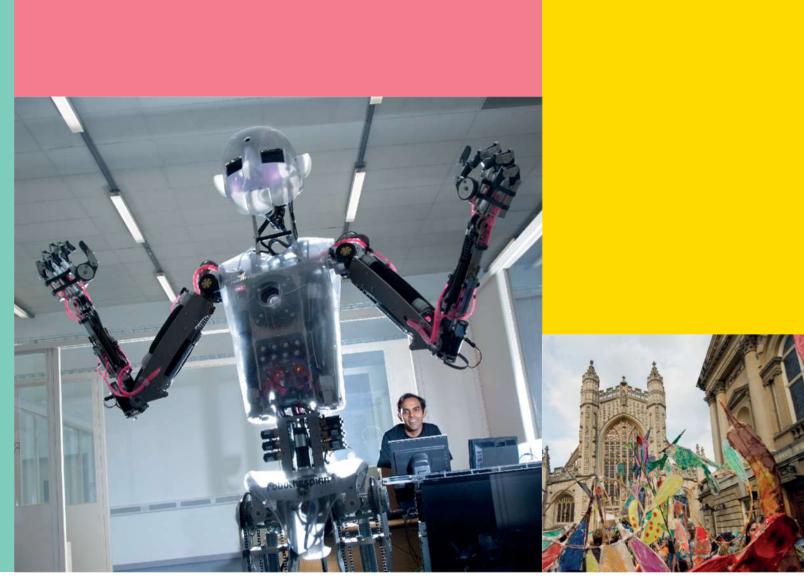


WEST OF ENGLAND EMPLOYMENT & SKILLS PLAN

EVIDENCE BASE
JULY 2019



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INTRODUCTION

This document builds on the 'People and Skills report' published in February 2018 as part of the West of England Combined Authority Local Industrial Strategy evidence base. This report provides further insights into the Labour Market; Demand for Skills and the Supply of Skills in the region.

The document identifies our regional strengths, opportunities and challenges in relation to employment and skills drawing on the best available information and has been used to underpin and inform the development of the West of England Employment and Skills Plan.

The document is structured around three main sections:

- 1. Labour Market
- 2. Demand for Skills
- 3. Supply of Skills

Each section sets out the key messages followed by detailed underpinning data analysis.

This evidence should be seen as a starting point to inform discussions and to support the identification of areas where the region may want to develop interventions and take the necessary steps to ensure the West of England continues to deliver the employment and skills opportunities that will enable people, communities and the region as a whole to thrive.

If you have any questions on this evidence or have supplementary evidence you would like us to consider please email:

Strategy@westofengland-ca.gov.uk



LABOUR MARKET & LOCAL LANDSCAPE

SECTION 1

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KEY MESSAGES

Context

- The West of England has a productive and diverse economy, with a high proportion of those in work qualified to NVQ level 4 or higher; with nearly 90% of residents working across the region.
- People in this region are more productive than average. Workers produce c.£33.70 per hr worked which is higher than the UK average of £33.60 per hr; but whilst productivity in the West of England is above the national average economic growth has slowed in recent years.
- The benefits of economic growth are not reaching all residents across the region. Whilst the West of England has experienced economic growth over the past 15 years that exceeds the national average the benefits haven't reached all residents. There are huge opportunities to increase our regional productivity through our workforce; ensuring that our residents have the necessary skills and training to access employment opportunities in the region

Demographics

- The region has a growing working age population, in contrast to other parts of the country. The population of the West of England has gown on average 0.8% per annum between 1997 and 2017; with a working age population of 734,400 (64% of the total population). The working age population is set to increase by c7% by 2030. A growing working age population is healthy for a growing economy but there will be a need to focus on upskilling and reskilling to ensure residents can stay economically active for longer and are able to adapt to the changing working environment.
- Young people dominate the transient population, moving to access education and work. With short term international migration being driven by students coming into the region to study; and 40% of internal migration flows into the region amongst those aged 15-24.
- Levels of international workers in our region are changing. Net inflows of international migration in the West of England have been falling having peaked in 2015. This is being driven in part by falling inflows but mainly rising outflows; in particular Bristol has experienced significant increases in outflows of long-term migration. Due to this decline the region may not able to rely on international workers to same extent as before.

KEY MESSAGES

Qualifications

- Overall the working age population in the West of England is well qualified; with 46% having an NVQ level or above qualification, compared to 39% for England. Of those in employment within the West of England in the 12 months to Dec 2018, 52% had an NVQ 4 level or above qualification compared to 44% for England.
- Across the region, some residents have no or low level qualifications. There are around 133,000 people without a level 2 qualification this includes 28,600 people with no qualifications. The proportion of people with no qualifications is significantly higher amongst 50-64 year olds and slightly higher among men, reflecting national trends.

• To drive inclusive growth, the region should address the gap in skills levels between those attracted to the region, and residents that grow up here. The West of England is successful in attracting highly skilled individuals into the area, it is less successful at producing its own highly skilled people - resulting in inequalities as research shows that people without a level 2, are more likely to be trapped in low skilled/low paid employment or unemployment.

Employment Rate

• The West of England has above average employment rates. The employment rate for the working age population in the West of England stood at 79.1% (year to Dec 2018); this was higher than the rate for England which stood at 75.4%. Whilst the employment rate in the West of England is higher for females, and ethnic minorities than the rate for England there are marked variations between different parts of the region



KEY MESSAGES

Unemployment and Economically Inactive

- Unemployment is lower than the national average but higher among some groups of the population. Whilst the unemployment rate(16+) is better than the England average, in absolute terms, there remain 20,700 people currently unemployed. The unemployment rate is higher amongst 16-24 year olds, young men, disabled people, people from ethnic minority communities, people with low skills levels, learning difficulties and people from Bristol. As of April 2019, 13,995 people (16+) were claiming unemployment related benefits and at ward level the claimant rate varies, demonstrating geographical pockets of unemployment.
- Among the 'economically inactive' proportion of the regional population, a large number of people actively want to work. At the same time, there are 133,000 16-64 year olds that are economically inactive a high proportion of which are retired, students or not involved in the labour market out of choice. However, approximately 27,300 'want a job'. Of the inactive

population, 26,700 were inactive due to long term illness. Rates of inactivity increased amongst older people (50-64). Bringing together those who are unemployed and those who are inactive but want to work means there are approx. 47,800 people wanting to work.

Occupational Profile

• Jobs in the region are at a higher skill level than the national average. Employment in the West of England is weighted towards higher skilled occupation with nearly 25% of people in employment within the West of England are employed within 'professional occupations, followed 16.5% in 'associate professional and technical occupations'. The West of England has mirrored national trends in terms of occupational growth and decline; demonstrating strong growth in higher skills occupations and a decline in lower skilled occupations.

KEY MESSAGES

• Gender splits in employment remain a feature of the regional picture. There remain significant gender differences by occupation, with fewer women working as 'managers, directors and senior officials', 'skilled trades', or 'plant, process or machine operatives' and fewer men working in 'administrative and secretarial roles' and 'caring, leisure and other service' occupations. There were also different occupational profiles by ethnicity, with fewer people from ethnic minorities employed in 'associate professional and technical' occupations and more in 'caring leisure and other occupations'.

Nature of Employment

• Flexible working is a feature of the regional workforce, but not always through choice. 73.1% of people work full time, compared to 75.1% in England. It is particularly low amongst women (55.9%) and in particular older women (46.9%). Whilst part time working provides increased

flexibility, many part time roles tend to be lower paid and in lower paid sectors. There has also been an increase in temporary employment across the West of England. Whilst for some, working part time and in temporary or zero hours contracts suits their personal circumstances, for others it is not a choice.

- Pay is slightly higher than average in the region. The median hourly workplace pay is slightly higher in the West of England than the England averages, across both part time and full-time jobs and by gender, a positive position.
- A number of jobs across the region are paid below the living wage. Despite the higher than average pay, in absolute terms, c.100,000 jobs are paid below the real living wage (as defined by the Living Wage Foundation). Research by the Joseph Rowntree Foundation found that, nationally, jobs that are low paid and insecure, do not offer a stepping stone to a better job, but trap people in poverty, with 5/6 people in low paid work failing to escape low pay over 10 years.

KEY MESSAGES

Deprivation, Health and Wellbeing

- There are 52 places in the region that fall within the most deprived 10% nationally. Out of 678 LSOAs in the West of England 52 are in the 10% most deprived in the country; 42 are in Bristol, 9 in North Somerset and 1 in B&NES. A further 44 LSOAs fall within the bottom 20% most deprived.
- Ill health or poor mental wellbeing can present barriers to an individual having a negative impact on their ability to work or participate in education and training. In Dec 2018, 34.5% (322,000) of people aged 16+ suffered with health conditions or illnesses lasting more than 12 months and the evidence shows that people with long term illnesses and disabilities are more likely to be unemployed or inactive than their peers who are not.
- Carers often face barriers to employment or progression in work. Over 11,000 individuals are claiming a carer's allowance, of which ¾ were women. Being a carer can limit the amount of time someone can undertake payed work, impacting on their personal income.

The West of England as a place to live and work

- House prices continue to grow across the region, creating creates challenges for low paid workers. The West of England is a diverse and attractive place to live. However as of 2017 average house prices in the West of England were 9.3 times average annual pay. This varies greatly across the region with average house price being 11-time annual resident earnings in B&NES; this extends to 20.8 times for the lowest 10% of earners. Rising rents are a particular issue for Bristol; there has been a substantial increase of 24% in rents amongst the lower quartile over a two year period.
- Transport links can limit opportunities for some people to access work or training. Limitations to public transport connectivity, with gaps in the commercial bus network, including links to deprived areas and employment sites creating barriers to employment for individuals and skills shortages for employers.



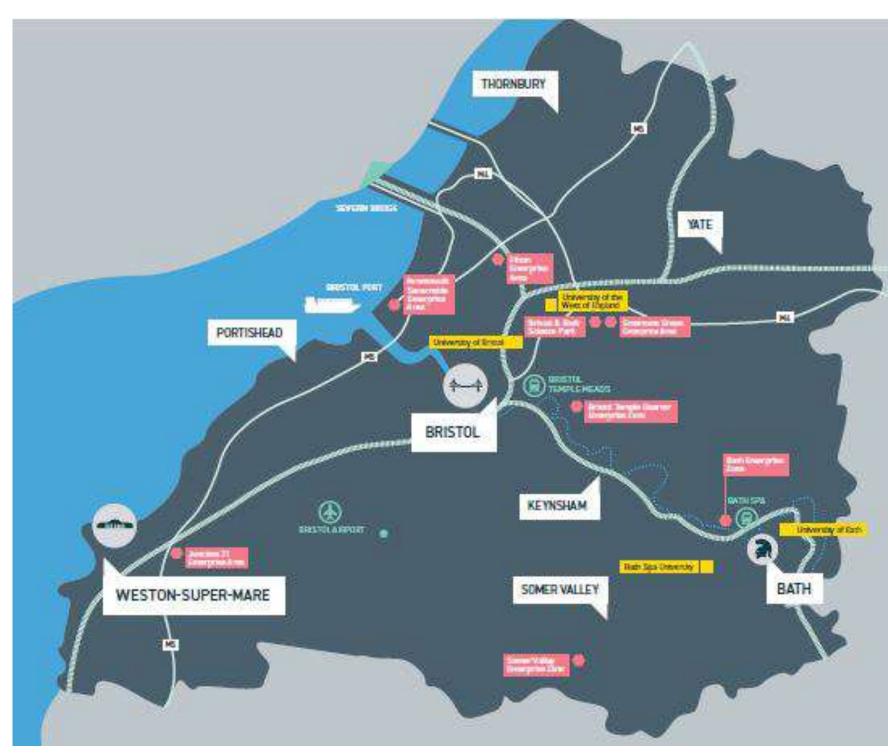
The West of England

The West of England LEP covers the four unitary authorities of Bath & North East Somerset Council, Bristol City Council, North Somerset Council and South Gloucestershire Council. The West of England has a population of 1,139,800 (2017 ONS mid-year population estimates) and comprises of approximately 461,700 households located across an area of 133,244 hectares.

Bristol is the largest urban area in the South West with a population of approximately 459,300 (local authority area) and is located centrally within the West of England. Bristol (authority area) accounts for 40% of the population, with a further 24% in South Gloucestershire - the majority of which are in the wider principle urban area of Bristol.

The city is complemented by the other strategically significant cities and towns of the World Heritage City of Bath and Weston-super-Mare. Beyond these principal urban areas lie the market towns of Nailsea, Midsomer Norton, Somer Valley, Keynsham, Yate, and Thornbury, with many villages set in rural surroundings and the costal towns of Clevedon and Portishead.

The West of England is a Functional Economic Market Area, with around 90% of residents working across the region; behind only Cardiff Capital Region (92%) and London (91%).

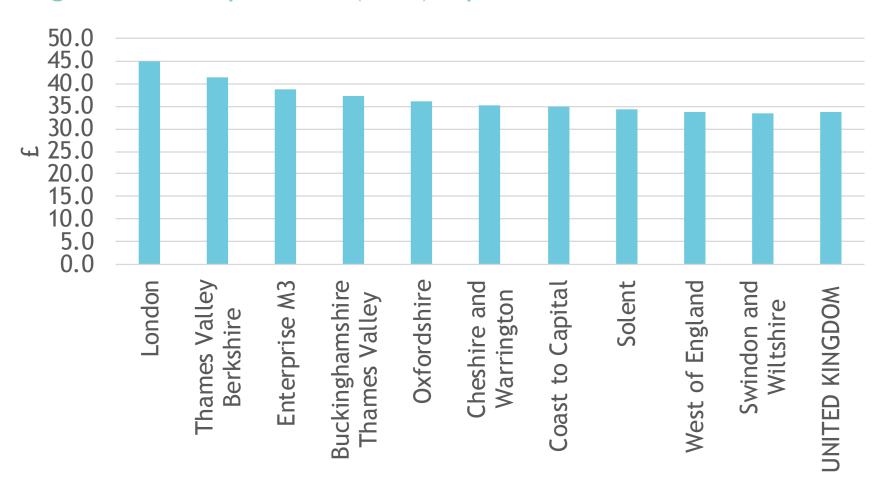




Productivity¹

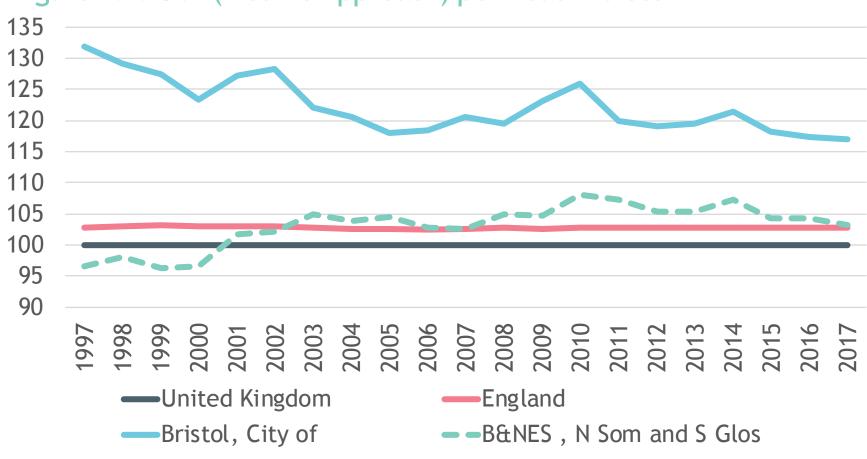
The West of England is a productive region with workers producing c. £33.70 per hr worked, marginally higher than the UK average of £33.60 per hr worked (2017). The West of England is one of only two LEP regions in the top 10 outside of the South East. As demonstrated by figure 1.3 there is a clear correlation between high skills and productivity (GVA per hour worked).

Figure 1.1: GVA per Head (2017) Top 10 LEP Areas



Productivity in the West of England is above the national average but economic growth has slowed since the 2008 recession, with our productivity premium declining. GVA per head in the region has converged towards the national average since 2010, and for longer in Bristol. London, in particular, has pulled ahead of other regions along with the wider South East.

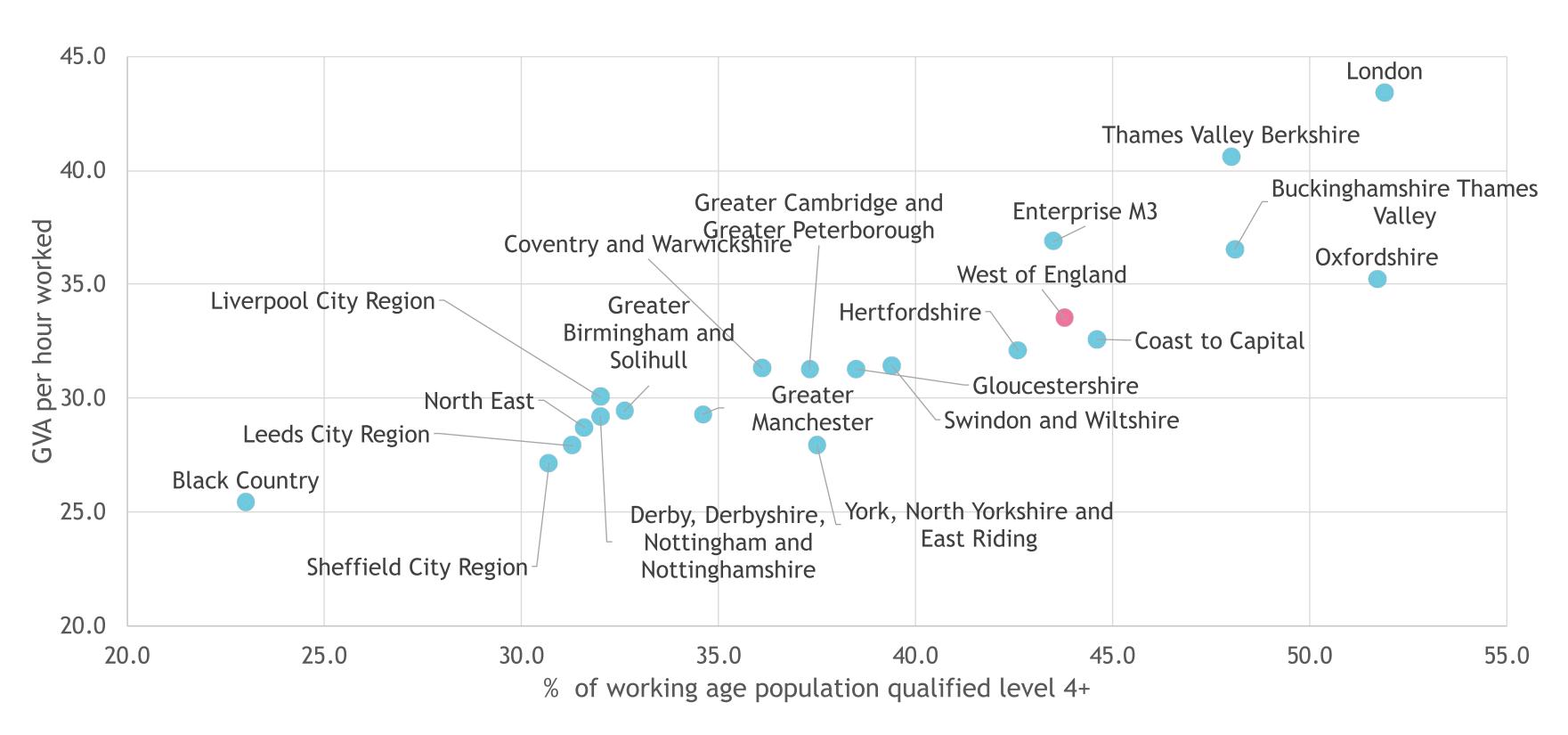
Figure 1.2: GVA (Income Approach) per head indices



Whilst the West of England is a vibrant and attractive place to both live and work, the benefits of growth have not been realised by all residents.



Figure 1.3: High Level Skills and Productivity by LEP area (2016)²





Demographics³

Between 1997 and 2017 the West of England population has grown on average 0.8% per annum. This is higher than that for England (0.7%) and comparator Core City LEP areas. Population growth in the West of England has accelerated in the last 10yrs - increasing by 9.5% over the period; this is a similar level of growth experienced by Cambridge and Peterborough LEP at 9.8%.

Working Age Population⁴

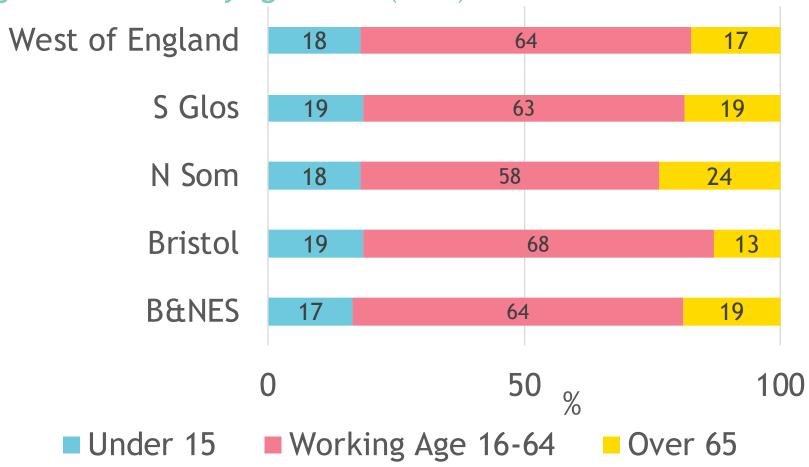
The West of England has a working age population (16-65) of 734,400 (64.4%). Of the four authorities making up the West of England, Bristol has the youngest age profile with 68% of the population of working age and a further 19% aged under 15. Conversely B&NES, South Gloucestershire and North Somerset have an older age profile; with 24% of North Somerset's population aged over 65.

