSCs)

The development of the Skills for Business network (SfBN) and its constituent Sectors Skills Councils, has led to the need for a new focus on the categories represented by the footprints of the SSCs as defined by SIC. The *Sectoral Report* is structured around these **SSC categories.**

Reporting at regional level (Regional) Sectors)

At regional level, the categories published by ONS for "Government Office Regions" are shown in Table A.6. These are even more aggregated than those for the UK, for obvious reasons. This level of categorization does not present *any* detail for manufacturing industries.

In order to provide *some* detail within manufacturing, the categories set out in Table A.7 have been developed. These allow for some sub-manufacturing detail, while maintaining the minimum cell sizes required for statistical reliability across the regional dimension.

Note that these are not the same as those based on the groupings used by ONS for the "Standard Regions". The latter do not correspond very closely with the aggregations used in Table A.5. In particular, category DL adopted by ONS, cuts across the engineering grouping used there. ONS category DL includes only SIC2003 sectors 30-33. Mechanical engineering (SIC2003, 29) is included in the remainder of manufacturing. In the present analysis the DL category and the residual "remainder of D" adopted by ONS, are replaced by two categories based on categories or aggregations of those used in Table A.5. These are "engineering" (category 8 in Table A.5) and the corresponding residual. These are referred to as **(Regional) Sectors**.

Headline reporting at national (UK) level (Broad Sectors)

For summary/ headline reporting, a 6-fold categorization is used. This is shown in Table A.8. The purpose of the reporting at this level is to give an overview of the main sectoral developments rather than providing sectoral detail (which is presented later in the report).

This was the main "aggregate" categorization used in previous reports produced for DfES (e.g. Wilson *et al.* (2001a). It therefore allows comparison with earlier projections. It can also be replicated across the constituent countries and regions within the UK for comparability.

Table A.1: Classification of Industries in RMDM

Industries		SIC2003	25 industries	27 industries
1.	Agriculture	01,01,05	1	1
2.	Coal etc.	10	2	2
3.	Oil & Gas	11,12	2	2
4.	Other Mining	13,14	2	2
5.	Food, Drink & Tobacco	15, 16	3	3
6.	Textiles, Clothing & Leather	17, 18, 19	4	4
7.	Wood & Paper	20, 21	5	5
8.	Printing & Publishing	22	5	6
9.	Manufactured Fuels	23	6	7
10.	Pharmaceuticals	24.4	6	7
11.	Chemicals nes	24 (ex 24.4)	6	7
12.	Rubber & Plastics	25	6	7
13.	Non-Metallic Mineral Products	26	6	7
14.	Basic Metals	27	7	8
15.	Metal Goods	28	7	8
16.	Mechanical Engineering	29	8	9
17.	Electronics	30, 32	8	9
18.	Electrical Engineering & Instruments	31, 33	8	9
19.	Motor Vehicles	34	9	10
20.	Other Transport Equipment	35	9	10
21.	Manufacturing nes	36, 37	10	11
22.	Electricity	40.1	2	12
23.	Gas Supply	40.2, 40.3	2	12
24.	Water Supply	41	2	12
25.	Construction	45	11	13
26.	Distribution	50, 51	12, 13	14, 15
27.	Retailing	52	14	16
28.	Hotels & Catering	55	15	17
29.	Land Transport	60, 63	16	18
30.	Water Transport	61	16	18
31.	Air Transport	62	16	18
32.	Communications	64	17	19
33.	Banking & Finance	65, 67	18	20
34.	Insurance	66	18	20
35.	Computing Services	72	20	22
36.	Professional Services	70, 71, 73, 74.1-74.4	19	21
37.	Other Business Services	74.5-74.8	21	23
38.	Public Administration & Defence	75	22	24
39.	Education	80	23	25
40.	Health & Social Work	85	24	26
41.	Miscellaneous Services	90-99	25	27
42.	Unallocated			

Table A.2: Detailed Industries (Ind67)