The working age population of the region is projected to increase by 7% (table 1.2) to by 2030; this is primarily driven by growth of the working age population in Bristol.

Table 1.1: Working Age Population (2017)

	Working Age 16-64	Total Population
B&NES	121,500	188,600
Bristol	314,400	459,300
N Somerset	123,800	212,800
S Gloucestershire	174,900	279,000
West of England	734,600	1,139,800

Figure 1.4: Authority Age Profile (2017)

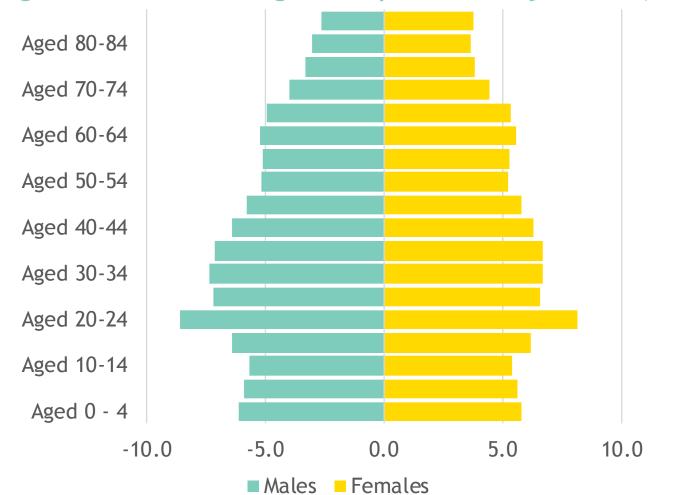




Population Projections⁵

Current population projections suggest that the West of England will grow by 11% between 2017 and 2030. During this time frame the cohort of those of aged 65+ is expected to increasey from 17% of the total population to 19%.

Figure 1.5: West of England Population Projections (2030)



Three of the four authorities - B&NES, North Somerset and South Gloucestershire are expected to experience significant growth in those aged over 65+. Whilst this creates economic

opportunities through the grey pound; unless these are 'healthy' aging years this could see pressure being put on social care. This could be exacerbated if growth in the working age population doesn't match the scale of growth of the aging population. This is likely to be a particular issue in B&NES and North Somerset.

Bristol is the only authority area where growth in the working age population outstrips the aging population; this is a characteristic of cities.

Table 1.2 Population projections by age (2017-2030)

	Aged 0-15		Working Age - Aged 16-64		Aged 65+	
	Projected	0/ Ch	Projected	%	Projected	
	Change	% Change	Change	Change	Change	Change
B&NES	3,597	11	4,827	4	8,486	24
Bristol	11,612	13	29,614	9	11,218	19
North Somerset	2,305	6	6,226	5	14,051	28
South Gloucestershire	5,999	12	12,511	7	14,113	27
West of England	23,513	11	53,178	7	47,868	24

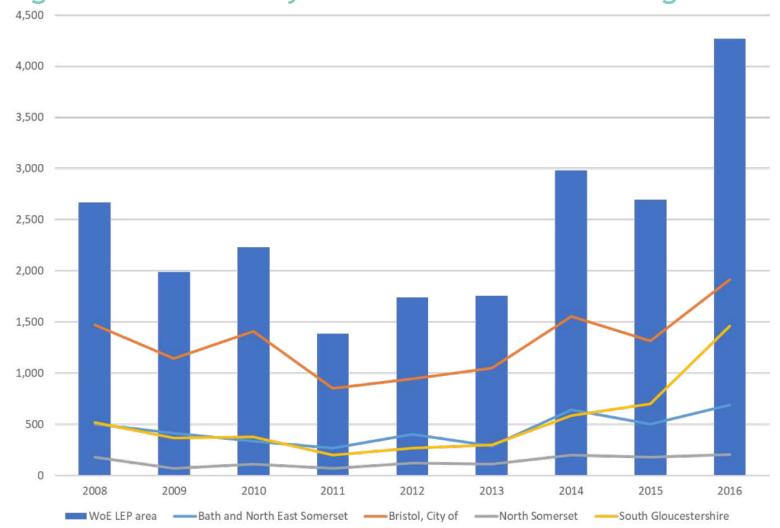
Migration⁶

Short term international migration into the region is driven by Bristol which accounts for 45% of the total into the West of England. Short term international migration into the region was impacted briefly by the financial crisis having between 2008 and



2011 however, as the economy recovered inflows of short term migration from abroad almost tripled. This was driven by migration flows into Bristol and South Gloucestershire; which collectively accounted for nearly 80% of short term migration into the region.

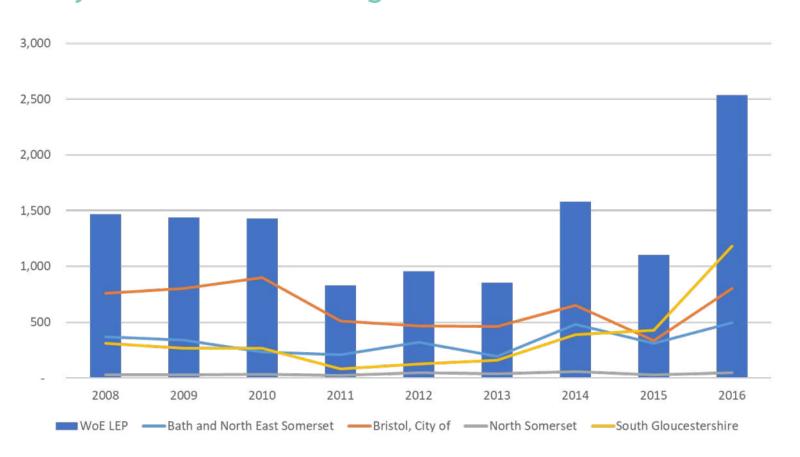
Figure 1.6: Inflows only: short term international migration



In 2016, 2,534 students came into the West of England to study; this has been driven by a sharp increase in the number of short term international students moving into South Gloucestershire. The number of international students moving into Bristol and

Bath is unsurprising due to the international reach of the Universities of Bristol and Bath. The University of West of England (UWE) located in the North Fringe of Bristol in South Gloucestershire has increased its global reputation in recent years attracting more international students as indicated by the data.

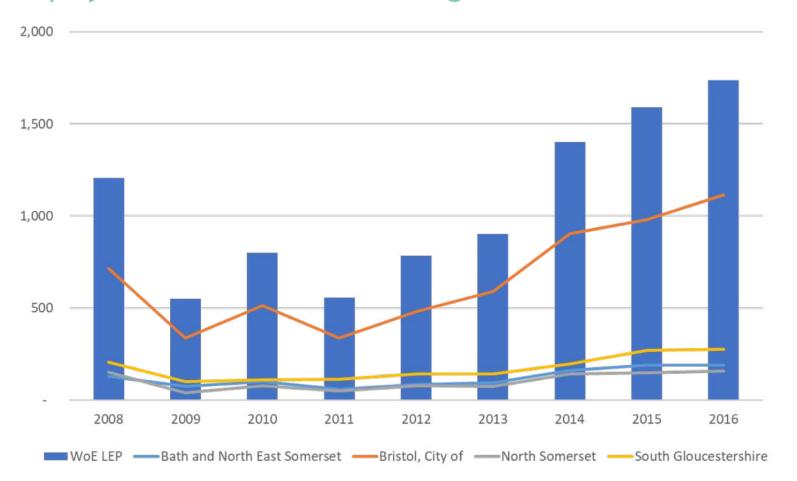
Figure 1.7: Inflows of Short term international migration with study as main reason for migration





Of those coming into the region for short-term work 64% are going to Bristol. Since 2011, inflows of short-term international migration for employment has increased significantly driving up the overall levels of short term international migration.

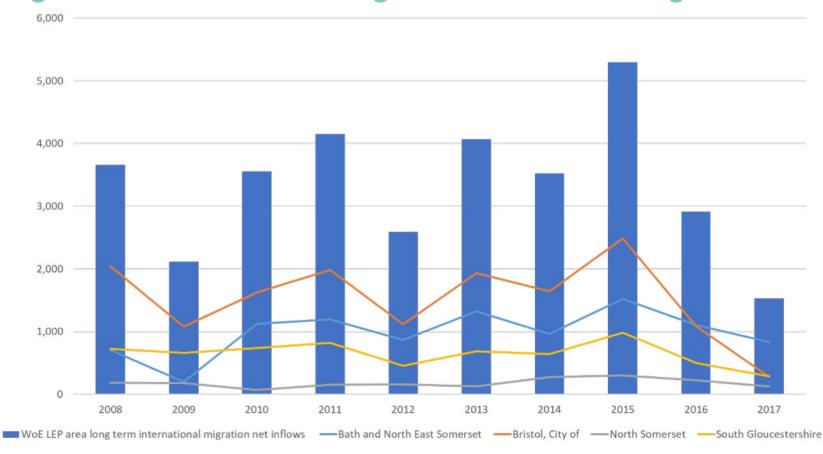
Figure 1.8: Inflows of Short term international migration with employment as main reason for migration



Whilst short term migration has continued to increase year on year since 2011; net inflows of long term international migration have been falling having peaked in 2015. As of 2017 net inflows of

long-term international migration has fallen to below 2,000 people. This pattern aligns with the announcement of the EU exit referendum.

Figure 1.9: Net inflows of long-term international migration



More detailed analysis of this trend at a local authority level suggests that this net change is being driven in part by falling inflows but mainly rising outflows; in particular Bristol has experienced significant increases in outflows of long-term migration.



Figure 1.10: Inflows of long-term international migration

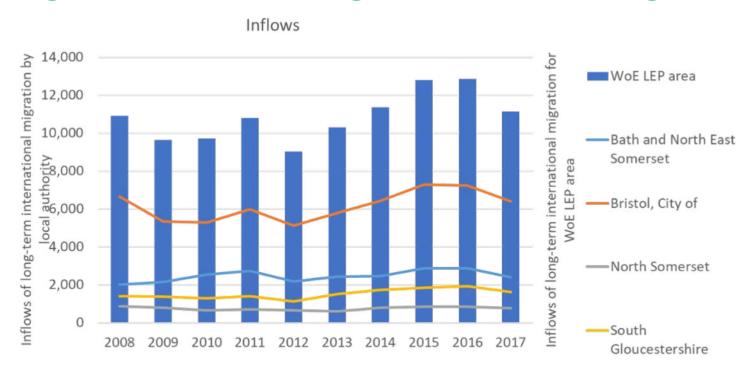
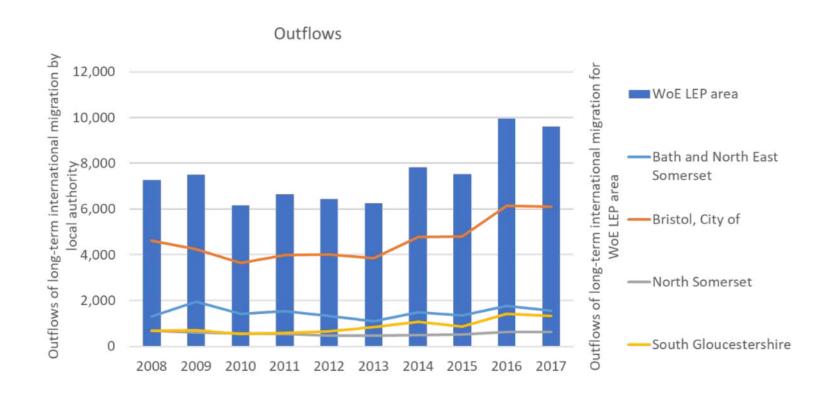
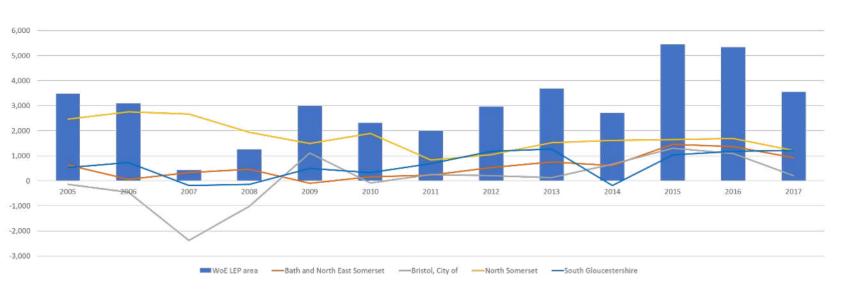


Figure 1.11: Outflows of long-term international migration



Internal migration is a key component of population change in the West of England; with North Somerset consistently experiencing the highest net inflow of internal migration. Unsurprisingly Bristol as a core city experiences the highest levels of internal inflows and outflows.

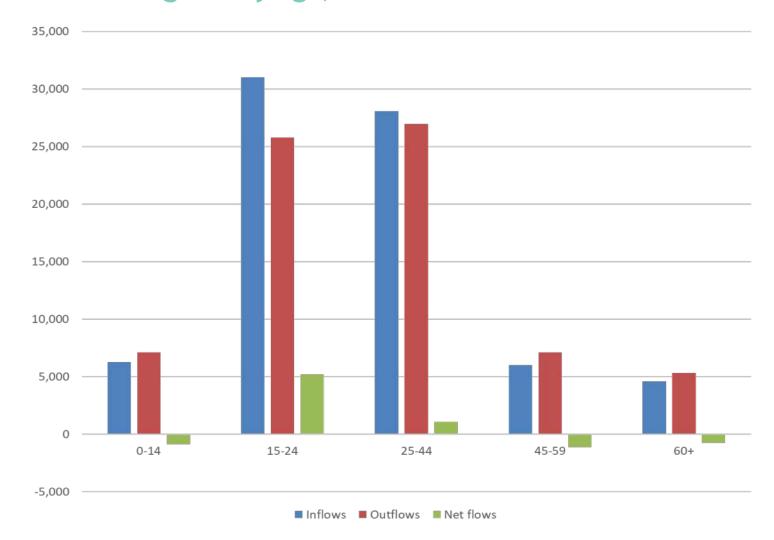
Figure 1.12: Net Inflows of Internal Migration



In 2017 40% of the internal inflows into the region was by young people aged 15-24. This may be due to a high number of students and graduates that are attracted to the West of England and its universities. There is also a high outflow in the 15-24 age bracket, again this is likely to be driven by students leaving the area. In recent years there has been a slight decline in the net internal inflows of young people moving into the area, however this has been offset by the increase in short-term international inflows for study.

WEST OF ENGLAND Combined Authority

Figure 1.13: Inflows and outflows of internal migration for the West of England by age, 2017

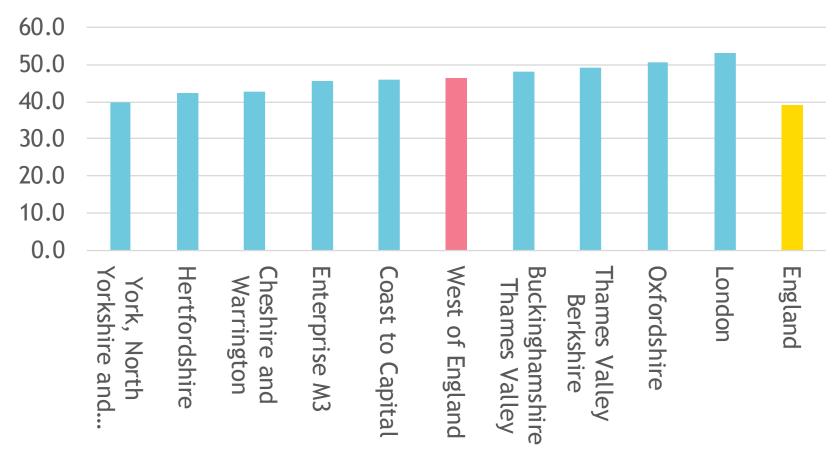




Qualifications of the Working Age Population⁸

Overall the Working age population in the West of England is well qualified; with 46% having an NVQ level or above qualification, compared to 39% for England. The West of England ranks well compared to the other LEP areas in terms of its qualified working age population - coming 5th out of the 38 LEPs.

Figure 1.14: Top 10 LEP areas: % Working Age Population with an NVQreflecting national trends. Level 4+ (Jan-Dec 2018)



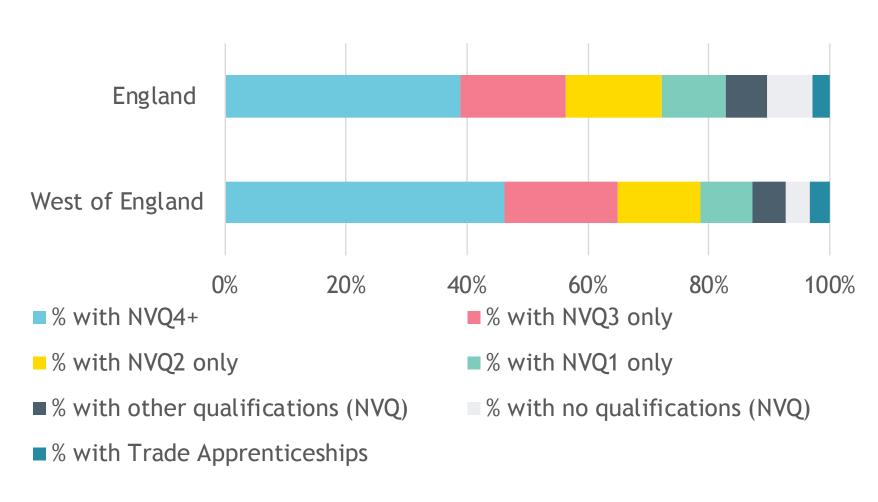
Whilst the West of England demonstrates a highly qualified working age population about 4% of the working age population have no qualifications; equating to c.28,600 people in the West of England. The proportion of people without qualifications is most significant in Bristol (4.5%) accounting for 14,000 of those without qualifications in the West of England. The proportion of people with no qualifications is higher amongst 50-64 year olds and slightly higher among men, preflecting national trends.

Figure 1.15: % with No Qualifications (GCSEs NVQ Level 2) (Jan-Dec 2018)





Figure 1.16: Qualification level of the working age population

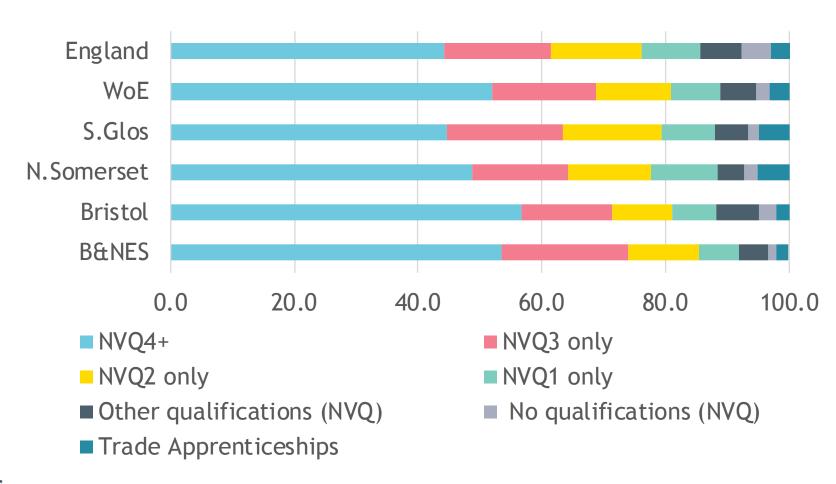


There is a further 133,000 people in the West of England without a level 2 qualification (this includes the 28,600 with no qualifications), 18.2% of the working age population.

Of those in employment within the West of England in the 12 months to Dec 2018, 52% had an NVQ 4 level or above qualification compared to 44% for England. When compared with the 46% of the population with an NVQ level 4 or above, we can see this group is 'over-represented' in employment terms. Conversely, whilst 18.3%

of the population do not have an NVQ level 2, only 16% of this group are in employment, showing that this group is under-represented in employment terms.

Figure 1.17: Qualification level of those aged 16-64 in employment





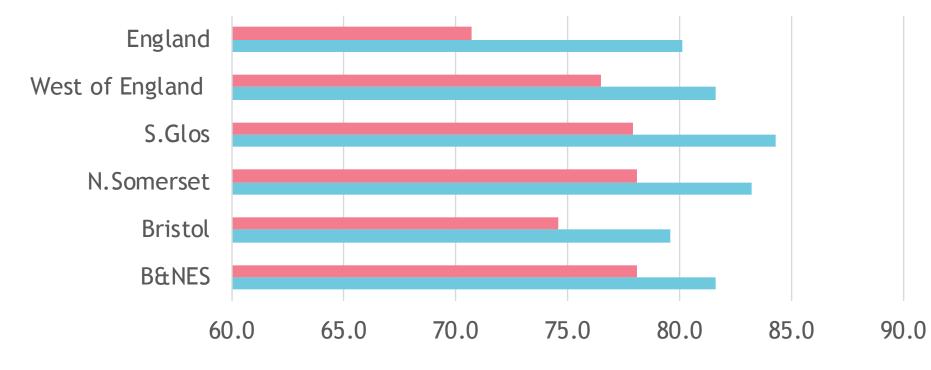
Employment Rate⁹

In the 12 months to December 2018 the employment rate for the working age population in the West of England stood at 79.1%; this was higher than the rate for England which stood at 75.4%. However, there are variations across the four UAs - 77.1 in Bristol; 79.9 in B&NES; 80.6 in North Somerset and 81.1 in South Gloucestershire.

There are also marked variations in the employment rate between males and females. In the West of England the employment rate for males was 81.6 in the 12 months to December 2018; whereas it was only 76.5 for females. Across all four of the UAs there is a higher rate of males in employment than females; this follows national trends. South Gloucestershire has the biggest gap of 6.4 percentage points (p.p); with 84.3% male of working age in employment whereas only 77.9% of females.

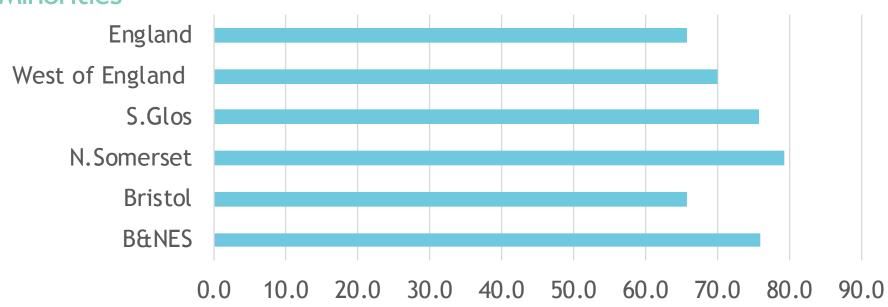
The employment rate of ethnic minorities between authorities also varies; the West of England has an employment rate of 69.39, however this varies between 65.7% in Bristol and 79.3% in North Somerset. [Note this data is based on a sample survey and has large confidence limits due to the small sample size which means the data can be unreliable]

Figure 1.18: Employment Rate of Working Age: Males and Females - 12 months to Dec2018.



■ Employment rate females - aged 16-64 ■ Employment rate males - aged 16-64

Figure 1.19: Employment Rate of Working Age Ethnic Minorities

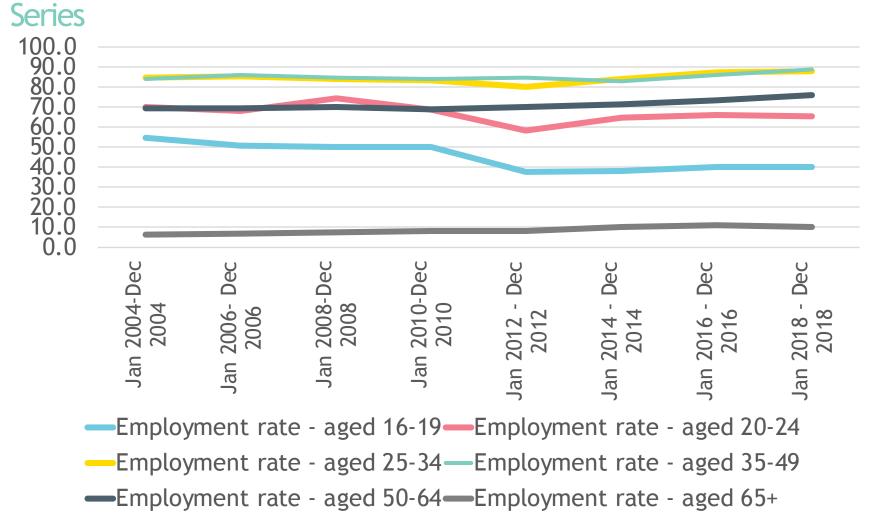




Employment Rate by Age

The employment rate across the West of England varies by age band; unsurprisingly those in the age bands 25-34; 35-49 and 50-64 have the highest employment rates. There has been a gentle increase in the employment rate amongst the over 65s between 2004 and 2018; whilst the employment rate for those aged 16-19 and 20-24 have been more susceptible to economic and policy changes; this is more notable at a individual authority level than at the West of England.

Figure 1.20: West of England LEP Employment Rate by Age - Time



For the younger age bands 16-19 & 20-24 the employment rate noticeably declines following the 2008 recession, this then increases slightly and stabilises after 2012; this co-insides with the changes to the compulsory age for young people to stay in either education or training; which increased to 17 in 2013 and to 18 in 2015.

Across nearly all age bands more males than females are in employment, with the exception of those aged 20-24. [Note this data is based on a sample survey and has large confidence limits due to the small sample size which means the data can be unreliable]

Table 1.3: Employment Rate by Gender and Age Band - West of England

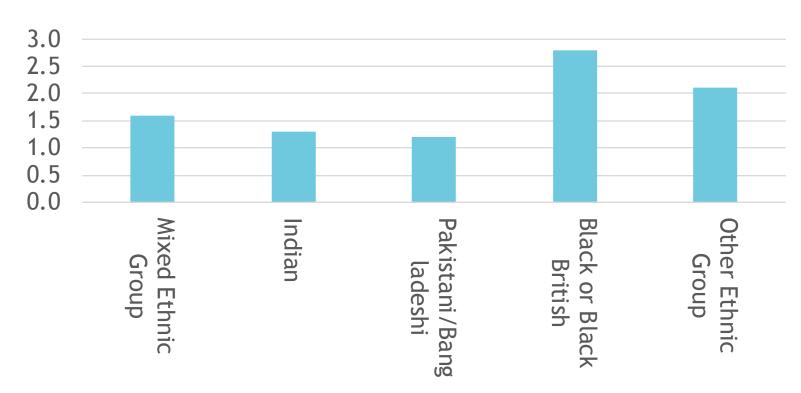
Employment	Jan - Dec 2018		
Rate Age Bands	Males	Females	
16-19	40.2	40.0	
20-24	62.0	69.0	
25-34	93.5	82.3	
35-49	92.7	85.0	
50-64	78.7	73.3	
65+	15.4	6.3	



Ethnicity & Diversity¹⁰

In the 12 months to December 2018 approximately 9% of the working age population are from an ethnic background.

Figure 1.21: % of the population aged 16-64 by Ethnicity



Bristol is particularly diverse; with at least 45 religions; at least 187 countries of birth and at least 91 main languages spoken; recent data on school pupils shows that the % of pupils who are not 'White British' has increased from 31% in 2011 to 37% in 2018¹¹. The employment rate for ethnic minority groups in the West of England is lower than those from a white background; although higher than the national average. The employment rate varies markedly by cultural background; and there are particular cultural backgrounds where females are more likely to be economically inactive.

Figure 1.22: Employment Rate (aged 16-64) by ethnic background

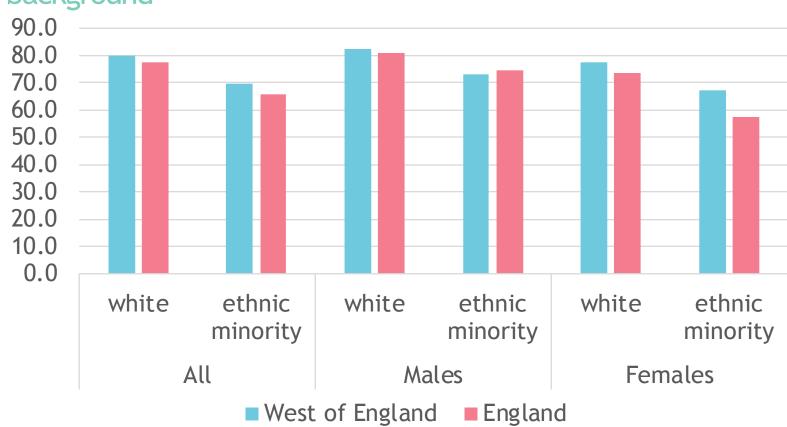
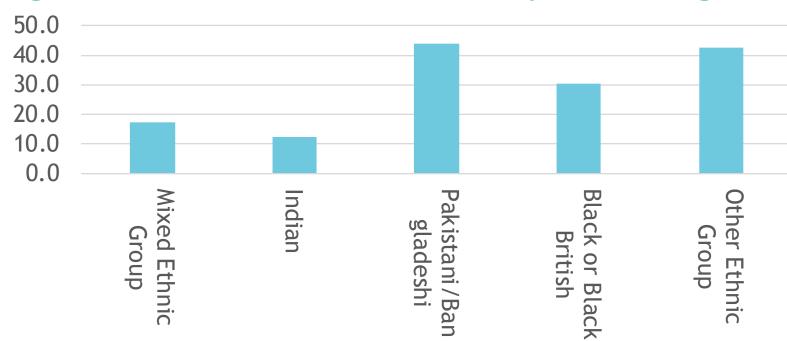


Figure 1.23: Economic Inactive Females by ethnic background

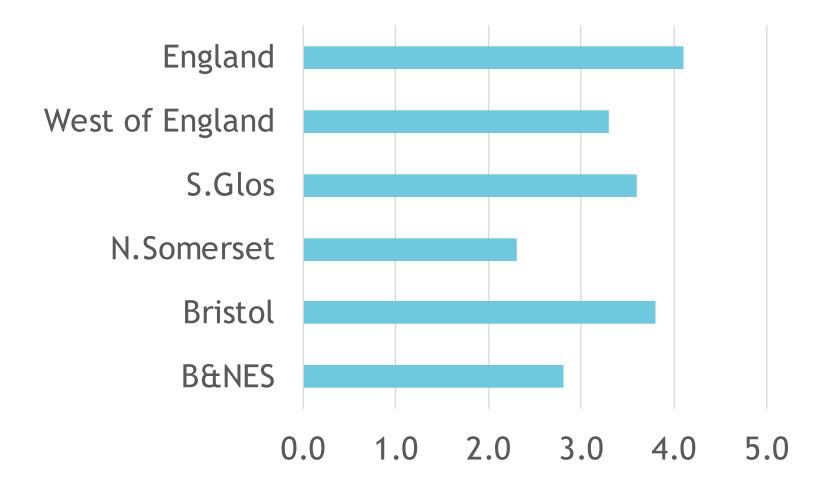




Unemployment Rate¹²

The unemployment rate demonstrates the number of people who are able to work and want to work who are currently jobless, as a measure this includes those over retirement age. In the 12 months to December the unemployment rate for the West of England stood at 3.3% (c.20,700 people), below the unemployment rate for England which stood at 4.1%. Of those who are unemployed 20,500 are aged 16-64.

Figure 1.24: Unemployment Rate - 16+ (Jan-Dec 2018)



Of the four unitary authorities within the West of England Bristol continuously has the highest unemployment rate; this is unsurprising and a characteristic of cities.

Figure 1.25: Unemployment Rate Time Series

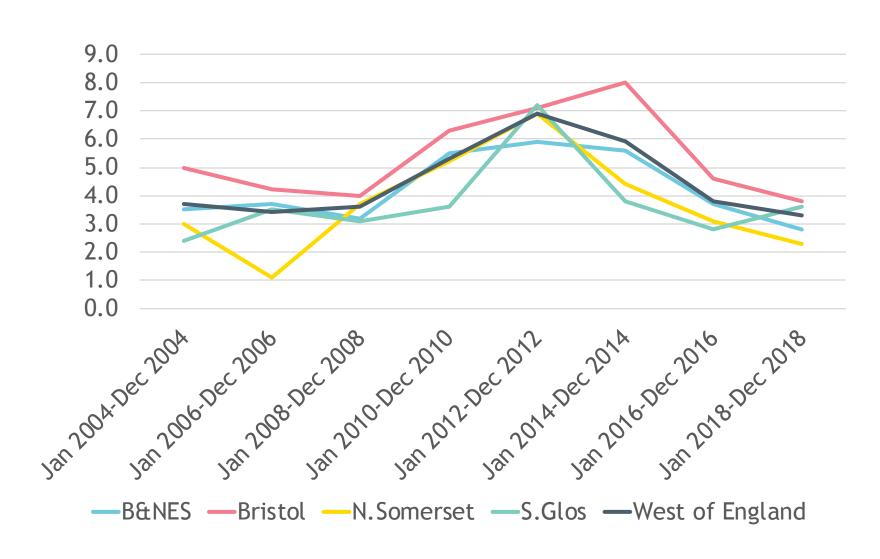
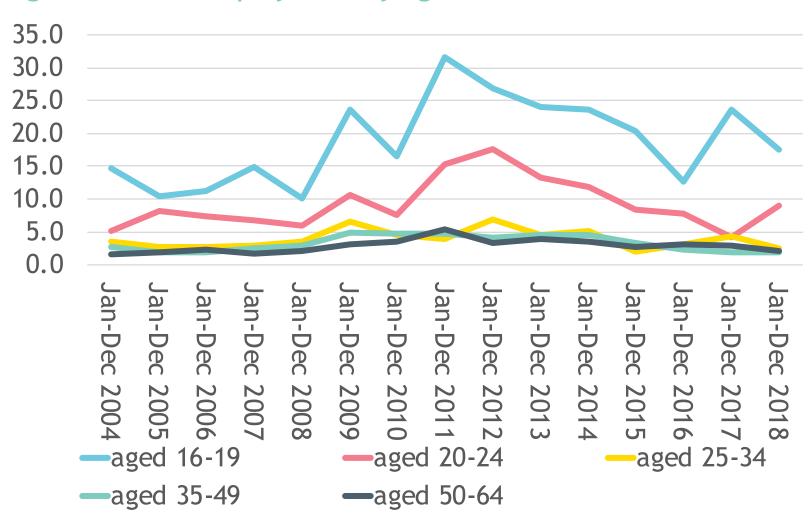




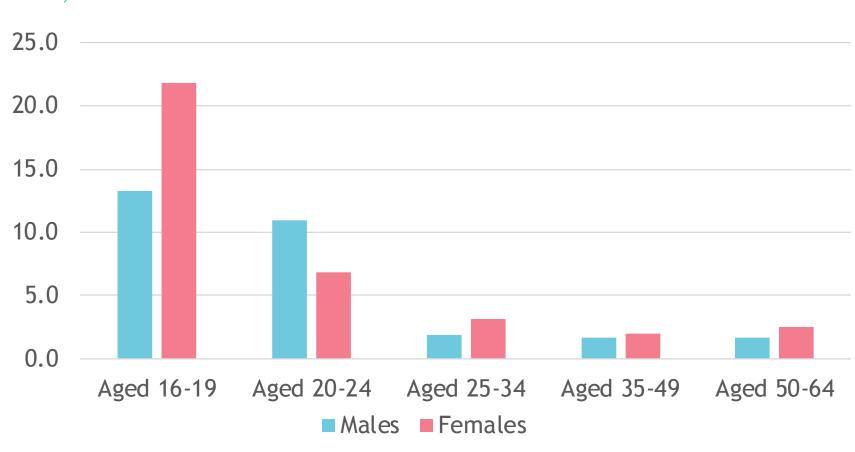
Figure 1.26: Unemployment by Age



The unemployment rate in the West of England is highest amongst the young - amongst the age cohorts 16-19 and 20-24, suggesting potential barriers to young people in accessing the labour market. The unemployment rate amongst these age cohorts has decreased since 2012/2013, which coincides with an increase in the compulsory age you need to stay in education and training. Across all age cohorts the unemployment rate for female is higher than

males; this is starkest amongst those aged 16-19. The exception being amongst the 20-24 cohort where the unemployment rate for males is higher than that of females.

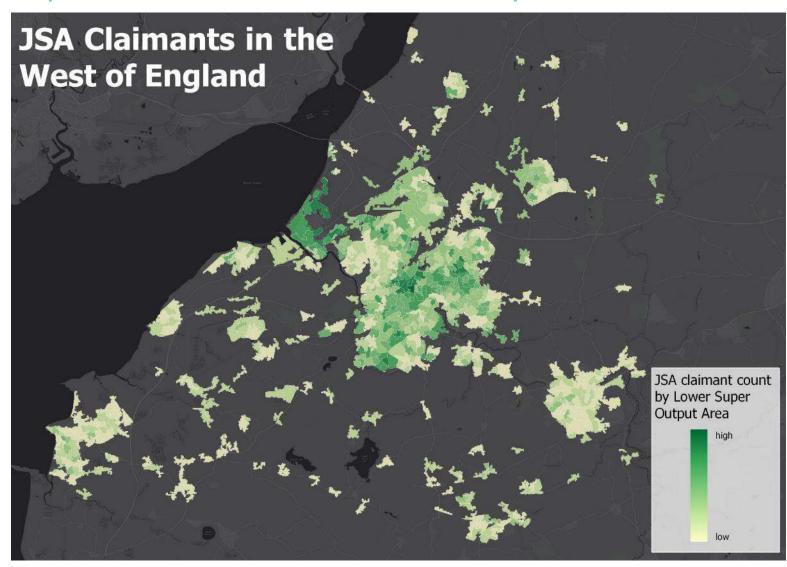
Figure 1.27: Unemployment Rate by age and gender (Jan-Dec 2018)



Whilst the unemployment rate is better than the England The unemployment rate is higher amongst 16-24 year olds, young men, disabled people, people from ethnic minority communities (pg 28), people with low skills levels, learning difficulties (pg 49) and people from Bristol.



Map 1.1: Distribution of JSA Claimants April 2019



As of April 2019 there were c.2,809 claiming job seekers allowance¹³; the geographical spread of these claimants varies but again there is some correlation between higher concentrations of claimants to areas of deprivation. There was an overall claimant count¹⁴ of 13,995 (this includes JSA plus those who claim Universal Credit and are required to seek work and be available for work).

Data from the 2017 Labour Force Survey suggests that there are 11,600 workless households with dependent children in the West of England; with a further 73,400 mixed households with dependent children. A mixed household is one at least one person aged 16 and over is in employment and at least one other is either unemployed or inactive¹⁵.



Economic Inactivity¹⁶

Economic Inactivity relates to those not in employment that have not been seeking work within the last 4 weeks and/or are unable to start work within the next 2 weeks. There are many reasons why someone may be economically active be it health related, or due to study/early retirement etc consequently a number of people who are deemed economically inactive may not wish to go into work. However, a proportion of those economically inactive may want a job but are encountering barriers to doing so; understanding these causes is fundamental in assisting people overcome the barriers they are faced with.

Table 1.4: Economic Inactivity (Jan-Dec 2018)

	Economic Inactivity Rate -aged 16+	Economic Inactivity Rate - aged 16 - 64
B&NES	34.5	17.7
Bristol	30.6	19.8
North Somerset	38.4	17.4
South Gloucestershire	33.5	15.8
West of England	33.4	18.1

In the 12 months to December 2018 there were c. 312,300 people aged 16+ who were economically inactive in the West of England - 33.4%. 133,000 of these are of working age 16-64; the economic inactivity rate of the working age population is 18.1%.

The highest rates of economic inactivity are amongst those of retirement age; and amongst the young (16-24) where people are more likely to be studying. There are also more females than males who are economically inactive (Figure 1.29)

Figure 1.28: Economic Inactivity by age

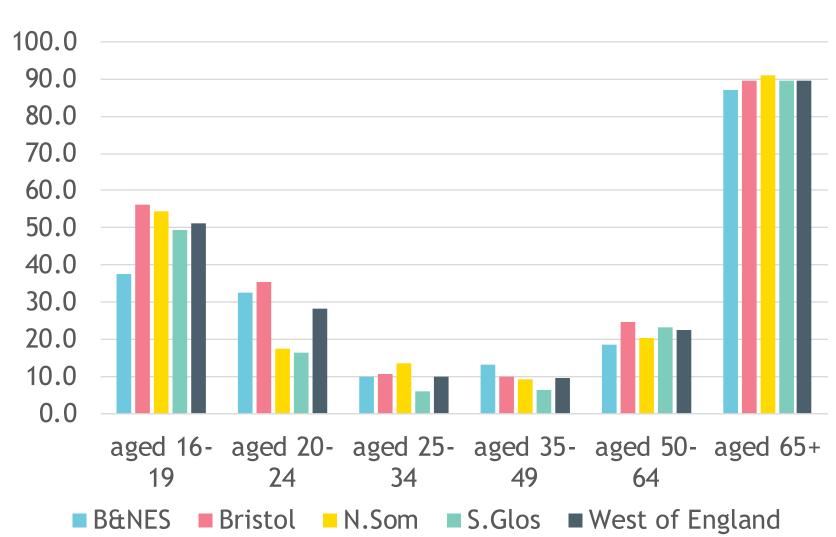


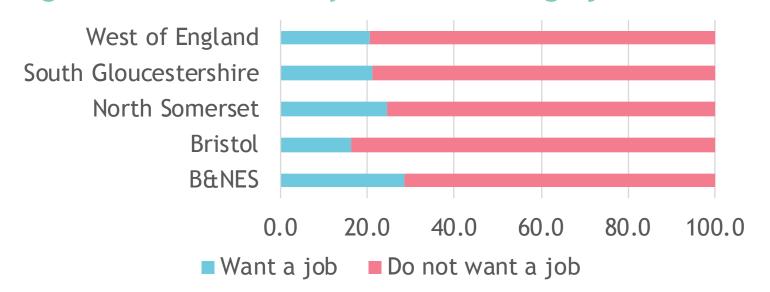


Figure 1.29: Economic Inactivity by Gender



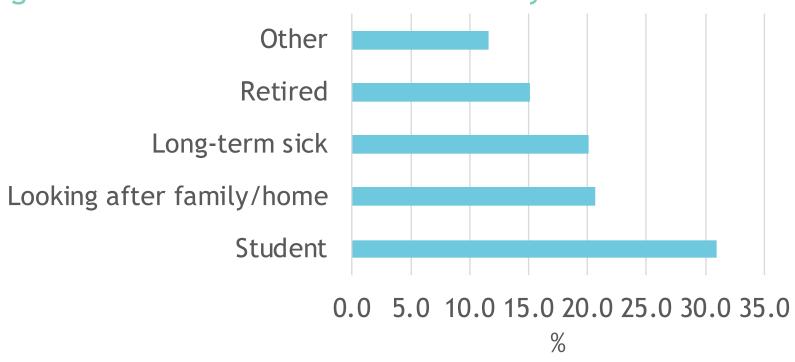
Of those who are economically inactive in the West of England c. 27,300 people (20.5%) want a job. The number of economically inactive wanting a job varies by unitary authority - from 28.6% in B&NES to 16.2% in Bristol.