Ind67	Ind67 name[4]	SIC2003	SAM41 (MDM)	25 industries
1	Agriculture	01	1	1
2	Forestry	02	1	1
3	Fishing	05	1	1
4	Coal mining	10	2	2
5	Oil and gas	11	3	2
6	Uranium mining	12	3	2
7	Metal ores	13	4	2
8	Other mining	14	4	2
9	Food	15.1-15.8	5	3
10	Drink	15.9	5	3
11	Tobacco	16	5	3
12	Textiles	17	6	4
13	Clothing	18	6	4
14	Leather	19	6	4
15	Wood and wood products	20	7	5
16	Paper and paper products	21	7	5
17	Publishing and printing	22	8	5
18	Manufactured fuels	23	9	6
19	Pharmaceuticals	24.4	10	6
20	Chemicals nes	24 (ex 24.4)	11	6
21	Rubber and plastics	25	12	6
22	Non-metallic mineral products	26	13	6
23	Basic metals	27	14	7
24	Metal goods	28	15	7
25	Mechanical engineering	29	16	8
26	Computers and office machinery	30	17	8
27	Electrical engineering	31	18	8
28	TV and radio	32	17	8
29	Instruments	33	18	8
30	Motor vehicles	34	19	9
31	Aerospace	35.3	20	9
32	Other transport equipment	35 (ex 35.3)	20	9
33	Manufacturing nes	36	21	10
34	Recycling	37	21	10
35	Electricity	40.1	22	2
36	Gas supply	40.2, 40.3	23	2
37	Water supply	41	24	2
38	Construction	45	25	11
39	Sale and maintenance of motor vehicles	50	26	12
40	Distribution nes	51	26	12
41	Retailing nes	52	27	14
42	Hotels and catering	55	28	15
43	Rail transport	60.1	29	15
44	Other land transport	60.2, 60.3	29	15
45	Water transport	61	30	15
46	Air transport	62	31	15
47	Other transport services	63	29	15
48	Post and courier services	64.1	32	16
49	Telecommunications	64.2	32	16
50	Banking and finance	65	33	18
51	Insurance	66	34	18
52	Financial support services	67	33	18
53	Real estate	70	36	19
54	Renting of goods	71	36	19
55	Computing services	72	35	20
56	Research and development	73	36	19
57	Professional services nes	74.1-74.4	36	21
58	Other business services	74.5-74.8	37	21
59	Public administration and defence	75	38	22
60	Education	80	39	23
61	Health and social work	85	40	24
62	Waste disposal	90	41	25
63	Membership organisations	91	41	25
64	Culture and sport	92	41	25
65	Other services	93	41	25
66	Private household	95	41	25
67	Extra-territorial organisations	99	41	25

[4] They are abbreviated from the full names used by ONS.

Table A.3 Classification of 27 SSDA *Sector Matrix* Industries

Industries		SIC2003
1.	Agriculture, etc	01-02, 05
2.	Mining & quarrying	10-14
3.	Food, drink & tobacco	15-16
4.	Textiles & clothing	17-19
5.	Wood, pulp & paper,	20-21
6.	Printing & publishing	22
7.	Chemicals, & non-metallic mineral products	23-26
8.	Metals & metal goods	27-28
9.	Machinery, electrical & optical equipment	29-33
10.	Transport equipment	34-35
11.	Other manufacturing & recycling	36-37
12.	Electricity, gas & water	40-41
13.	Construction	45
14.	Sale & maintenance of motor vehicles	50
15.	Wholesale distribution	51
16.	Retailing	52
17.	Hotels & restaurants	55
18.	Transport	60-63
19.	Communications	64
20.	Financial services	65-67
21.	Professional services	70, 71, 73
22.	Computing services	72
23.	Other business services	74
24.	Public administration & defence	75
25.	Education	80
26.	Health & social work	85
27.	Other services	90-99