Figure 1.30: Economically Inactive wanting a job



There are numerous reasons why someone may be economically inactive. In the year to Dec 2018 being a student was the main reason cited for economic inactivity across the West of England accounting for 31% of those surveyed; this was followed by looking after the family/home (20.6%) and those on long term sick (20.1).

Figure 1.31: Reasons for Economic Inactivity

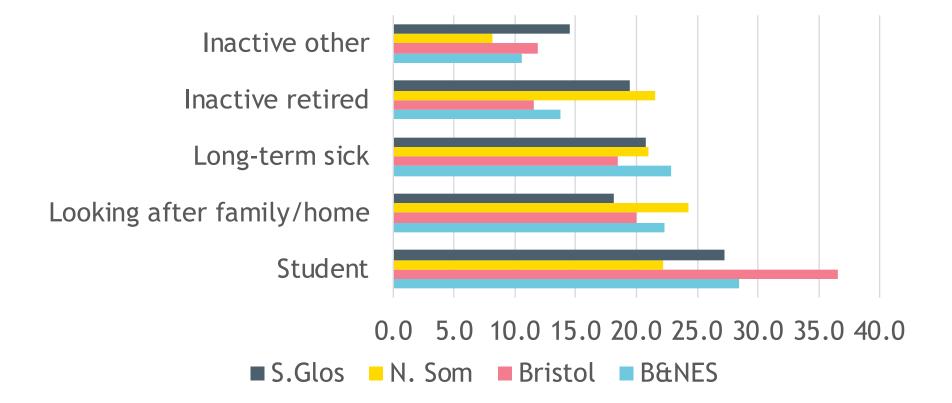


There are marked differences between gender in terms of the reasons given for economic inactivity; for instance 31.7% of economically inactive females cite looking after family/home as the reason; compared to 6.3% of males. Whilst 41.4% of males cite being a student as the reason for inactivity compared to 23.1% of females.



Across B&NES, Bristol and South Gloucestershire the most cited reason for Economic inactivity is being a student - this cohort is likely to move into employment over time; and the geographical concentrations co-inside with the location of the four universities in the region. In North Somerset the most cited reason is looking after the family /home; however, there are also significant cohorts citing this reason in B&NES and Bristol. Economic Inactivity due to long-term sickness is also an issue across all four authorities

Figure 1.32: Economic Inactivity by Reason and by UA

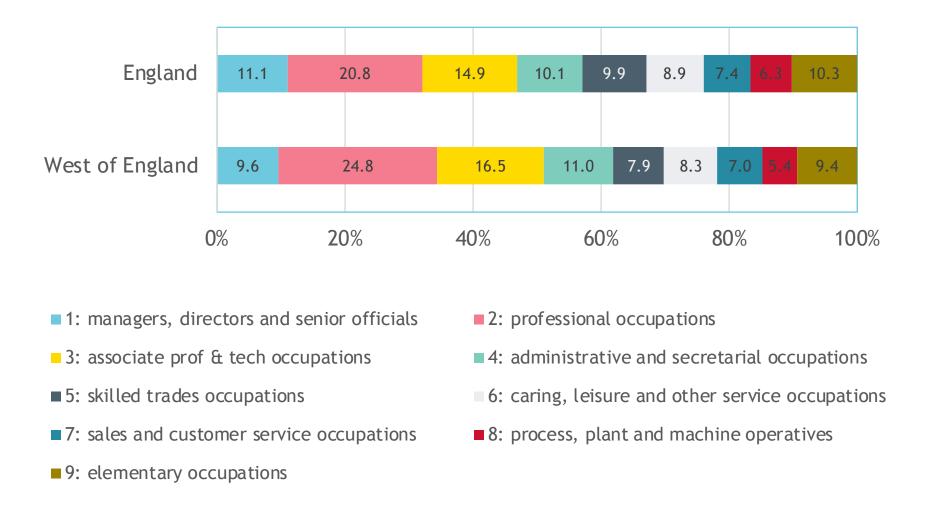




Occupational Profile¹⁷

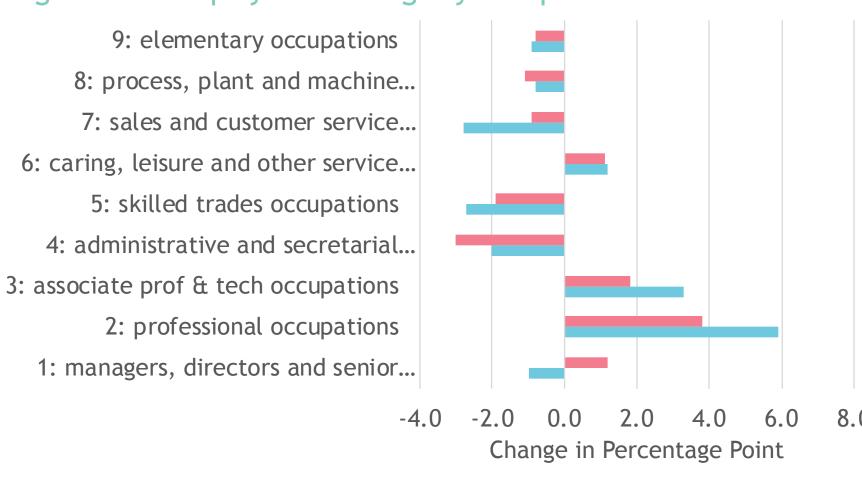
Nearly 25% of people in employment within the West of England are employed within 'professional occupations, followed 16.5% in 'associate professional and technical occupations'. The West of England has a higher proportion of people employed in these higher level occupations than England as a whole.

Figure 1.33: Employment by Occupation, Jan 2018-Dec 2018



The West of England has mirrored national trends in terms of occupational growth and decline; demonstrating strong growth in higher skills occupations and a decline in lower skilled occupations. The main exception to the trend being that the West of England has seen a decline in the percentage of people employed as 'managers, directors and senior officials'; however the regional picture masks local variations with B&NES and North Somerset both seeing an increase in the percentage of people employed as 'managers, directors and senior officials'.

Figure 1.34: Employment Change by Occupation 2004 - 2018

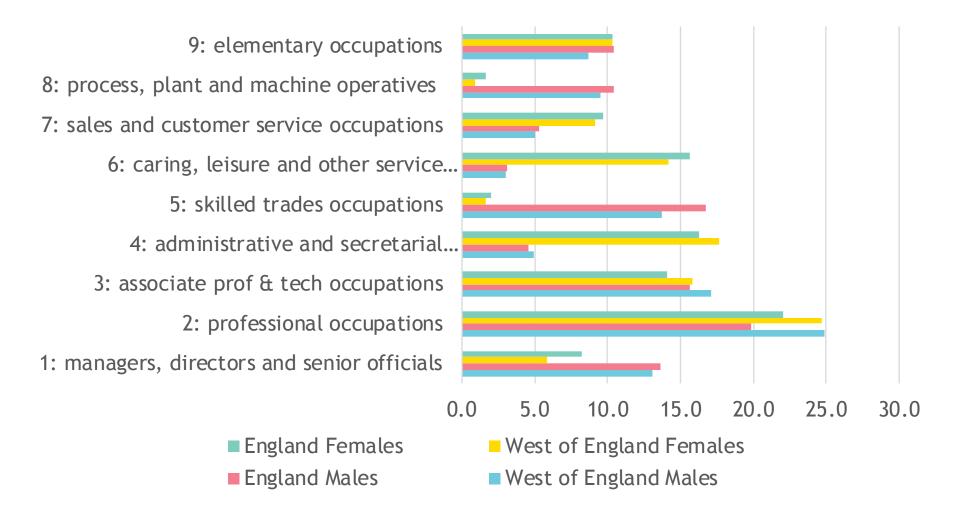


■ England
■ West of England



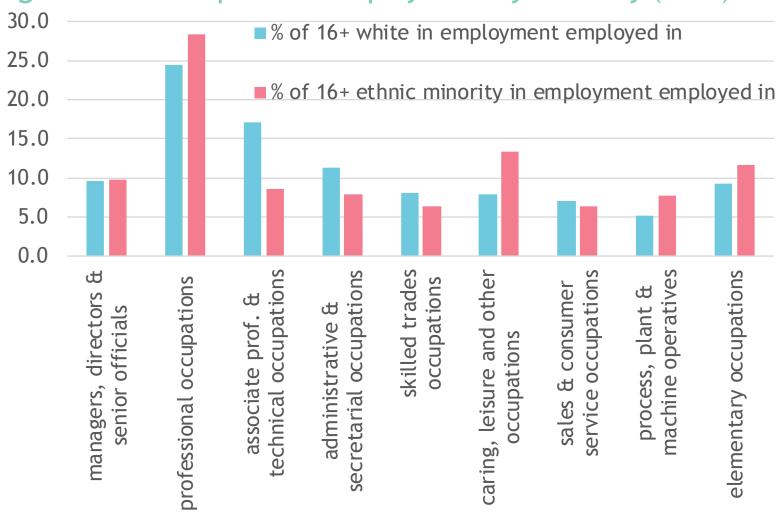
The West of England broadly follows national trends in relation to gender representation within certain occupations; although females in the West of England seem to be under represented in 'management, director and senior official roles'; although there is a higher proportion of females in 'professional occupations'. There are clear occupations where there is a strong gender bias, for instance 'skilled trades' and 'process plant and machine operatives' are very male focused occupations; whilst 'administrative' and 'care and leisure' occupations are more female orientated.

Figure 1.35: % in Employment by Occupation: Gender (2018)



There are also different occupational profiles by ethnicity with fewer people from ethnic minorities employed in 'associate professional and technical' occupations and more in 'caring, leisure and other occupations'

Figure 1.36: Occupational Employment by Ethnicity (2018)

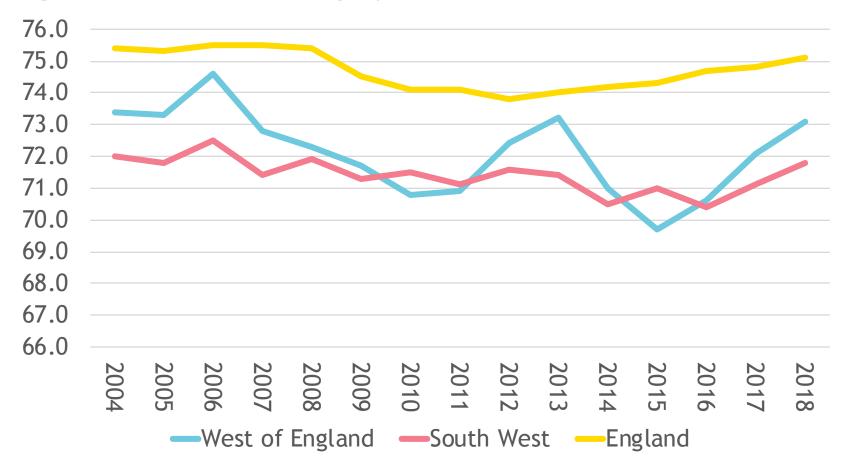




Nature of Employment¹⁸

In the 12 months to December 2018 full time employment in the West of England stood at 73.1%; this is lower than that of England (75.1%) but higher than the South West (71.8).

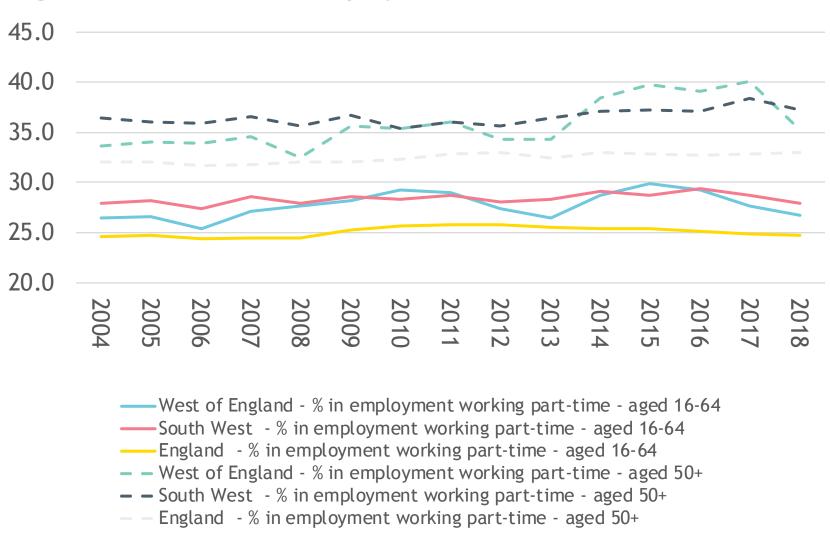
Figure 1.37: Full Time Employment 2004-2018



Part time employment in the West of England fluctuates, this potentially reflects a smaller sample size but also mirrors periods of economic stress; with part time work increasing following the 2008 economic crisis. Part time work in the West of England has

increased the most amongst the over 50s, although this has seemingly seen a decline between 2017 and 2018.

Figure 1.38: Part Time Employment 2004-2018

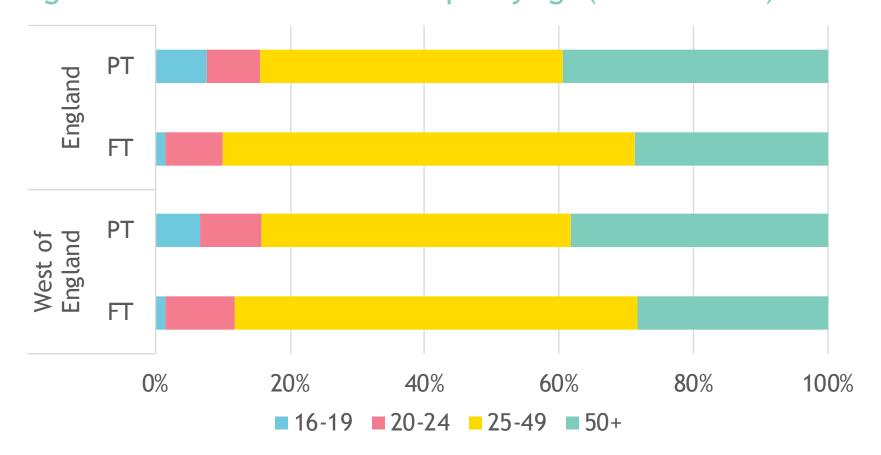


Whilst part time working provides flexibility which suits some workers others may find that they can only find part time work which tends to be lower paid and in lower paid sectors.



The West of England follows national trends between full time and part time employment by age. Part time employment is most prevalent amongst the over 50's - whilst this could be due to a personal decision to reduce hours there could be other factors driving this trend including ageism in the work place, caring responsibilities or ill health.

Figure 1.39: Full Time Part Time Split by Age (Jan-Dec 2018)



73.1% of people work full time, compared to 75.1% in England. Full time working is lowest in B&NES and North Somerset. It is

particularly low amongst women (55.9%) and in particular older women (46.9%)

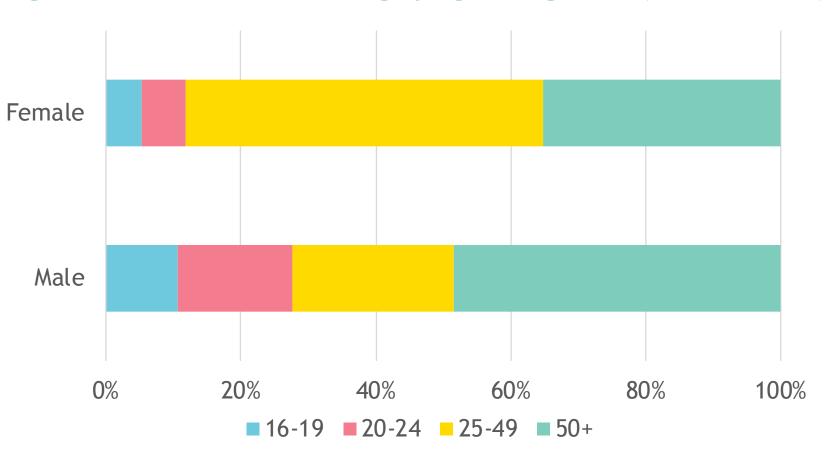
Figure 1.40: Full Time Employment by gender



The pattern for part time employment varies by age between males and females. More females tend to work part time between the ages of 25-49 - this correlates with the age most females choose to start a family. Whilst again the decision to work part time could be due to personal choice it could also be an indication of a lack of flexibility in employment around childcare options. Conversely, more males over the age of 50 work part time.



Figure 1.41: Part Time working by age and gender (Jan-Dec 2018)

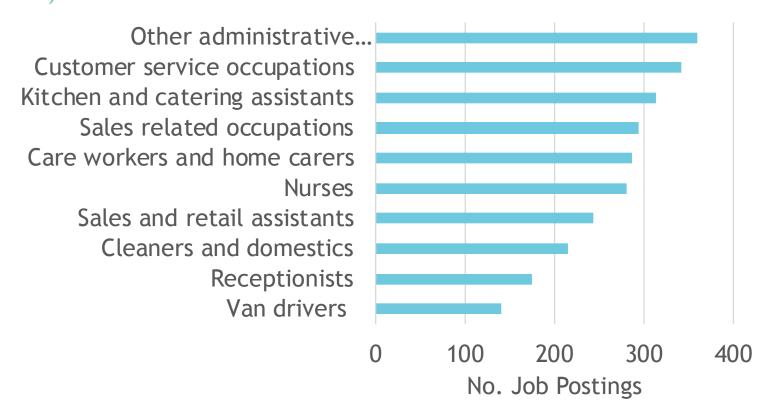


In 2018 there were approximately 6,900 job postings for part time employment in the West of England. With the exception of nurses and care home workers part time employment seems to be in occupations which require lower level skills and therefore tend to be lower paid.

5.6% of those in employment are in non-permanent employment; compared to 4.6% nationally. B&NES and South Gloucestershire have particularly high rates of non-permanent employment at 6.5% and 6.2%. Whilst there are some sectors which require a portfolio approach to employment which could have contributed to this

increase e.g. the Creative Industries; this increase could also be in low paid work.

Figure 1.42: Top 10 occupations providing part time employment (2018)¹⁹





Earnings²⁰

The average median hourly earnings for full-time workers is higher in the West of England than England as a whole.

Figure 1.43: Hourly Pay (Excluding Overtime)



The median hourly earnings for all employee jobs was higher than the national average (£12.78) in BANES (£13.17), City of Bristol (£13.29) and North Somerset (£13.06). Only South Gloucestershire

had a lower hourly median (£12.72).

Hourly pay is higher for men than woman across all the unitary authorities for full-time employees based on both residency and workplace medians (as shown in figure 1.44 and 1.45).

Residence earnings are highest in BANES for both Male (£16.46) and Female (£14.26) full time workers.

Workplace earnings are highest in South Gloucestershire (£16.59) for Male Full time workers and in Bristol (£14.01) for Female full-time workers.

Figure 1.44: Full Time Median Hourly Pay by Residency

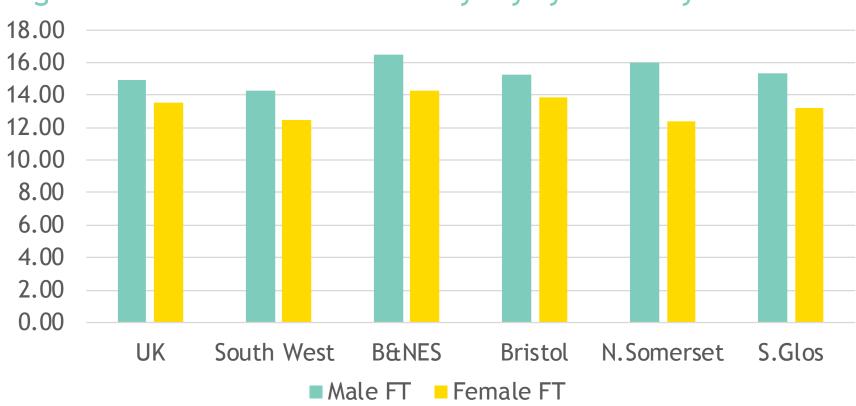
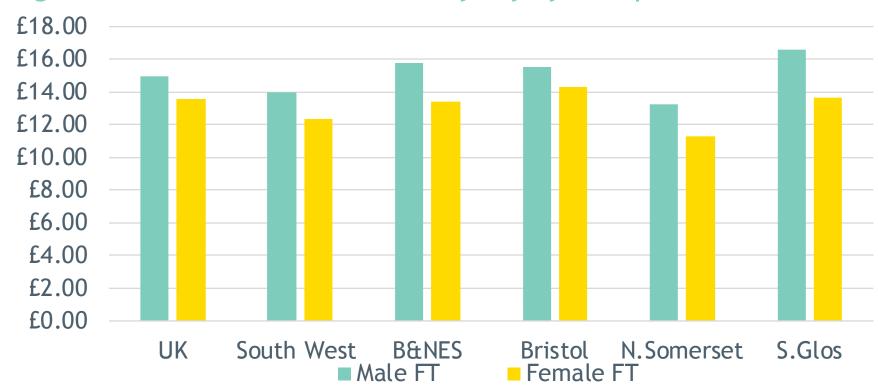




Figure 1.45: Full Time Median Hourly Pay by Workplace



Median Hourly Earnings (part-time)

Hourly pay for part-time workers (by workplace) is higher for women than men in all the unitarity authorities apart from South Gloucestershire where men earn more.

Workplace earnings are highest for part-time earners in Bristol (Male:£10.06; Female: £10.50) and Residency earnings are highest for part-time earners in North Somerset (Male:£9.83; Female: £9.89).

Female part-time residency workers earn more than the national average (£9.45) in all Unitary Authorities. Female part-time workplace workers earn more than the national average in all unitary authorities bar South Gloucestershire.

Male part-time resident workers earn more than the national average (£9.07) in all Unitary Authorities bar South Gloucestershire. Male part-time workplace workers earn more than the national average in all unitary authorities.

Figure 1.46: Part Time Median Hourly Pay by Residency

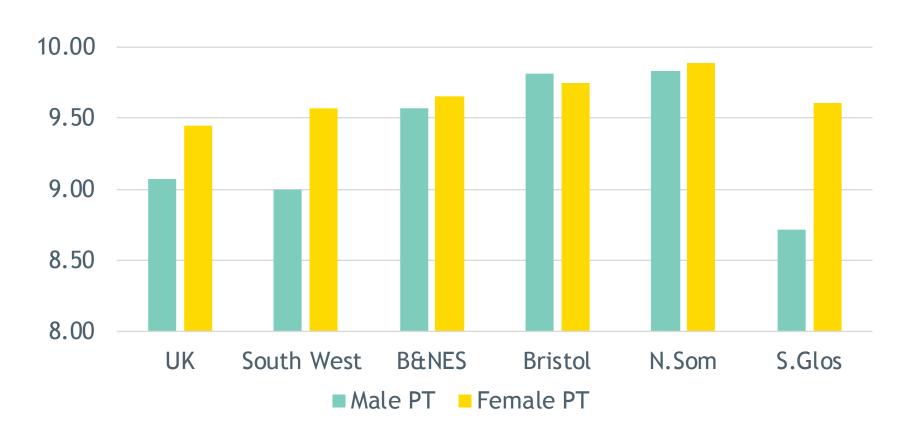
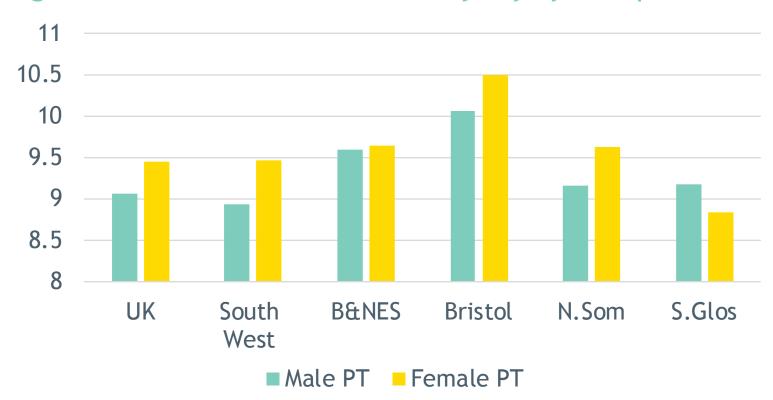




Figure 1.47: Part Time Median Hourly Pay by Workplace



Gender Pay Gap ²¹

Gender pay gap defined as the difference between men's and women's hourly earnings as a percentage of men's earnings.

South Gloucestershire and North Somerset have the highest pay gap for full-time workers (16.2%). Bristol is the only UA to have a pay gap(8.5%) for full-time workers lower than the United Kingdom (8.6%).

South Gloucestershire also has the highest pay gap for part-time workers (5.9%). Part-time earners see a negative pay gap in Bristol

(-4.1%) and North Somerset (-2.2%), that is that women have a higher median weekly earnings than men.

Figure 1.48: % Pay Gap (Workplace)



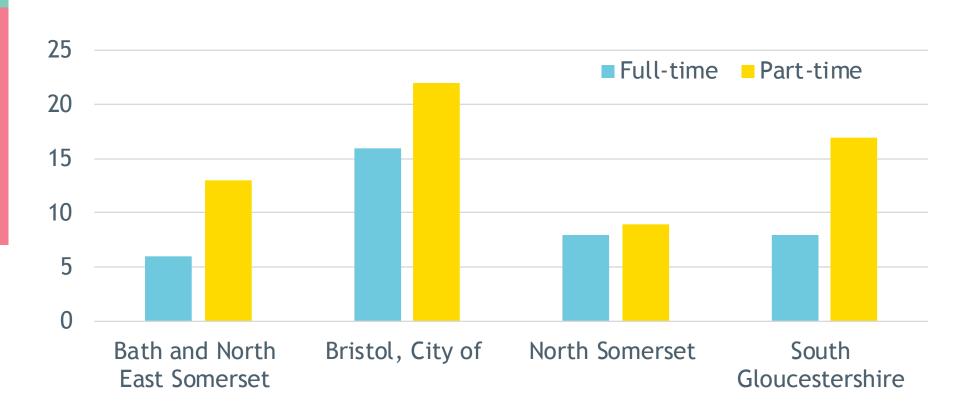


Below the living wage foundations 'real Living Wage' 22

The real Living Wage is a UK wage rate that is voluntarily paid by over 5,000 UK businesses. For April 17-April 18 the real Living Wage (£8.75) as defined by the <u>living wage foundation</u> was higher than the government minimum (£7.50.)

Across the West of England there were c 100,000 jobs that paid below the Living Wage as defined by the Living Wage Foundation. The majority of these jobs were part-time and a high proportion were in the City of Bristol.

Figure 1.49: Number of Jobs (thousands) below the Living Wage as defined by the Living Wage Foundation (2018)



The percentage of workers earning below the real Living Wage is much greater for part-time workers, as shown in figure 1.50. This is greatest in South Gloucestershire where 48.6% of part-time workers earn below the real Living Wage. North Somerset has the largest proportion of Full-time workers earning below the real Living wage (17.6%).

Figure 1.50: Percentage of Workers earning below the Living Wage as defined by the Living Wage Foundation (2018)





Links between low productivity, low pay and in-work poverty

Research by the Joseph Rowntree Foundation (JRF) states:

Fixing the UK's productivity problem requires action for the lagging parts of the economy. It states how we need to make sure the interventions we design to push up productivity are ones that benefit workers, otherwise there is no guarantee that raising productivity will help create an economy that works for all.

Improving pay in labour-intensive, low-wage sectors is vital to creating an economy that works for all. Low-wage sectors together account for 38% of hours worked in the economy, but only 23% of total value-added, as they also tend to be low-productivity sectors.

Retail and hospitality are especially important. They are large employment sectors with a high incidence of low pay. 46% of workers in retail and 59% of workers in hospitality are on low pay. Around a third of workers in poverty work in these two sectors alone (Sissons et al, 2017).

Low pay has become the norm rather a stepping stone to well-paid work and economic security: five out of six workers fail to escape low paid jobs over a ten year period.

The research states that to raise productivity and drive up pay, productivity strategies for low-wage sectors such as retail and hospitality should focus on:

- •increasing the proportion of workers in on-the-job training
- •improving management practices
- increasing the percentage of workers using ICT
- •and reducing the share of temporary workers

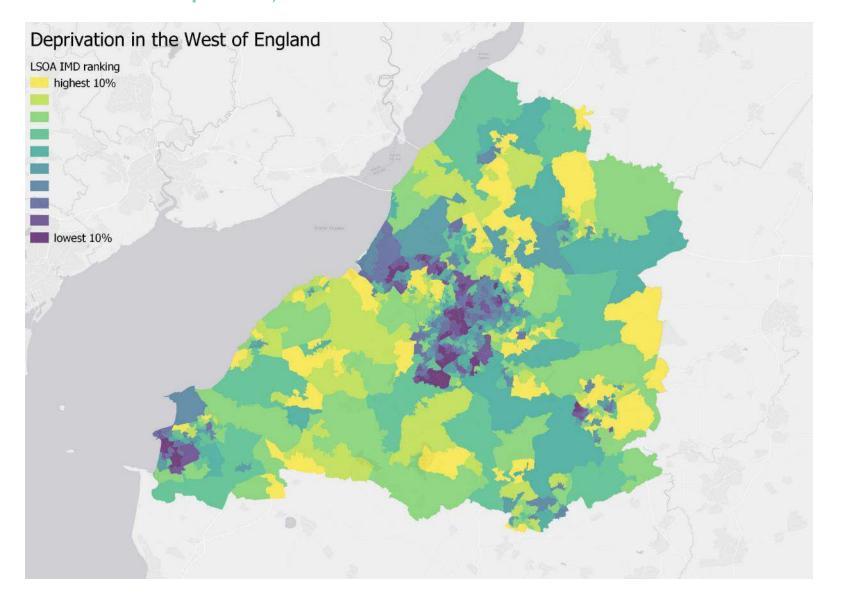
For the full report please click here.



Indices of Multiple Deprivation²³

The index of multiple deprivation provides statistics on relative deprivation on small level geographies (LSOAs); looking at a variety of indicators across seven domains these are income; employment; education, skills and training; health and disability; crimes; barriers to housing and services; and living environment.

Map 1.2: Index of Multiple Deprivation Deciles (1 is most deprived 10 is least deprived)



Deprivation varies across the region, with pockets of deprivation (LSOAs in the bottom 10%) in Bristol and North Somerset. Out of 678 LSOAs in the West of England 52 are in the 10% most deprived in the country; 42 are in Bristol (16% of LSOAs), 9 in North Somerset (6.7% of LSOAs) and 1 in B&NES (1% of LSOAs). A further 44 LSOAs fall within the bottom 20 most deprived. Overall, local authorities are also ranked from the most deprived to the least deprived. On this basis, Bristol falls into the lower quartile of local authorities, N. Somerset, the 3rd quartile and S. Gloucestershire and B&NES fall into the top quartile (i.e. least deprived authorities).

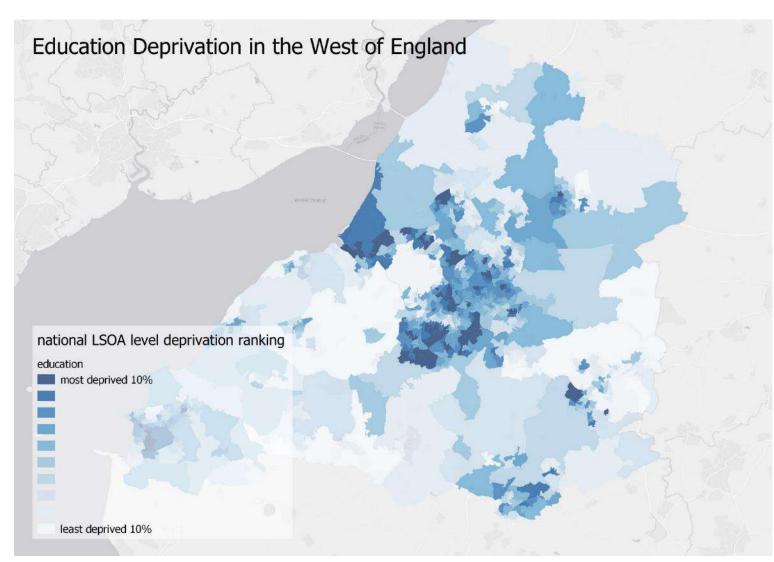
Education, training and skills deprivation

This domain measures the lack of attainment and skills in the local population. The indicators fall into two sub-domains: one relating to children and young people and one relating to adult skills.

It is within this domain that the West of England has the most LSOAs fall within the 10% most deprive. A total of 68 LSOAs fall within the 10% most deprived 53 of which are in Bristol, 6 B&NES; 6 North Somerset; and 4 in South Gloucestershire. This domain also highlights a significant amount of polarisation between the most and least deprived within Bristol.



Map 1.3: Education, training and skills deprivation

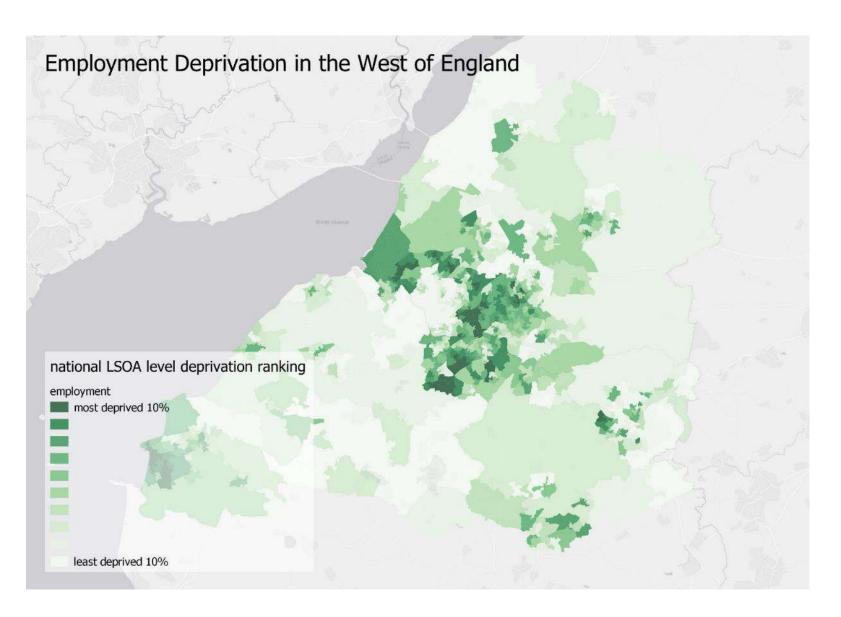


Employment Deprivation

The Employment Deprivation Domain measures the proportion of the working-age population in an area involuntarily excluded from the labour market. This includes people who would like to work but are unable to do so due to unemployment, sickness or disability, or caring responsibilities. Across the West of England there

are 55 LSOAs which are in the most 10% deprived- 40 of these are within Bristol.

Map 1.4: Employment Deprivation





Health and Wellbeing²⁴

Health and wellbeing outcomes are variable between and within the authorities that make up the West of England. Ill health or poor mental wellbeing can present barriers to an individual having a negative impact on their ability to work or participate in education and training. Public Health England have produced a series of health profiles which provide an overview of the people's health by UA. The health profiles for the four authorities in the West of England are available to view here.

Table 1.5: Summary of Health Indicators

	B&NES	Bristol	North Som	South Glos
No. of indicators above average	19	6	12	18
No. of indicators not significantly different to England	6	10	15	9
No. of indicators worse than England	4	13	2	2

Out of 29 indicators both B&NES and South Gloucestershire perform generally better than the England Average.

Whilst that of Bristol and North Somerset is varied compared to the England Average.

Health Inequalities

There are stark variations in the life expectancy between the least and most deprived areas within and between the authorities that make up the West of England. The largest disparities in life expectancy in all authorities is amongst males with a gap of nearly 10 years between the least and most deprived in North Somerset and 6 yrs in South Gloucestershire. The gap in life expectancy for both males and females is starkest in North Somerset and Bristol.

Table 1.6: Life Expectancy Gap

	Life Expectancy Gaps Males	Life Expectancy Gaps Females
B&NES	7.3yrs	3.7yrs
Bristol	9.5yrs	7.4yrs
North Somerset	9.9yrs	7.9yrs
South Gloucestershire	6.2yrs	5.1yrs



In the 12 months to December 2018 there were c. 322,000 (34.5%) aged 16+ in the West of England . 56.7% of people with a health condition or illness lasting more than 12 months are in employment; compared to 68.4% of those without. The West of England have a higher proportion of those with a long term illness than that of England (46.2%); however those with long term health conditions are more likely to be unemployed or economically inactive than their peers²⁵.

Figure 1.51: % with health conditions or illnesses lasting more than 12 months (aged 16+) (Jan-Dec 2018)

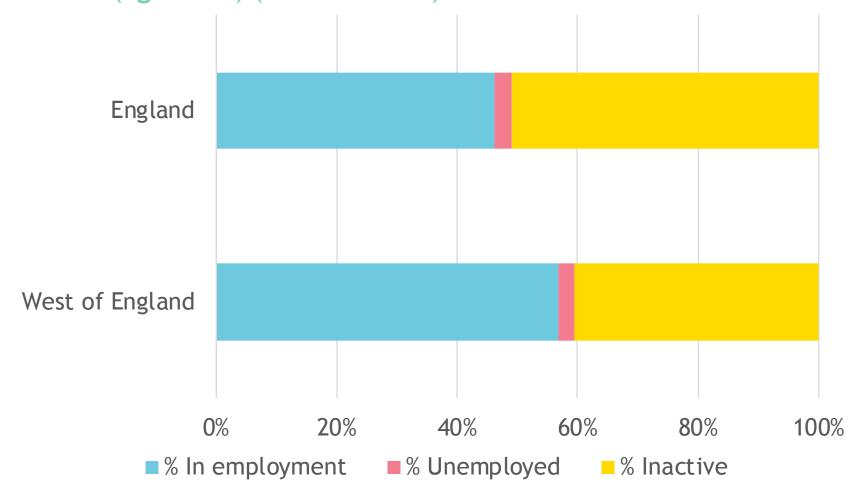
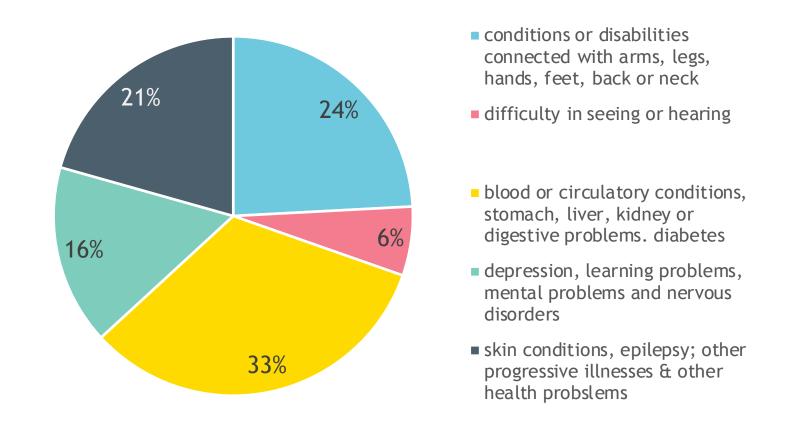


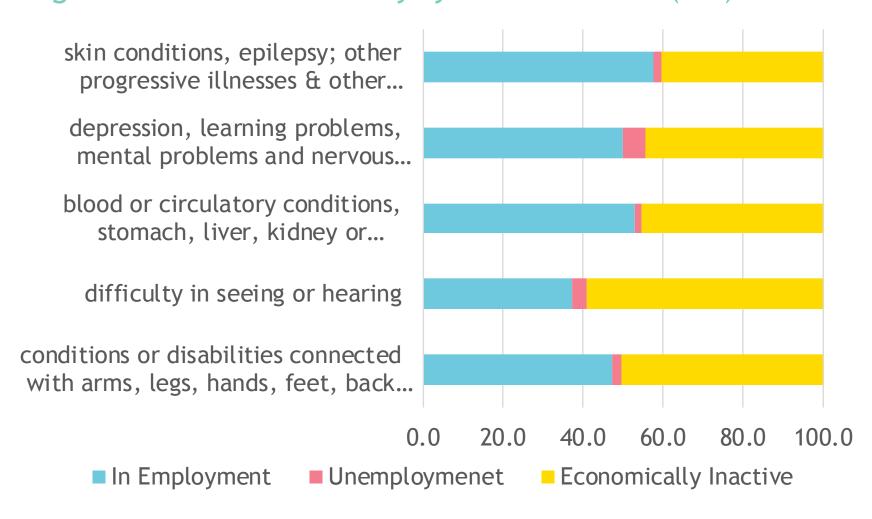
Figure 1.52: Health Condition by Type in the West of England



The most prevalent health condition reported in the West of England affecting c.167,400 people is blood or circulatory conditions, stomach, liver, kidney or digestive problems, diabetes (33%) followed by muscoskeletal conditions which affects c. 123,300 (24%). Amongst these health conditions you are more likely to be economically inactive if you have difficulty in seeing or hearing; whereas you are more likely to be unemployed if you have depression, learning problems, mental problems and nervous disorders.



Figure 1.53: Economic Activity by health condition (16+)



Research by Public Health England highlights that 24% of sickness absences caused by musculoskeletal conditions and 11% by mental health issues, including work-related stress, there research shows that improving the health of the workforce can improve productivity and reduce staff turnover²⁶.

Carers Allowance²⁷

Carers allowance is a benefit claim given to those who care for someone for at least 35 hours a week. Being a full time career can limit the amount of time someone can undertake payed work impacting on their personal income. In the 3 months to August 2018 there were over 11,000 individuals claiming carers allowance in the West of England; unsurprisingly half of these were in Bristol the principle urban area of the region.

Table 1.54: All Persons Claiming Carers Allowance - quarter to Aug 2018

	Total				
	Males	Females	All		
B&NES	320	1,134	1,454		
Bristol	1,443	4,034	5,477		
North Somerset	546	1,447	1,995		
South Gloucestershire	482	1,959	2,442		
West of England	2,791	8,574	11,368		
South West	15,499	44,443	59,942		
England	195,248	536,812	732,057		

N.B Statistical disclosure control has been applied to this table to avoid the release of confidential data. Totals may not sum due to the disclosure control applied.