Table A.4: Defining SSCs in terms of SIC2003

	SSCs	SIC2003
1	Lantra	01, 02, 05.02, 85.2, 92.53
2	Cogent	11, 23, 24.11-24.2, 24.41-24.63, 24.65,24.66, 25.13-25.24, 50.5
3	Proskills	10, 12-14, 21, 22.2, 24.3, 26.1, 26.26, 26.4-26.8, 40.3
4	Improve	15.11-15.91, 15.93-15.98, 51.38
5	Skillfast-UK	17-19, 24.7, 51.16, 51.24, 51.41, 51.42, 52.71, 93.01
6	SEMTA	25.11, 25.12, 27.4-28.3, 28.5-28.7, 29-35
7	Energy & Utility Skills	37, 40.1, 40.2, 41, 51.54, 51.55, 60.3, 90
8	ConstructionSkills	45.1, 45.2, 45.32, 45.34, 45.4, 45.5, 71.32, 74.2
9	SummitSkills	45.31, 45.33, 52.72
10	Automotive Skills	50.1-50.4, 71.1
11	Skillsmart Retail	52.1-52.6
12	People 1st	55.1, 55.21, 55.23, 55.3-55.5, 63.3, 92.33, 92.71
13	GoSkills	60.1, 60.21-60.23, 61, 62.1, 62.2, 63.2, 80.41
14	Skills for Logistics	60.24, 63.1, 63.4, 64.1
15	Financial Services Skills Council	65-67
16	Asset Skills	70, 74.7
17	e-skills UK	22.33, 64.2, 72, 74.86
18	Central Government	75.1, 75.21, 75.22, 75.25, 75.3
19	Skills for Justice	75.23, 75.24
20	Lifelong Learning UK	80.22, 80.3, 80.42, 92.51
21	Skills for Health	85.1
22	Skills for Care and Development	85.3
23	Skillset	22.32, 24.64, 74.81, 92.1, 92.2
24	Creative & Cultural Skills	22.14, 22.31, 36.3, 74.4, 92.31, 92.32, 92.34, 92.4, 92.52
25	SkillsActive	55.22, 92.6, 93.04
26	Non-SSC employers (Primary)	05.01, 15.92, 16, 20, 22.11-22.13, 22.15, 26.21-26.25, 26.3, 27.1-27.3, 28.4, 36.1, 36.2, 36.4-36.6
27	Non-SSC employers (Wholesale / Retail)	51.11-51.15, 51.17-51.23, 51.25-51.37, 51.39, 51.43-51.53, 51.56-51.90, 52.73, 52.74
28	Non-SSC employers (Business services / Public services)	62.3, 71.2, 71.31, 71.33, 71.34, 71.4, 73, 74.1, 74.3, 74.5, 74.6, 74.82, 74.85, 74.87, 80.10, 80.21, 91, 92.72, 93.02, 93.03, 93.05

Table A.5: General Classification for Presenting Sectors in *National Report*

	Industries	SIC2003	MDM Industries
1.	Agriculture, etc	01-02, 05	1
2.	Mining & quarrying; Electricity, gas & water	10-14,40-41	2-4, 22-24
3.	Food, drink & tobacco	15-16	5,
4.	Textiles & clothing	17-19	6
5.	Wood, pulp & paper; Printing & publishing	20-22	7,8
6.	Chemicals, & non-metallic mineral products	23-26	9-13
7.	Metals & metal goods	27-28	14,15
8.	Machinery, electrical & optical equipment	29-33	16-18
9.	Transport equipment	34-35	19,20
10.	Other manufacturing & recycling	36-37	21
11.	Construction	45	25
12.	Sale & maintenance of motor vehicles	50	26 (part)
13.	Wholesale distribution	51	26 (part)
14.	Retailing	52	27
15.	Hotels & restaurants	55	28
16.	Transport	60-63	29-31
17.	Communications	64	32
18.	Financial services	65-67	33,34
19.	Professional services	70, 71,73	36 (part)
20.	Computing services	72	35
21.	Other business services	74	36 (part), 37
22.	Public administration & defence	75	38
23.	Education	80	39
24.	Health & social work	85	40
25.	Other services	90-99	41

Note: (a) Most of these sectors are identical to the 27 categories in Table A.3. The exceptions are industries 2 and 5, which are aggregates of 2 such categories.