Across all four authorities significantly more females than males; of those claiming for carers allowance in the West of England 75% were female. The vast majority of claimant's for this period, c.98% are of working age.



Planning and the Environment

The West of England is a highly attractive place for people to live, work and study. The diverse and buoyant economy means that there are plenty of employment opportunities in the region; and the four universities provide a diverse offer of courses to students. However, this success puts pressure on the built and natural environment which if left unaddressed will start to undermine what make the region attractive in the first place.

It is also important that the built and natural environment work for the indigenous population, not just those who move to the area to access employment and education.

Housing Affordability²⁸

Average house prices across the West of England have risen significantly since 2011, increasing by 58%. Of the four unitary authorities Bristol saw the largest increase with average house prices rising by 68%. As of 2017 average house prices in the West of England are 9.3 times average annual pay. This varies greatly across the region with average house price being 11 time annual resident earnings in B&NES; this extends to 20.8 times for the lowest 10% of earners.

Table 1.7: Average House Prices / Affordability Ratios (2017)

	Average House Prices (2017)	Median Annual Pay - Gross (2017)	Ratio	Median Annual Pay 10 percentile - Gross	Ratio
B&NES	326,799	29,722	11.0	45 (05	20.8
Bristol	267,949	27,980	9.6	16,605	16.1
N.Somerset	249,744	30,514	8.2	15,626	16.0
S.Gloucestershire	264,805	30,236	8.8	17,500	15.1
West of England	272,632	29,299	9.3	16,557	16.5

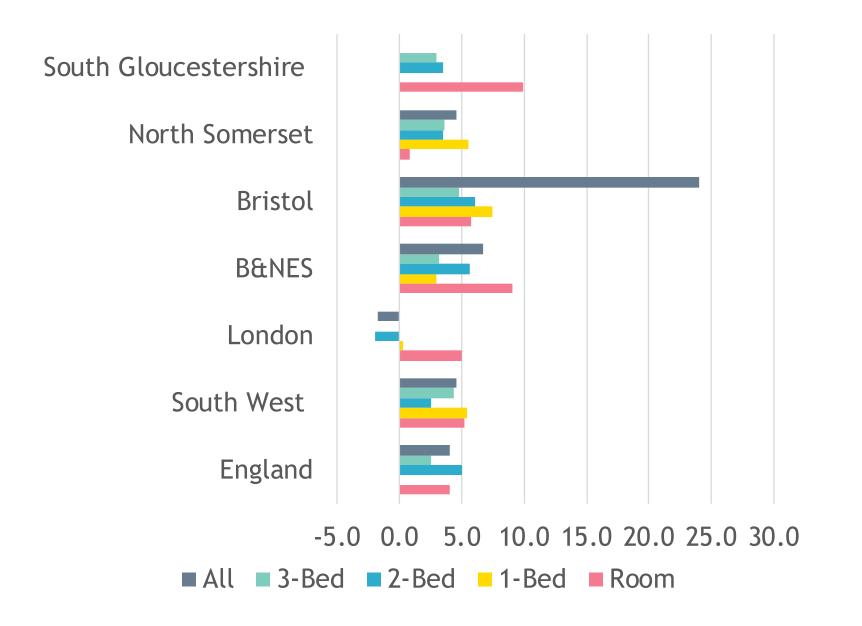
Private Rental Market²⁹

Rising rents are becoming a significant issue across the West of England; with rent accounting for a higher % of annual pay in B&NES & Bristol across all categories of housing than the rest of the South West and England. Rising rents are a particular issue for Bristol; there has been a substantial increase of 24% in rents amongst the lower quartile over a two year period.

Median rents for a single room have significantly increased across the West of England with the exception of North Somerset. Whilst median rents across England and London have declined; they have increased across the West of England.



Figure 1.55: % Change in Lower Quartile Rents 2015/16 - 2017/18³⁰



Areas with good connections to London such as B&NES, Bristol, Cambridgeshire, Reading and Oxford all have mean monthly rents above that of England across all rental types.

B&NES, Bristol and S Gloucestershire all have a mean monthly rents for a room in a shared house higher than the England mean. This is particularly high in B&NES. Shared housing is popular amongst students and young workers who are just entering into employment.

Table 1.8: Mean Monthly Rents

	Mean Monthly Rents 2017/18				Median	Mean	
	Room	1-Bed	2-Bed	3-Bed	All	Monthly Pay -Gross (£) *	Monthly Rent (all) as % of Monthly Pay
ENGLAND	401	707	772	881	829	2,424	34
SOUTH WEST	412	588	729	881	795	2,294	35
LONDON	629	1,294	1,588	1,990	1,605	Inner 3,011 Outer 2,808	Inner 53 Outer 57
B&NES	470	789	1,007	1,224	1,235	2,477	50
Bristol	430	797	1,036	1,253	1,085	2,332	47
N Somerset	412	530	673	844	730	2,543	29
S Gloucestershire	458	650	805	979	930	2,520	37
Greater Manchester	398	570	627	734	667	2,189	30
Merseyside	343	439	539	618	524	2,213	24
West Midlands	363	537	644	698	644	2,192	29
Cambridgeshire	533	751	895	1,037	964	2,558	38
Reading UA	482	833	1,061	1,217	1,020	2,686	38
Oxfordshire	535	825	995	1,223	1,158	2,748	42



Transport³¹

Work on the Joint Local Transport Plan 4 (JLTP4) has identified a number of key challenges that the region needs to address to ensure that transport in the region is accessible, affordable, and connects people and places.

The main challenges can be summarised as follows:

- Travel demand is growing, and there is an increased need to improve walking, cycling and public transport.
- For some people the private car is the only realistic mode of travel.
- Parts of road and rail networks are under strain.
- There are high levels of inequality in the West of England, and many different accessibility needs.
- Transport continues to impact on safety, security, air quality, public health and public realm.
- There is a need to manage emerging technology and

innovation.

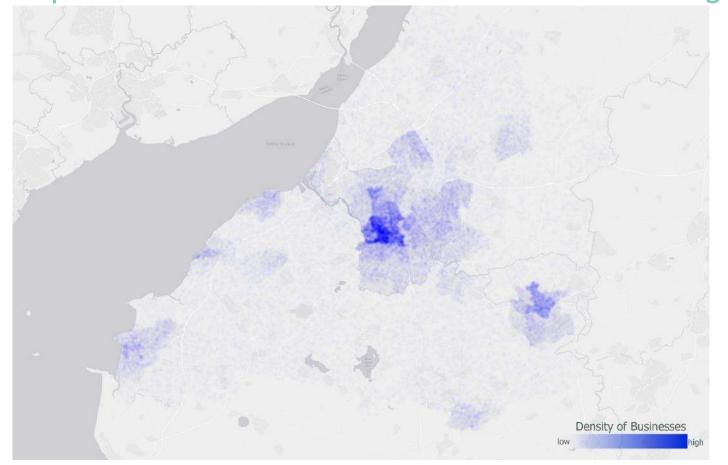
Transport funding has been constrained over recent years, and funding levels have not been high enough to the scale of growth in the region



Major Employment Centres³²

There is a wide range of employment opportunities offered across the West of England; with concentrations in the economic centres of Bristol and Bath and within the major towns across the region. There is also significant economic activity in the North Fringe of Bristol - primarily connected to aerospace, advanced engineering, professional services and activities connected to the Ministry of Defence. Substantial concentrations of employment can also be found in Avonmouth/Severnside primarily focused on logistics and distribution associated to Bristol Port; and in North Somerset associated with Bristol Airport.

Map 1.5: Concentration of Businesses in the West of England



The Joint Spatial Plan supports the delivery of 82,500 new jobs (by 2036); Development in the following key strategic employment locations will ensure the continued economic growth of the West of England. The locations include:

Existing city and strategic town centres

- Bristol City Centre
- Bath City Centre, and
- Weston-super-Mare Town Centre

Enterprise Zones and Areas

- Temple Quarter Enterprise Zone
- Avonmouth /Severnside Enterprise Area
- Filton Enterprise Area
 Emersons Green Enterprise Area
- Bath Riverside Enterprise Zone
- Somer Valley Enterprise Zone
- Junction 21 Enterprise Area, Weston-super-Mare

Key strategic infrastructure employment locations

- Bristol Port,
- Bristol Airport,
- Oldbury Power Station new nuclear build.



DEMAND FOR SKILLS

SECTION 2

WEST OF ENGLAND Combined Authority

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KEY MESSAGES

Demand for Skills

• Demand for higher level skills is growing. As of 2017 there were c.604,000 people in employment in the West of England an increase of c21,000 since 2015. Those sectors that have grown since 2004 require higher level skills than the sectors which have declined; however those sectors which require lower and middle level skills remain large employers within the region and also suffer from skills gaps.

Current Demand for Skills

• Some sectors have grown and now make up a greater proportion of employment in 2018 than they did in 2004. These sectors were public admin, education and health; banking finance and insurance; other services and energy and water. These sectors also saw increases at the national level. Meanwhile, manufacturing and distribution, hotels and restaurants employed a smaller proportion of people in 2018 than in 2004.

- Health, education and public administration is the largest employing sector, at just over a third of the workforce. This is followed by banking, finance & insurance at 18% of employment, and distribution, hotels and restaurants at 16%. Health and education related jobs are in highest demand across the region. Human health activities were the top recruiting industry in 2018, followed by Education, Considering the size of the sector, the fact that these two industries are significant recruiters is unsurprising. The majority of these jobs are likely to be replacement jobs as a result of churn in staff rather than new; although a proportion of them will be new to meet increased demand on both health and education.
- Highest demand vacancies have remained the same over the past three years. The top 5 occupations advertised for the West of England have been the same for the last three years with Programmers and software development professionals being the most advertised post highlighting the growing demand for digital skills; followed by nurses and sales related occupations.



KEY MESSAGES

- Transport and communications; manufacturing and construction all employ a moderate number of people. They collectively account for 23% of the total workforce.
- Although a small sector, energy and water employs a high percentage of highly-skilled people. With 52% of employees being managers, directors, senior officials or in a professional occupation, this suggests higher level skills are required for large proportion of employment within this sector.

The region employs a higher proportion of people in services and business operations heavily reliant on professional knowledge than Great Britain. 55% of employment in the region is in so-called 'Knowledge Intensive Business Services', compared to 52% in Great Britain.

Innovation Skills

• The West of England benefits from an established innovation cluster, centred around growth in the high tech and digital sectors, cultural and creative industries, aerospace and advanced engineering and financial and business services. There are c.334,000 people employed

- in Knowledge Intensive Businesses and Services within the West of England accounting for 55% of employment.
- But, there is a lack of diversity among employees in this sector. Research also shows that the workforce in this knowledge intensive cluster lacks diversity, with women, ethnic minorities and disabled people under-represented, providing a clear opportunity to address the skills shortage highlighted.
- Apprenticeships are not being used across all sectors to their full potential. Whilst use of apprenticeships is a recognised route into the engineering sectors, they are less commonly used in the other areas, with low awareness and understanding of apprenticeships amongst employers, suggesting this is an opportunity for further development. The introduction of T-levels and an increasing focus on technical skills, also presents an opportunity to address the demand for technical skills.

WEST OF ENGLAND Combined Authority

KEY MESSAGES

Skills Shortage and Staff Proficiency

- The National Employer Skills Survey shows that employers in the West of England have more vacancies and find it harder to recruit than the national average, particularly for higher skilled occupations.
- Whilst 21% reported that they have staff not fully proficient (skills gaps) compared to 13% for England, 41% reported that they were under-utilising staff (compared to 34% for England), suggesting there is some mis-alignment of skills. However, whilst employers were more likely to be reporting skills shortages in higher and mid-skilled occupations, they were more likely to report skills gaps (lack of proficiency within existing workforce) in service and labour intensive occupations highlighting the need improve lower level skills amongst people in work as well as develop a pipeline of highly skilled people.
- Of businesses identifying a need for skills in the next 12 months, the skills needs included basic skills, digital skills, operational skills as well as complex analytical skills. Local survey data found that the top 5 most important skills needed within a business were: Communication, team working, customer service, problem solving and numeracy and analytical, although specific skills needs varied

by sector and role.

• Of those reporting skills gaps, 19% indicated that this had a major impact on their business. Whilst 74% have trained staff over the last 12 months (compared to 66% for England, only 39% had a budget for training. The most significant barriers to providing more training were staff time away (57%) and lack of funds/expense (51%).

Future Employment

Globalisation, technological progress and demographic change are having a profound impact on labour markets, affecting both the quantity and quality of jobs that are available, as well as how and by whom they are carried out.

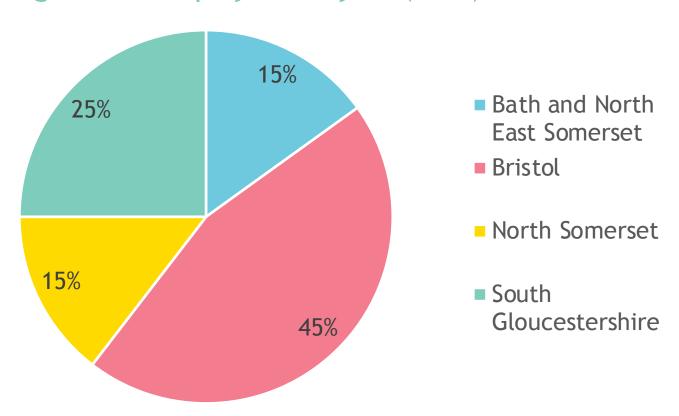
The risk of automation is real, nearly half of all jobs will be transformed with technology, with 14% of jobs completed automated and 32% changing significantly. However, whilst technological progress will make some occupations obsolete, it also creates new



Business Context³³

According to ONS Business Register and Employment Survey there were c 604,000 in employment in the West of England in 2017 an increase of c 21,000 since 2015. Bristol accounts for the largest proportion of employment accounting for 45%.

Figure 2.1: Employment by UA (2017)



Further information taken from the Annual Population Survey demonstrates that The West of England has a broad and diverse business base, with workers employed across a broad spectrum of sectors and industries. According to the annual population survey (Jan-Dec 2018) employment was concentrated in two broad areas: Public administration; education; & health accounting for 35% of employment; banking, Finance and Insurance (18%) and transport; accommodation and food accounting for 16%.

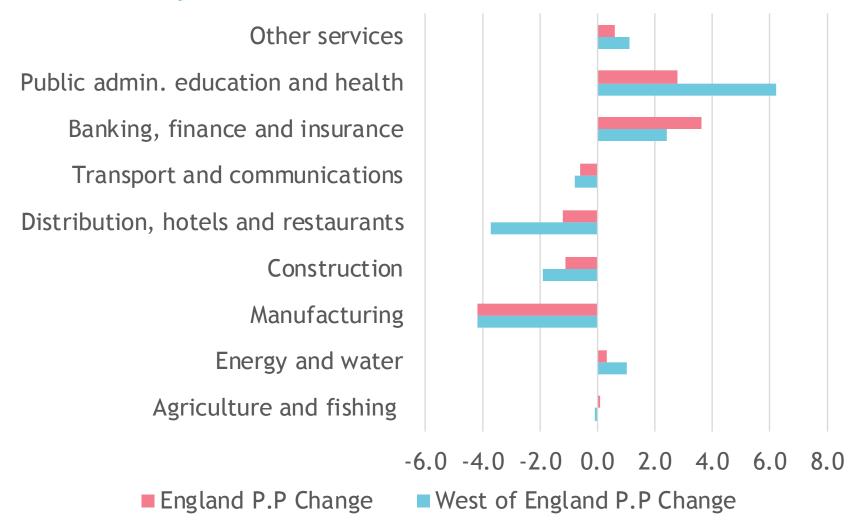
Figure 2.2: Employment by Broad Sector in the West of England (2018)³⁴





The nature of employment in the West of England is constantly changing; since 2004 four broad industries have grown in terms of the percentage of people in the region employed within them. These are public admin, education and health; banking finance and insurance; other services and Energy and Water; all of which have also seen an increase at the national level.

Figure 2.3: Percentage point change in the % in employment by broad industry/Sector³⁵



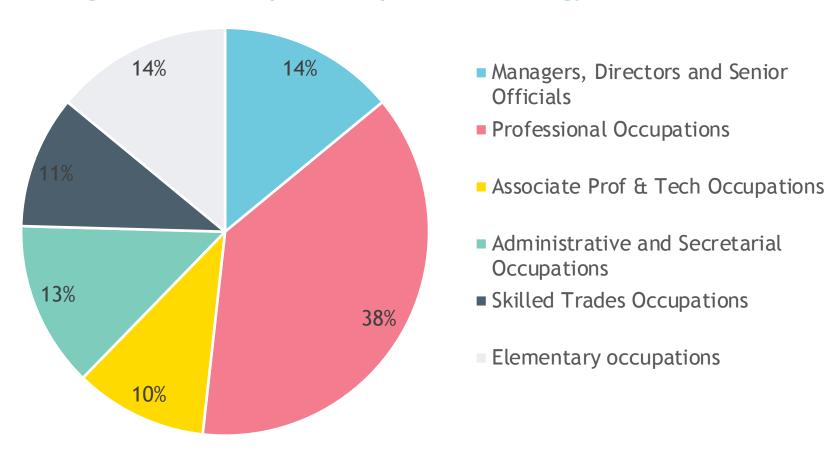
Energy and Water

According to the Annual Population Survey c 11,800 people were employed in Energy and Water between Jan 2018-Dec 2018; accounting for approximately 2% of all employment in the West of England and accounts for 3.1% of employment in South Gloucestershire. Whilst the % of people employed in Energy and Water has increased between 2004 and 2018 the sector remains relatively small in terms of the number of people employed.

Nearly 38 % of those employed within the Energy and Water sector are within professional occupations;; followed by manager and directors and senior officials (14%) which suggests higher level skills are required for a large proportion of employment within this sector. Whereas elementary, skilled trades and administrative occupations collectively account 38% of employment; these occupations tend to require lower / middle level skills.



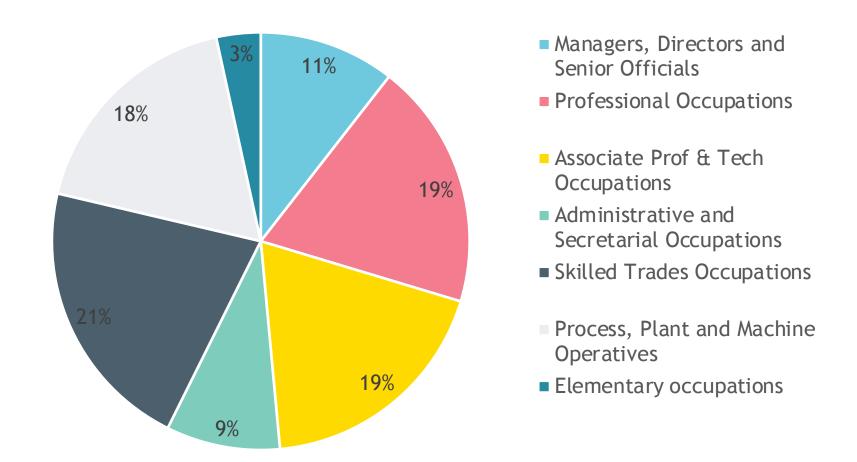
Figure 2.4: Occupational profile of Energy and Water



Manufacturing

Between Jan 2018-Dec 2018 c 44,00 people were employed in Manufacturing in the West of England; accounting for approximately 7.3% of all employment in the West of England. This sector accounts for 9.2% of all employment in South Gloucestershire and 7.3% of employment in Bath and North East Somerset. Whilst the % of people employed in Manufacturing has declined between 2004 and 2018 the sector is a moderate employer and the 5th largest sector (out of 9 broad sectors) in the West of England.

Figure 2.5: Occupational profile of Manufacturing



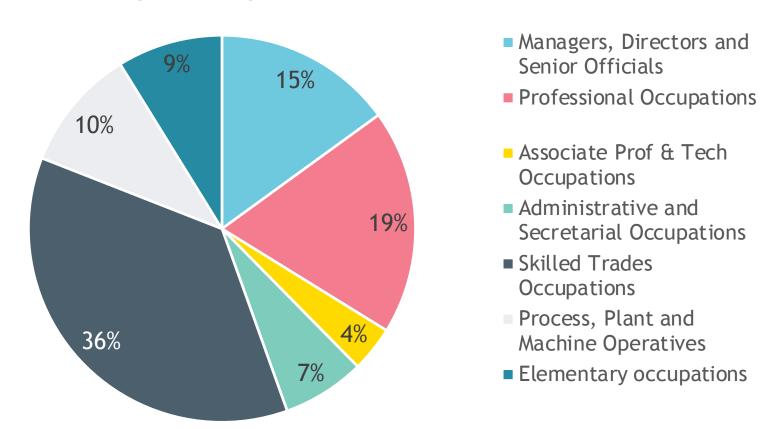
Nearly 50% of occupations in manufacturing require higher level skills - split across Managers, Directors and Senior Officials (11%); Professional occupations (19%); and Associate Prof & Tech Occupations 19%). The most dominant occupation amongst manufacturing is skilled trade occupations - which often require some form of technical training.



Construction

Whilst the % of people employed in Construction has declined between 2004 and 2018 the sector is a moderate employer within the West of England. Construction as a sector is highly volatile to macro economic conditions, often rapidly declining during a recession. Between Jan 2018-Dec 2018 c 37,100 people were employed in Construction in the West of England; accounting for approximately 6.2% of all employment in the West of England. The sector accounts for 7.9% of employment in South Gloucestershire and 6.4% of Employment in North Somerset.

Figure 2.6: Occupational profile of Construction



36% of all occupations within Construction are skilled trade occupations - which require some kind of technical training either through on the job learning or specific technical training at college. There are also a significant number employed within management roles and professional roles which require higher level skills - these roles are likely to include site management.

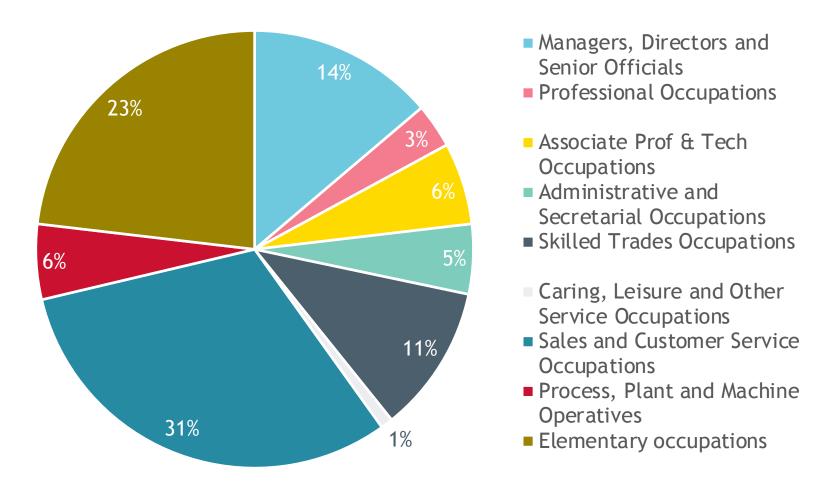
Distribution, hotels & restaurants

In the 12 months to December 2018 c 96,400 people were employed in distribution, hotels and restaurants in the West of England; accounting for approximately 16% of all employment in the region. Whilst the % of people employed in this sector has declined between 2004 and 2018 the sector remains a the third largest employer in the region. The sector is particularly significant in Bath and North East Somerset where the sector accounts for 18.8% of all employment.

Nearly 61% of all of the occupations within distribution, hotels & restaurants are considered to be lower skilled- dominated by sales and customer services occupations (31%); & elementary occupations (23%). At the other end of the spectrum 14% are employed within 'Managers, Directors and Senior Officials' occupations which require higher level skills.



Figure 2.7: Occupational profile of Distribution, hotels & restaurants

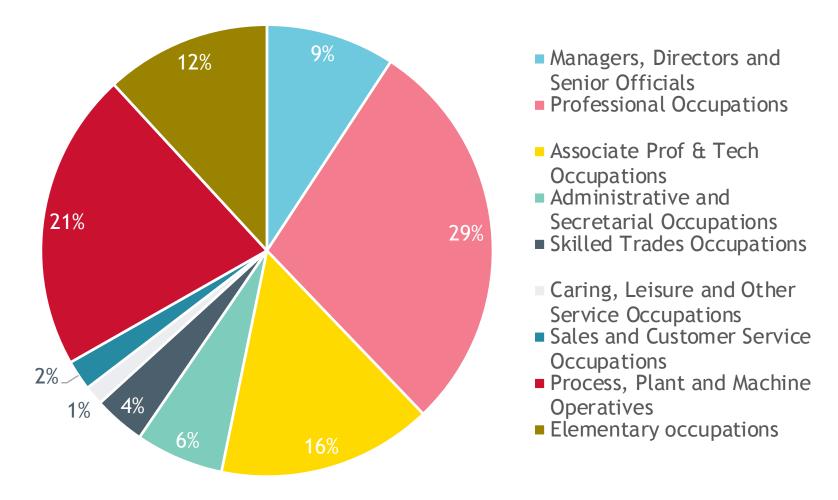


Transport & Communications

In the 12 months to December 2018 c 58,100 people were employed in transport and communications in the West of England; accounting for approximately 9.7% of all employment in the region. Whilst the % of people employed in this sector has marginally declined between 2004 and 2018 the sector remains a moderate employer. The sector is particularly significant within Bristol where it accounts for 12.1% of all employment.

The skills levels required to support the transport and communications sector are pretty evenly split across a broad range of occupations. Those occupations such as managers, professionals and associate professionals account for approximately 54% of employment. Whilst those occupations which require lower level skills such as elementary and process plant occupations account for 33% of employment; with the rest requiring more middle level skills

Figure 2.8: Occupational profile of Transport & Communications

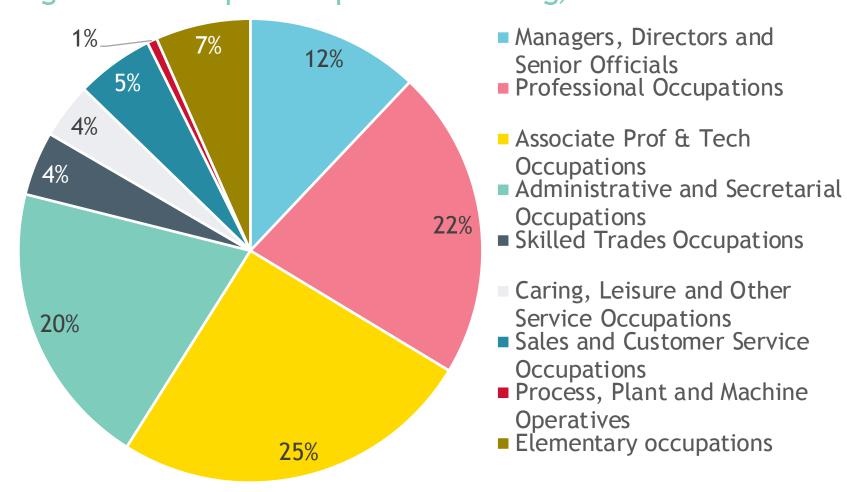




Banking, finance and insurance

The second largest sector in the region in the 12 months to December 2018 c 108,800 people were employed in banking, finance and insurance in the West of England; accounting for approximately 18.1% of all employment in the region. Since 2004 the % of people employed in this sector has grown and remains a significant employer in the region . The sector is a significant employer across all four of the UAs.

Figure 2.9: Occupational profile of Banking, Finance and Insurance



Approximately 59% of employment within Banking, finance and require higher level skills - with manager, director and senior officials accounting for 12%; professional occupations accounting for 22% and associate professionals and technical occupations accounting for 25% of employment.

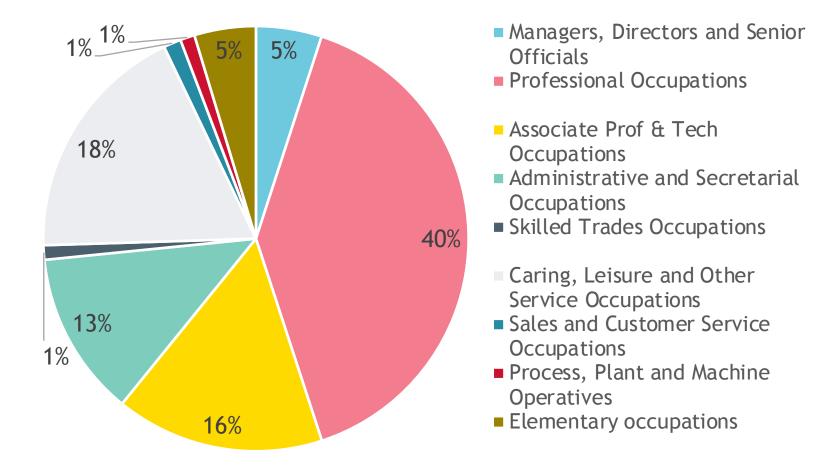
Public Admin, Education and Health

Public Admin, Education and Health is the largest sector in the region employing c.206,700 people in the 12 months to December; accounting for 34.4% of all employment. The sector has also seen significant growth between 2004 and 2018; this can be attributed to significant growth of the four universities in the region; further relocation of MOD services to Abbey Wood; as well as to meet the demands of a growing and aging population through health care. The sector is a significant employer across all four of the UAs.

Employment within public admin, education and health is predominantly in professional occupations (40%); however caring; leisure and other service occupations is also significant accounting for 18% of employment; followed by associate professional and technical occupations (16%).



Figure 2.10: Occupational profile of Public Admin, Education and Health

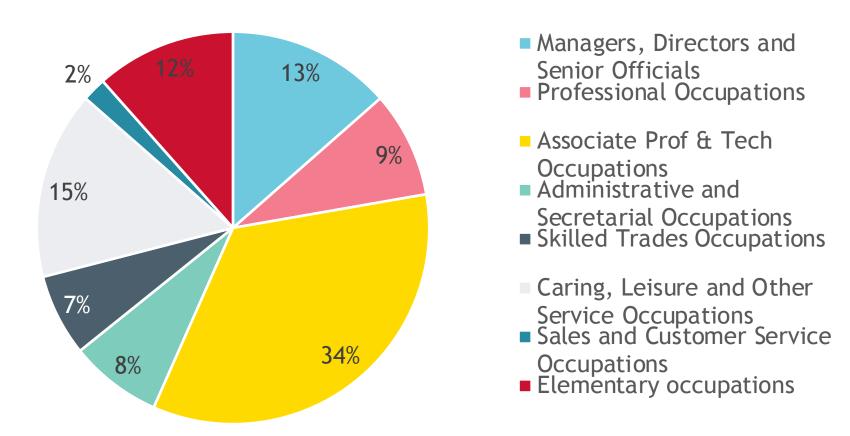


Other Service

Other Services account for a relatively small amount of employment in the West of England, c.35,500 (5.9%). However, the overall % of people employed within this sector has grown between 2004 and 2018.

As with most service sector employment, employment in this sector tends to be weighted towards more higher skilled occupations. With 34% of all employment within the sector in associate professional and technical occupations. There is also significant levels of employment amongst caring, leisure and other service occupations.

Figure 2.11: Occupational profile of Other Services



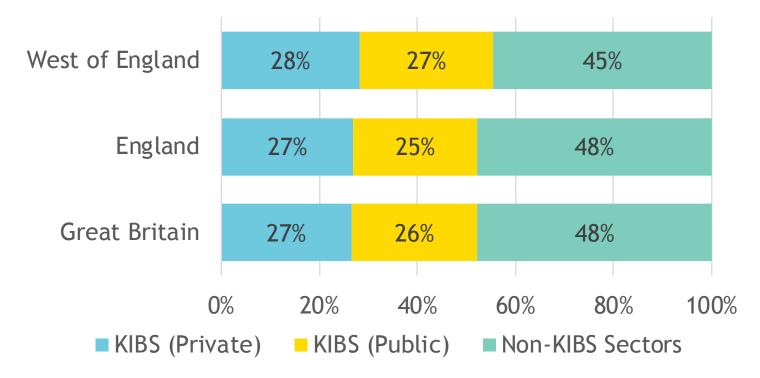
Whilst this analysis provides some insights into the changing demand for skills and occupations for existing high level sectors; it fails to provide a more granular insight or pick up on the requirements of new and emerging sectors which drive innovation.



Knowledge Intensive Business Services³⁶

Knowledge Intensive Business Services (commonly known as KIBS) are services and business operations heavily reliant on professional knowledge. The West of England has 334,000 people employed in KIBS, accounting for 55% of employment and 18,430 businesses accounting for 41% of our businesses. The split between the private and public KIBS sectors in West of England is fairly even in terms of employment, but the private KIBS sectors naturally account for a much larger number of businesses than the public KIBS sectors.

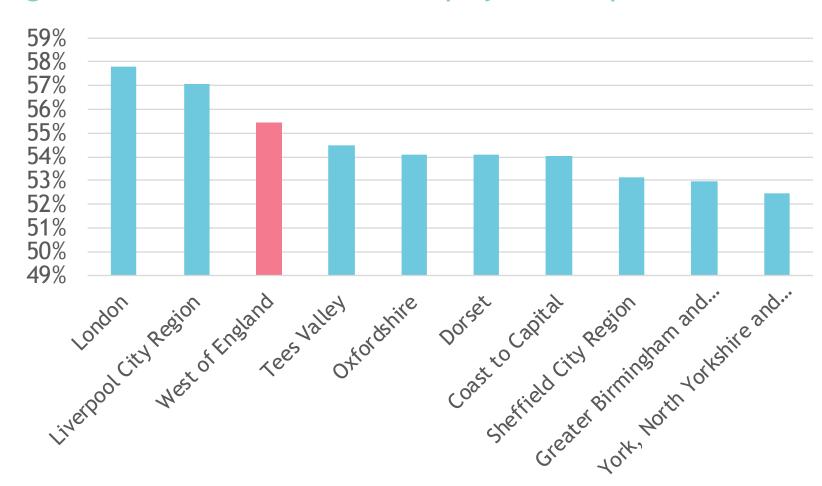
Figure 2.12: KIBS as a % of total employment



The West of England has a greater proportion of employment and businesses in KIBS than England and Great Britain.

Compared to the other 37 LEPs, the West of England has the 3rd highest proportion of people employed in KIBS and the 5th highest proportion of businesses. Looking at the Local Authorities within West of England, Bath and North East Somerset and Bristol have greater proportions of employment and businesses in KIBS than North Somerset and South Gloucestershire.

Figure 2.13: KIBS as a % of total employment: Top 10 LEP Areas





Diversity of innovative skills³⁷

Innovation is a crucial element of economic growth. By developing and applying new products and services, or new production processes, businesses can raise the productivity of their staff and the value of their outputs. Successful collaboration contributes both to the creation of new ideas, and to the application of technology to new sectors. The West of England has a robust ecosystem that promotes such collaborative innovation. Skills for innovation are critical for driving this forward.

A recent SQW report on the Bristol-Bath Innovation Cluster (Nov 2018) found that:

The area's four universities are a major source of skills for the innovation cluster46. Between them, they have around 75,000 students (full time plus part time), with nearly 28,000 at UWE Bristol, 23,000 at University of Bristol, 17,000 at University of Bath, and over 7,000 at Bath Spa University. Over 53% of students at the area's four universities study science, technology, engineering and mathematics (STEM) subjects, compared with an average of 46% nationally. There is also a strong concentration in cultural and creative subjects. Between 2008 and 2012, over 3,500 PhDs were awarded, including 951 at the University of Bath (15% of which were in engineering) and 2,202 at the University of Bristol (with the highest proportions in chemistry and engineering). (pg 27 para 5.5)

The report also found:

There is an evident lack of diversity within the principal networks (particularly in terms of ethnicity and gender). Reporting the findings from their own survey of freelancers in Bristol's film and TV industries, Spicer and Presence noted the following: "The overwhelming majority of freelancers identified as White; the proportion of Black and Minority Ethnic (BME) freelancers was only 2.6%. This compares to 3.6% of the working population in the South West and 5.4% of workers in the creative industries in the UK as a whole. 25% of freelance respondents had attended a fee-paying school. This is significantly higher than the 14% in the creative industries nationally and more than three times the proportion of the UK population as a whole (7%) (pg p25 para 4.24)

With some companies now taking the view:

that a degree in computer science is not essential (in part because of the speed with which the technology is developing); a knowledge of applied mathematics is useful, but much more important is the attitude and energy of staff, and recruits have many different backgrounds. (pg 25, box 4.5)

A full version of the SQW report can be found here.



Further research carried out by WECA³⁸ in 2018 alongside the business community found that a shortage of skills was a barrier to many new and emerging innovative industries in the region:

Shortage of skills, particularly in science, technology, engineering and maths (STEM), among local residents. This includes both a mismatch of skills in the immediate term, where training completions are not meeting the needs of recruiting firms. It also includes a longer-term pipeline of skills to enable continued growth. Including Arts alongside the STEM perspective will be important to ensure that the region can continue to successfully combine creative and 'hard' technology sectors to develop successful products. Further, there may also be a challenge in achieving a pipeline of skilled people from a diverse range of backgrounds. In some instances, there may be a lack of appropriate training provision. Finally, for some sectors challenges with affordability and quality of life may be limiting the region's ability to attract and retain the talent needed for growth.



Employers Skills Survey: Skills Shortages and Staff Proficiency³⁹

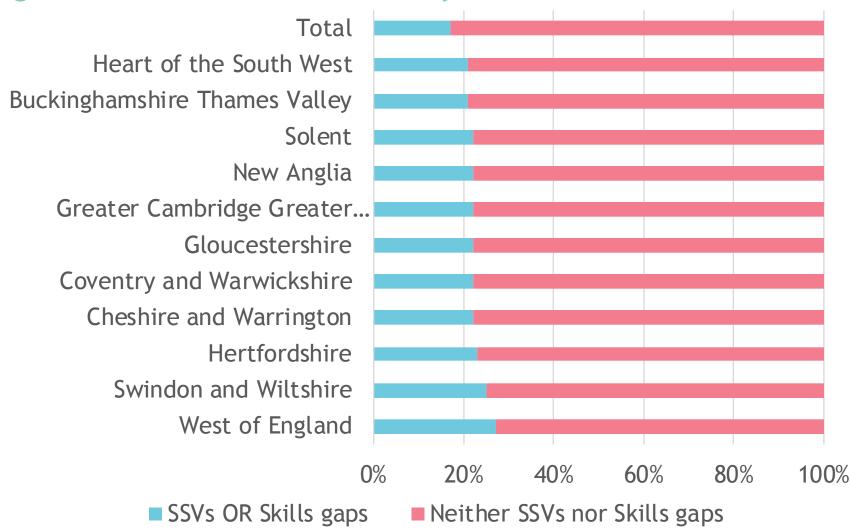
The Employer Skills Survey is a national survey commissioned by DfE to gather information and provide insight on the skills challenges that employers face within their existing workforces and in terms of bringing in new skilled labour, the levels and nature of training investment and the relationship between skills challenges, training activity and business strategy. The biennial survey was last carried out in 2017 and is based on 71,000 telephone interviews with UK employers with 1,491 responses from the West of England.

Whilst the survey provides helpful insights into some of the skills challenges faced by employers in the West of England; this is a weighted survey. Outcomes therefore need to be tested more widely with the local business community to examine the surveys conclusions and ensure that any policy responses are focused on the right things.

Of the companies surveyed 25% reported at least one vacancy, higher than the national average of 20% of these vacancies 13% have at least one vacancy that is hard to fill compared to 8% nationally and 10% have a skills shortage vacancy compared 6% nationally

Based on those surveyed businesses in the West of England report the highest propensity of skills shortage vacancies (SSV) or skills gaps than any other LEP area. Of the vacancies reported in the West of England 27% were a SSV or skills gap compared to 17% of all vacancies.

Figure 2.14: Skills Situation Summary



The West of England has more vacancies particularly for higher skills. The SSVs reported by employers in the west of England were 44% for high skilled occupations; with a further 25% in middle skilled occupations. 21% of the businesses surveyed in the West of England reported skills gaps within there existing workforce (staff are not fully proficient) compared to 13% nationally. 41% reported that they were **under-utilising staff** (compared to 34% for England), suggesting there is some mis-alignment of skill.



Figure 2.15: Skills Shortage Vacancies by Skills Level

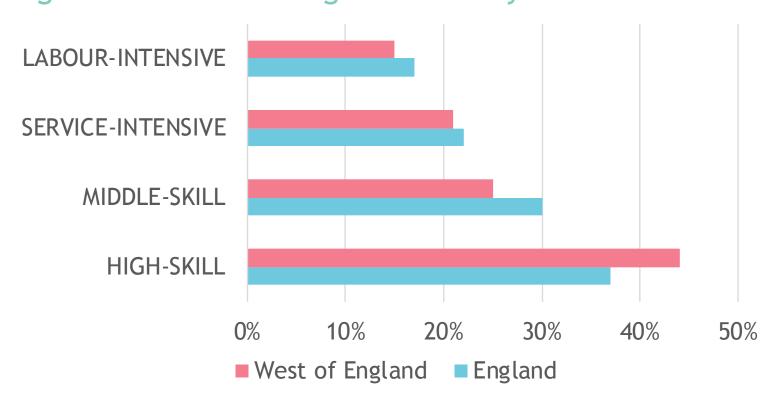
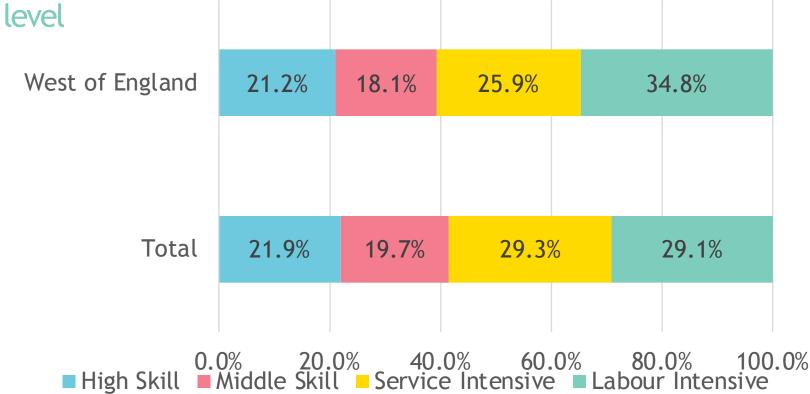
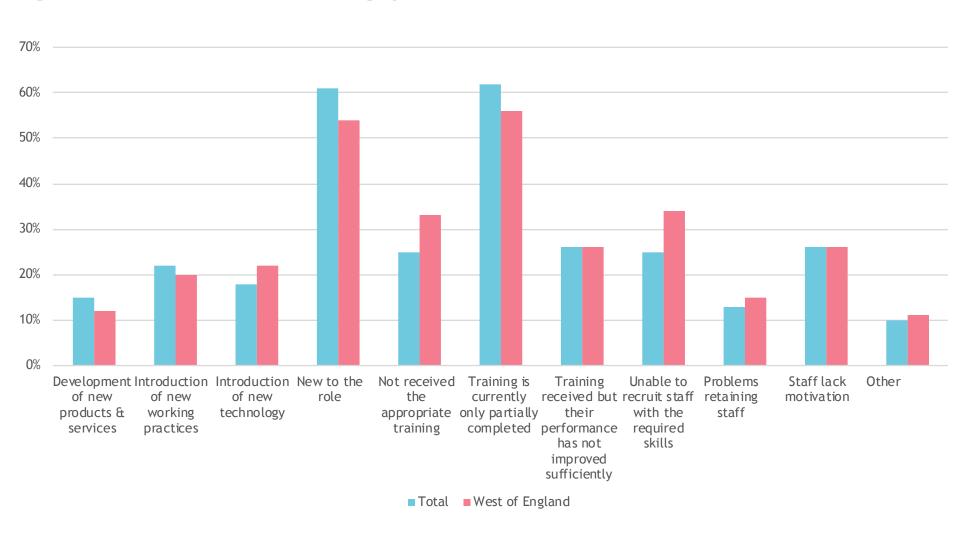


Figure 2.16: Number of staff that are not fully proficient by skill



However, whilst employers were more likely to be reporting skills shortages in higher and mid-skilled occupations, they were more likely to report skills gaps (lack of proficiency within existing workforce) in service and labour intensive occupations - highlighting the need improve lower level skills amongst people in work as well as develop a pipeline of highly skilled people.