Table A.6: Industries for which ONS supply data for the Government Office Regions (employees only)

		SIC 2003		SAM41 (MDM)
1	Agriculture, hunting, forestry, fishing	(AB)	01 to 05	1
2	Mining & quarrying	(C)	10-14	2-4
3	Manufacturing	(D)	15-37	5-21
4	Electricity gas & water supply	(E)	40/41	22-24
5	Construction	(F)	45	25
6	Personal household goods	(G)	50 to 52	26,27
7	Hotels & restaurants	(H)	55	28
8	Transport storage & communication	(I)	60 to 64	29-32
9	Financial intermediation	(J)	65 to 67	33,34
10	Real estate renting & business activities	(K)	70 to 74	35-37
11	Public admin. & defence; compulsory social security	(L)	75	38
12	Education	(M)	80	39
13	Health & social work	(N)	85	40
14	Other community, social & personal service activities; private households organisations & bodies	(O,P,Q)	90 to 99	41

Table A.7: Sectoral Categories for Regional Reporting

		SIC 2003		SAM41 (MDM)	Broad Sector Group
1	Agriculture, etc [(a)]	(AB)	01 to 05	1	1
2	Mining & quarrying [(a)]	(C)	10-14	2-4	1
	Manufacturing, of which: [(b)]	(D)	15-37	5-21	2
3	Food drink & tobacco	(DA)	15-16	5	2
4	Engineering	(DL+)	29-33	16-18	2
5	Rest of manufacturing	(rest of D)		6-15,19-21	2
6	Electricity, gas & water [(a)]	(E)	40/41	22-24	1
7	Construction	(F)	45	25	3
8	Retail, distribution	(G)	50 to 52	26,27	4
9	Hotels & restaurants	(H)	55	28	4
10	Transport & communication	(I)	60 to 64	29-32	4
11	Financial services [(b)]	(J)	65,66,67	33,34	5
12	Other business activities [(b)]	(K)	70 to 74	35-37	5
13	Public admin. & defence	(L)	75	38	6
14	Education	(M)	80	39	6
15	Health & social work	(N)	85	40	6
16	Other services	(O,P,Q)	90 to 99	41	5

Notes: a) Although these categories are shown here, small sample sizes preclude producing some, more detailed, breaks for these sectors.

b) These categories are modified from those adopted by ONS for regional reporting in order to avoid cutting across the categories used in Table A.6.

Table A.8: Aggregate Sectors (and Comparison with Industry Groups used in Previous projections)

Broad Sector	Old Industry Group [a]	MDM Industries
1. Primary sector and utilities	1. Agriculture	1
	2. Mining etc.	2,3,4
	9. Utilities	22-24
2. Manufacturing	3. Food, drink and tobacco	5
	4. Textiles and clothing	6
	5. Chemicals	9-12
	6. Metals, and mineral products	13-15
	7. Engineering	16-20
	8. Other manufacturing	7,8,21
3. Construction	10. Construction	25
4. Distribution, transport etc.	11. Distribution, hotels etc.	26-28
	12. Transport and communication	29-32
5. Business and other services	13. Banking and business services	33,34,37
	14. Professional services	36
	15. Other services	42
6. Non-marketed services	16. Health and education services	39,40
	17. Public administration and defence	38

Note: (a) As used in Wilson (2001a).

Table A.9: Broad Sectors, Sector Matrix, Industries and RMDM Industries

Broad Sector	25 / 27 industries[a]	RMDM Industries
1. Primary sector and utilities	1. Agriculture, etc	1
	2. Mining & quarrying	2-4
	Electricity, gas & water[a]	22-24
2. Manufacturing	3. Food, drink and tobacco	5
	4. Textiles and clothing	6
	5. Wood, pulp & paper	7
	Printing & publishing[a]	8
	6. Chemicals, non-metallic min. prods.	9-12
	7. Metals and metal goods	13-15
	8. Machinery, electrical & optical eq.	16-18
	9. Transport Equipment	19-20
	10. Other manufacturing & recycling	21
3. Construction	11. Construction	25
4. Distribution, transport etc.	12. Sale & maintenance of motors	26 (part)
	13. Wholesale distribution	26 (part)
	14. Retailing	27
	15. Hotels & restaurants	28
	16. Transport	29-31
	17. Communications	32
5. Business and other services	18. Financial services	33,34
	19. Professional services	36 (part)
	20. Computing services	35
	21. Other business services	37 (+ part of 36)
	25. Other services	41
6. Non-marketed services	22. Public administration & defence	38
	23. Education services	39
	24. Health & social work	40

Note: (a) Most of these sectors are identical to the 27 categories in Table A.3. The exceptions are industries 2 and 5, which are aggregates of 2 such categories.

Table A.10: Relationship between Industry (25) and Detailed Industry (67)

	Industry		Detailed Industry	SIC2003
1	Agriculture, etc	1	Agriculture	01
		2	Forestry	02
		3	Fishing	05
2	Mining & quarrying; Electricity, gas & water	4	Coal mining	10
		5	Oil and gas	11
		6	Uranium mining	12
		7	Metal ores	13
		8	Other mining	14
		35	Electricity	40.1, 40.3
		36	Gas supply	40.2
		37	Water supply	41
3	Food, drink and tobacco	9	Food	15.1-15.8
		10	Drink	15.9
		11	Tobacco	16
4	Textiles and clothing	12	Textiles	17
		13	Clothing	18
		14	Leather	19
5	Wood, pulp & paper; Printing and publishing	15	Wood and wood products	20
		16	Paper and paper products	21
		17	Publishing and printing	22
6	Chemicals and non-metallic mineral products	18	Manufactured fuels	23
		19	Pharmaceuticals	24.4
		20	Chemicals nes	24 (ex 24.4)
		21	Rubber and plastics	25
		22	Non-metallic mineral products	26
7	Metals & metal goods	23	Basic metals	27
		24	Metal goods	28
8	Machinery, electrical & optical equipment	25	Mechanical engineering	29
		26	Computers and office machinery	30
		27	Electrical engineering	31
		28	TV and radio	32
		29	Instruments	33
9	Transport equipment	30	Motor vehicles	34
		31	Aerospace	35.3
		32	Other transport equipment	35 (ex 35.3)
10	Other manufacturing & recycling	33	Manufacturing nes	36
		34	Recycling	37
11	Construction	38	Construction	45
12	Sale and maintenance of motor vehicles	39	Distribution relating to motors	50
13	Wholesale distribution	40	Distribution nes	51
14	Retailing	41	Retailing nes	52
15	Hotels & restaurants	42	Hotels and catering	55
16	Transport	43	Rail transport	60.1
		44	Other land transport	60.2, 60.3
		45	Water transport	61
		46	Air transport	62
		47	Other transport services	63
17	Communications	48	Post and courier services	64.1
		49	Telecommunications	64.2
18	Finacial services	50	Banking and finance	65
		51	Insurance	66
		52	Financial support services	67
19	Professional services	53	Real estate	70
		54	Renting of goods	71
		56	Research and development	73
20	Computing services	55	Computing services	72
21	Other business services	57	Professional services nes	74.1-74.4
		58	Other business services	74.5-74.8
22	Public administration & defence	59	Public administration and defence	75
23	Education	60	Education	80
24	Health & social work	61	Health and social work	85
25	Other services	62	Waste disposal	90
		63	Membership organisations	91
		64	Culture and sport	92
		65	Other services	93
		66	Private household	95
		67	Extra-territorial organisations	99

Table A.11: SOC2000 Classification of Occupational Categories (Sub-major Groups)

	Sub-major groups	Occupations	Occupation minor group number[a]
11	Corporate managers	Corporate managers and senior officials; production managers; functional managers; quality and customer care managers; financial institution and office managers; managers in distribution and storage; protective service officers; health and social services managers	111, 112, 113, 114, 115, 116, 117, 118
12	Managers/proprietors in agriculture and services	Managers in farming, horticulture, forestry and fishing; managers and proprietors in hospitality and leisure services; managers and proprietors in other service industries	121, 122, 123
21	Science and technology professionals	Engineering professionals; information and communication technology professionals	211, 212, 213
22	Health professionals	Health professionals, including medical and dental practitioners and veterinarians	221
23	Teaching and research professionals	Teaching professionals, including primary and secondary school teachers and higher and further education lecturers; research professionals (scientific)	231, 232
24	Business and public service professionals	Legal professionals; business and statistical professionals; architects, town planners, and surveyors; public service professionals; librarians and related professionals	241, 242, 243, 244, 245
31	Science and technology associate professionals	Science and engineering technicians; draughtspersons and building inspectors; IT service delivery occupations	311, 312, 313
32	Health and social welfare associate professionals	Health associate professionals, including nurses and other paramedics; therapists; social welfare associate professionals	321, 322, 323
33	Protective service occupations	Protective service occupations	331
34	Culture, media and sports occupations	Artistic and literary occupations; design associate professionals; media associate professionals; sports and fitness occupations	341, 342, 343, 344
35	Business and public service associate professionals	Transport associate professionals; legal associate professionals; financial associate professionals; business and related associate professionals; conservation associate professionals; public service and other associate professionals	351, 352, 353, 354, 355, 356
41	Administrative and clerical occupations	Administrative/clerical occupations: government and related organisations; finance; records; communications; general	411, 412, 413, 414, 415
42	Secretarial and related occupations	Secretarial and related occupations	421
51	Skilled agricultural trades	Agricultural trades	511
52	Skilled metal and electrical trades	Metal forming, welding and related trades; metal machining, fitting and instrument making trades; vehicle trades; electrical trades	521, 522, 523, 524
53	Skilled construction and building trades	Construction trades; building trades	531, 532
54	Other skilled trades	Textiles and garment trades; printing trades; food preparation trades; skilled trades n.e.c.	541, 542, 543, 549
61	Caring personal service occupations	Healthcare and related personal services; childcare and related personal services; animal care services	611, 612, 613
62	Leisure and other personal service occupations	Leisure and other personal service occupations; hairdressers and related occupations; housekeeping occupations; personal service occupations n.e.c.	621, 622, 623, 629
71	Sales occupations	Sales assistants and retail cashiers; sales related occupations	711, 712
72	Customer service occupations	Customer service occupations	721
81	Process plant and machine operatives	Process operatives; plant and machine operatives; assemblers and routine operatives	811, 812, 813
82	Transport and mobile machine drivers and operatives	Transport drivers and operatives; mobile machine drivers and operatives	821, 822
91	Elementary occupations: trades, plant and machine related	Elementary occupations: agricultural trades related; process and plant related; mobile machine related	911, 912, 913, 914
92	Elementary occupations: clerical and services related	Elementary occupations: clerical related; personal services related; cleansing services; security and safety services; sales related	921, 922, 923, 924, 925

Notes: (a) Standard Occupational Classification, ONS 2001.

Annex B

Alternative Definitions
There are various ways of looking at employment. For example, a distinction can be made between the number of people in employment (head count) and the number of jobs. These two concepts represent different things, as one person may hold more than one job. In addition, a further distinction can be made between area of residence and area of workplace.
Similarly there are various different definitions of unemployment, the labour force, workforce and population. In *Working Futures 2004-2014* the following definitions are used:

Residence basis: measured at place of residence (as in the Labour Force Survey (LFS)).
Workplace basis: measured at place of work (as in the Annual Business Inquiry (ABI)).

Workplace employment (number of jobs): these are typically estimated using surveys of employers, such as the ABI, focussing upon the numbers of jobs in their establishments. In this report references to employment relate to the number of jobs unless otherwise stated.

Employed residents (head count): the number of people in employment. These estimates are based primarily on data collected in household surveys, e.g. the LFS. People are classified according to their main job. Some have more than one job.

ILO unemployment: covers people who are out of work, want a job, have actively sought work in the previous four weeks and are available to start work within the next fortnight (or out of work and have accepted a job that they are waiting to start in the next fortnight).

Claimant Unemployed: measures people claiming Job Seeker's Allowance benefits.

Workforce: the total number of workforce jobs is obtained by summing workplace employment (employee jobs and self-employment jobs), HM Forces, government-supported trainees and claimant unemployment.

Labour Force: employed residents plus ILO unemployment.

Labour market participation or **Economic activity rate**: the number of people who are in employment or (ILO) unemployed as a percentage of the total population aged 16 and over.

REFERENCES

Barker, T. and W. Peterson (1987) (editors) *The Cambridge Multisectoral Dynamic Model of the British Economy*, Cambridge University Press, Cambridge, Great Britain.

Barker, T *et al*. (2001) 'The Regional Cambridge Multisectoral Dynamic Model of the UK Economy' , pp. 79-96 in G Clarke and M Madden (editors) *Regional Science in Business*, Springer-Verlag, Heidelberg.

Briscoe, G. and R. A. Wilson, (1991). 'Explanations of the Demand for Labour in the United Kingdom Engineering Sector'. *Applied Economics 23,* 913-26.

Briscoe, G. and R. A. Wilson, (2003). 'Modelling UK Occupational Employment'. *International Journal of Manpower.* No 5. Vol 24

Cambridge Econometrics (1997), *Regional Economic Prospects,* February. Cambridge Econometrics, Cambridge

Cambridge Econometrics (1996), *Regional Economic Prospects,* May. Cambridge Econometrics, Cambridge

Cambridge Econometrics (2005) *Industrial Report, February*. Cambridge Econometric: Cambridge.

Green, A.G. *et al.* (2004). *Working Futures: Regional Report.* Sector Skills Development Agency/Institute for Employment Research: Coventry.

Institute for Employment Research/ CMM (2001) DfES Skillsbase website: http://skillsbase.dfee.gov.uk/

Lindley, R.M.(1994). ‘A Perspective on IER Forecasting Activities and Future Developments'. *Labour Market Forecasts by Occupation and Education: The Forecasting Activities of Three European Labour Market Research Institutes*. ed. H. Heijke. Massachusetts: Kluwer Academic, 167-79.

Lindley, R.M.(2003). ‘Projections and institutions: the state of play in Britain’. *Forecasting Labour Markets in OECD Countries*. Ed. M. Neugart. Cheltenham: Edward Elgar.

National Skills Task Force (2000) *Skills for All*. DfES Nottingham.

Polenske, K (1980) *The US Multiregional Input-Output Accounts and Model*, Lexington Books, Lexington, Mass. US.

Wilson, R, A. (1994). ‘Modelling and Forecasting the Structure of Employment in the United Kingdom’. *Labour Market Forecasts by Occupation and Education*. Ed H. Heijke. Massachusetts: Kluwer Academic, 9-35.

Wilson, R.A. and G. Briscoe, (2002) *The impact of human capital on economic growth: A review.* CEDEFOP: Thassaloniki.

Wilson R. A. (ed.) (2000). *Projections of Occupations and Qualifications, 1999/2000*. Department for Education and Employment/University of Warwick, Institute for Employment Research, Coventry.

Wilson, R, A. (1999). ‘EMTA Quantitative Forecasting Model: Detailed specification.’ Institute for Employment Research, University of Warwick: Coventry

Wilson, R. A, (2001c) *Forecasting Skill requirements at National and company Levels*, in P. Descy and M. Tessaring (eds.) (2001), *Training in Europe (2nd report on Vocational Training Research in Europe 2000: Background Report, Volume 2)* CEDEFOP Reference Series, Luxembourg, Office for Official Publications of the European Communities, pp561-609.

Wilson, R.A. (ed.) (2001a). *Projections of Occupations and Qualifications: 2000/2001*, Department for Education and Employment/Institute for Employment Research: Coventry.

Wilson, R.A. (ed.) (2001b). *Projections of Occupations and Qualifications: 2000/2001:Regional Results.* Department for Education and Employment/Institute for Employment Research: Coventry.

Wilson, R, K. Homenidou and A. Dickerson, (2004a). *Working Futures: Technical Report.* Sector Skills Development Agency/Institute for Employment Research: Coventry.

Wilson, R, K. Homenidou and A. Dickerson, (2004b). *Working Futures: National Report.* Sector Skills Development Agency/Institute for Employment Research: Coventry.

Wilson, R, K. Homenidou and A. Dickerson, (2006a). *Working Futures 2004-2014: Technical Report.* Sector Skills Development Agency: Wath on Dearne.

Wilson, R, K. Homenidou and A. Dickerson, (2006b). *Working Futures 2004-2014: National Report.* Sector Skills Development Agency: Wath on Dearne.

Sector Skills Development Agency
This report is also available on the on the SSDA website:
www.skillsforbusiness.org.uk