Figure 2.17: Causes of skills gaps





There are variety of reasons cited by employers with skills gaps which they perceive to be the cause. In the West of England the most cited reason is that training is currently only partially completed (56%); new to the role (54%); Unable to recruit staff with the required skills (34%) and they have not received the appropriate training (33%). There are four areas where the West of England reports reasons for skills gaps with a higher propensity than the total these are being unable to recruit staff with the required skills; staff not received the appropriate training; the introduction of new technology; and problems in retaining staff.

Skills gaps and lack of proficiency amongst staff can cause a variety of challenges for an employer in terms of the impact on business performance. 19% indicated that this had a major impact on their business . Of the businesses in the West of England reporting skills gaps 50% reported that this had an impact on other staff by increasing their workload; 26% reported higher operating costs. Other significant impacts include having difficulties introducing new working practices and difficulties meeting quality standards; this .

Whilst 74% have trained staff over the last 12 months (compared to 66% for England), only 39% had a budget for training. The most prevalent barriers cited by employers in the West of England in relation to making training available to their staff in the future

included lack of funds (51%); unable to afford to have staff away on training (57%); and lack of time/hard to find time to arrange training (22%)

Figure 2.18: Implications of skills Gaps



Of businesses identifying a need for skills in the next 12 months, the skills needs included basic skills, digital skills, operational skills as well as complex analytical skills.



West of England Business Skills & Training Survey⁴⁰

In 2017 Skills West undertook a survey of 976 business in the West of England. The purpose of this survey was to delve deeper into the skills, recruitment and training needs of businesses in the West of England.

In terms of recruitment the survey found that:

- 44.6% of businesses expected there workforce to grow over the next 6 months
- 60.7% of businesses had advertised a vacancy in the last 12 months
- 52% of businesses found vacancies hard to fill
- 68.5% of businesses blamed hard to fill vacancies on applicants not having the relevant skills
- 55.8% of businesses said that not being able to fill vacancies meant increased workloads for existing staff.
- 60.4% of the hardest to fill vacancies were skilled manual and technical roles.

In terms of skills and training the survey found that the top 5 most important skills needed within business are:

- ➤ Communication (written and oral)
- ➤ Team working
- **≻**Customer service
- > Problem solving
- ➤ Numeracy and analytical

Only 39.5% of the businesses surveyed had an allocated budget for training. The survey also gather insights into whether local businesses were using apprenticeships as a way to address skills challenges within their workforce. 64.9% of the businesses surveyed stated that they have not used apprenticeships within their business. The main reasons cited for not taking on an apprentice was lack of time to support them and lack of knowledge of apprenticeships. With over 50% stating that they had no knowledge of the apprenticeship levy.

Further details of the survey can be found here.



Future of Skills⁴¹

Globalisation, technological progress and demographic change are having a profound impact on labour markets, affecting both the quantity and quality of jobs that are available, as well as how and by whom they are carried out. Research by the OECD, suggests that across OECD countries:

- Orders of industrial robots have tripped over the last decade and are projected to increase rapidly
- The risk of automation is real, nearly half of all jobs will be transformed with technology, with 14% of jobs completed automated and 32% changing significantly. However, whilst technological progress will make some occupations obsolete, it also creates new jobs
- However, many adults do not have the right skills for emerging jobs, with 6 out of 10 adults lacking basic ICT skills or having no computer expertise
- The share of highly -skilled jobs has increased by 25% over the last 2 decades and whilst low skilled jobs have also increased, the share of middle-skilled jobs has decreased
- Adult benefitting from training are currently more likely to be high skilled, in jobs with a low risk of automation and in full time

employment. The OECD recommends that adult training should be better targeted at those with low skills, in jobs with a higher risk of automation and whose employment status is less secure

The full report by the OECD can be viewed <u>here</u>

Local Sector Skills Statements

Skills West have produced a series of sector skill statements which provide information to:

- Improve Careers Education Information Advice and Guidance (CEIAG)
- Improve the quality and responsiveness of local education and training
- Increase apprenticeship starts and availability of higher apprenticeships
- Engage SMEs in the active retention of staff through programmes of skills development and training to ensure increased productivity and sustainable growth.
- Support SMEs to be inclusive and effective in staff recruitment

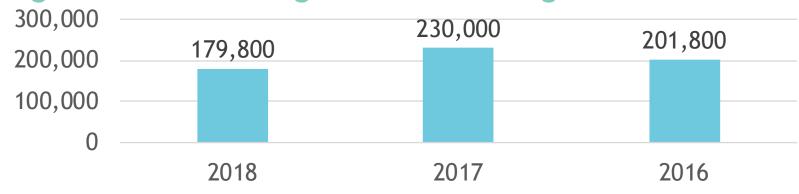
The statements are available to view online here.



Advertised jobs and the demand for skills⁴²

Labour Insight is a large source of real-time LMI available in the UK using data from close to 40,000 sources. Job vacancy data is broken down by occupation, skills clusters, employers and more. On average just over 200,000 job postings a year were identified by Labour Insight for jobs in the West of England in the last three years.





Recruiting Industries

The top 10 industries advertising for posts in the West of England has remained stable over the last three years.

Human health activities was the top recruiting industry in 2018 by almost 4000 job postings. Followed by Education which had over 5000 job postings more than the next largest. Considering the size of the sector identified on pg 59 the fact that these two industries are significant recruiters is unsurprising.

Table 2.1: Top 10 Industries Advertising

2018	Top 10	Job Postings	20	17	20	16
1	Human health activities	15,560	1	\Leftrightarrow	1	⇔
2	Education	11,640	2	⇔	2	\$
3	Legal and accounting activities	5,850	3	⇔	4	仓
4	Food and beverage service activities	5,060	4	⇔	3	Û
5	Retail trade, except of motor vehicles and motorcycles	4,650	5	⇔	5	⇔
6	Social work activities without accommodation	2,800	8	仓	8	⇔
7	Activities of head offices; management consultancy activities	2,600	7	⇔	10	仓
8	Real estate activities	2,380	9	仓	9	⇔
9	Office administrative, office support and other business support activities	2,280	11	仓	11	\$
10.5	Accommodation	2,220	13	仓	13	\$
10.5	Employment activities	2,220	6	Û	6	\$



Recruiting Employers

The top 5 employers has remained the same for the last 2 years. The National Health Service has been the largest employer for the last 3 years with consistently over 7,000 job postings, more than 3 times the next largest employer. There were several other health related employers in the largest employers over the last three years including Bristol Community Health CIC and Shaw Healthcare.

Three of the area's four universities have been amongst the largest employers in the region with the University of Bristol posting over twice the number of the University of Bath for the last threes years. Weston college has been in the top 10 largest employers for the last three years and has increased their job posting each year; this follows a period of recent expansion at the college and the opening of a number of new campuses including the Winter Gardens and the Construction Training Centre

Tesco and Airbus both posted over double the number of jobs in 2018 than 2017 to move into the top 10; whereas South Gloucestershire Council had a peak of job postings in 2017 but has almost halved that number in 2018.

Table 2.2: Top 10 recruiting employers

Top 10 l	argest employers 2016 to 2018	Job Postings	20	17	20	16
1	National Health Service	7,611	1	\Leftrightarrow	1	\Leftrightarrow
2	University Of Bristol	2,076	2	⇔	2	\Leftrightarrow
3	University Of Bath	996	3	\Leftrightarrow	6	Û
4	University Of The West Of England, Bristol	688	4	⇔	5	û
5	Adlib Holdings Ltd	592	5	⇔	4	Ţ
6	Bristol Community Health C.I.C.	440	7	仓	3	Ţ
7	Tesco Plc	425	18	仓	7	Ţ
8	Weston College	398	9	仓	10	仓
9	Airbus Ltd	363	36.5	仓	15	Û
10	Computershare Limited	323	8	Û	-	①
11	KPMG	310	20	仓	29	①
12	Babcock International Limited	309	10	Û	86	Û
19	South Gloucestershire Council	256	6	Û	99	仓
28	Shaw Healthcare	190	12	Û	8	Û



Occupations being Recruited

The top 5 occupations for the West of England have been the same for the last three years with Programmers and software development professionals being the most advertised post followed by nurses and sales related occupations.

Table 2.3: Top 10 Occupations

201	8 Top 10 SOC areas	Job Postings	% Postings	20	17	20	16
1	Programmers and software development professionals	8,750	5%	1	⇔	1	(
2	Nurses	6,450	4%	3	仓	3	\$
3	Sales related occupations	6,340	4%	2	Û	2	
4	Other administrative occupations	4,990	3%	4	\$	4	(
5	Human resources and industrial relations officers	4,470	2%	5	⇔	5	\$
6	Managers and proprietors in other services	4,310	2%	7	仓	7	\$
7	Care workers and home carers	4,150	2%	11	仓	12	仓
8	Customer service occupations	3,700	2%	10	仓	9	ţ
9	Marketing and sales directors	3,580	2%	6	Û	5	Û
10	Solicitors	3,500	2%	15	仓	16	仓

A deep dive into the top 5 occupational areas shows that skills wanted in programmers and software development professionals with advertisements for Software development engineers, double that of .net developer and Java Software developer. Whilst 26% of

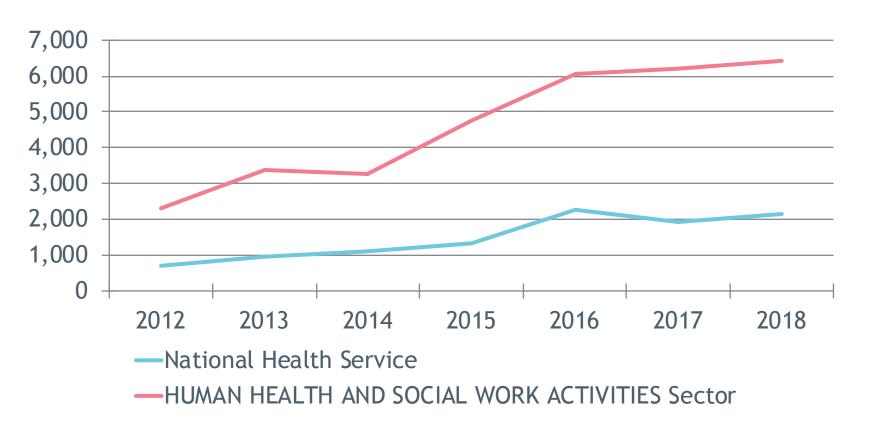
sought after nurses is for 'registered nurses; and 17% for 'staff nurse. Sales related occupations can be broken down to 'sales executive' (17%); Accounts Manager (14%); and Sales Assistants (6%). There were 4,990 postings for 'Other administrative occupations' advertised this can bee broken down further to administrative clerk (11%); administrative assistant (7%) and office administrator (5%). Whereas Human resources and industrial relations officers can be broken down to recruiting consultant (50%) and Human Resources Advisors (9%).



Human Health Sector & National Health Service

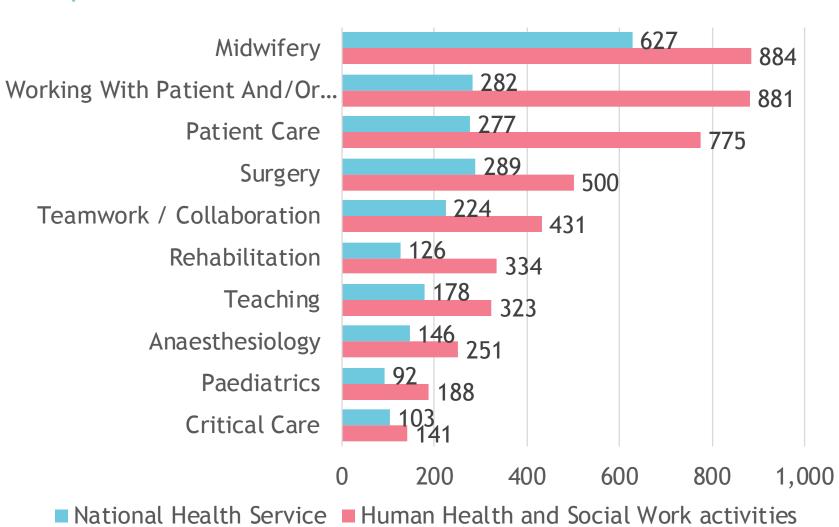
The National Health Service has been the largest recruiter in the West of England for the last three years with approximately 2000 job adverts posted a year. The historical trend in job postings matches that of the wider Human Health and Social Work sector in the West of England and accounts for approximately an third of the sector.

Figure 2.20: Job adverts in Human Health Sector & National Health Service



The most often requested skill for the National Health Service is Midwifery with over double the number of jobs posted than the next largest skill sets of Surgery, Mental Health working and Patient Care. For the wider sector, Mental Health working and Patient Care and at a similar demand as Midwifery.

Figure 2.21: Most requested skills at the National Health Services compared to the wider sector





Education Sector & Employers

The Education sector in the second highest industry in the West of England with just less than 12,000 job postings in 2018. Three of the top four employers in the West of England are in this sector.

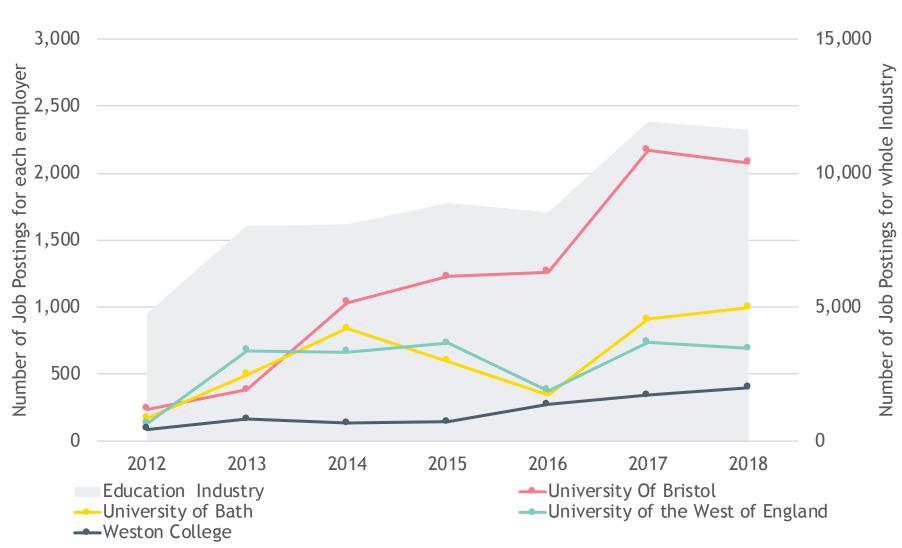
The number of job postings in this sector saw a large increase of over 3,000 postings (40%) from 2016 to 2017 after remaining steady for several years, then a small drop of 2% from 2017 to 2018.

The trend of job postings for the University of Bristol has largely matched that of the whole sector with an increase of 70% from 2016 to 2017 then a drop of 4% from 2017 to 2018. The number of postings from the University of Bristol was similar to the other two universities in 2014, but is now over twice the next largest.

The trend in postings for the University of Bath and the University of the West of England (UWE) are similar until 2017 with both seeing a drop in numbers in 2016. From 2017 to 2018, the University of Bath increased their job postings by 9%, while UWE decreased theirs by 7%.

Weston College is also in the top 10 employers in the West of England. They have been steadily increasing their job postings with a 17% increase from 2017 to 2018.

Figure 2.22: Trend of Education Sector Job Postings





Legal and accounting activities

The top third largest industry in the West of England in 2018 was Legal and accounting activities. Within this industry, KPMG was the largest employer, and they were the 11th largest employer overall.

The occupation most posted in this sector in 2018 was Solicitors with over 2,500 postings. This was over 3 times the number of the next most popular occupation which was Legal associate professionals.

Figure 2.23: Main employers in the legal and accounting activities sector

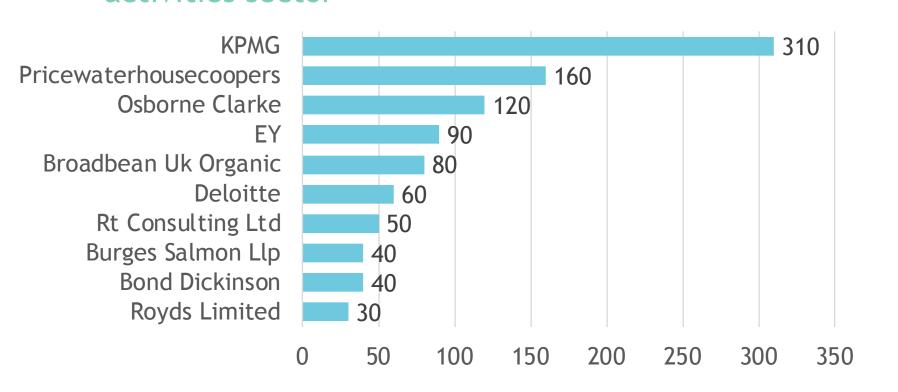


Figure 2.24: Main occupations of legal and accounting activities posted





SKILLS SUPPLY

SECTION 3

WEST OF ENGLAND Combined Authority

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KEY MESSAGES

Skills Provision

• There is a broad diversity of skills provision across the region. This includes four Universities, Four further education colleges and 1 sixth form college. Both the City of Bristol College and Weston College have University Centres offering degree courses; whilst Bath College and SGS offer degree level qualifications. The region also hosts 400+ primary schools; c.120 Secondary Schools and 25+ Independent Training Providers⁴³.

Schools

Educational outcomes for disadvantaged pupils is below the national average. Educational attainment in schools (as measured at KS2, KS4 and KS5) is slightly below the national average for all young people (except in B&NES), but significantly below the national average for disadvantaged children (at all three stages). At GCSE, performance in English is lower than the national average in all districts except N. Somerset, whilst for maths, performance was lower than the national average in Bristol, and S. Glos. Research by the CBI in 2017 found that educational attainment at 16 is the single most important driver of productivity differences across the UK.

Careers Guidance

• Careers information advice and guidance has scope for improvement across the region. Good quality careers and enterprise provision is critical to young people's futures. The most recent data shows that 58% of schools and colleges are using the Compass benchmarking tool, compared to 52% nationally, and of these, schools and colleges were achieving on average 2.46 of the 8 benchmarks, the same as the national profile. As a result the LEP is ranked 19 (of 38 LEPs) on careers advice.

NEETS

Rates of young people not in education, employment or training are above average in parts of the region. Across the West of England, 6.6% of 16 and 17 year olds were Not in Education, Employment or Training (NEET), with higher than average levels seen in in Bristol (8.8%) and N. Somerset (6.1%). NEET levels were significantly higher for young people with Special Educational Needs or Disabilities (SEND) in Bristol (14%) and B&NES (10.9%). In 2018, there were 1,245 looked after children in the West of England area, 52% of which were from Bristol, which has a higher than average rate of looked after children. Approximately 37% of care leavers were NEET.

Combined Authority

KEY MESSAGES

Progression into HE

 Progression to Higher Education for young people in the region is below average. In the West of England people leaving KS5 are less likely to go into higher education; 53% in the West of England compared to 61% nationally. There Adult Skills is a very local geographical dimension to this, with some areas having some of the highest rates of participation in the country and some the lowest. The areas with some of the lowest rates of participation correlate to those areas which are the most deprived as shown by the Index of Multiple Deprivation.

Higher Education

 Graduates from the regions HE institutions are more likely to find employment. There are c79,2000 HE students in the West if England; the four universities offer a wide range of courses with some of the most popular having a strong alignment to industries in the area creative; engineering and technology; and business studies. 83.5% of graduates from HE establishments in the South West were more likely to be in employment than the UK average of 81.7%. With a lower proportion of

students going on into further study however; there are significant difference by establishment with students from the University of Bath and the University of Bristol more likely to go into further study than the UK average.

- Gaps in attainment across adult education courses are reducing. There were approximately 26,000 enrolments onto adult skills courses in 2017/18. Whilst females are more likely to enrol onto an Adult Education The achievement gap between male and female learners is 4% for the West of England, with the largest gap in B&NES at 8%. 27% of learners were from BAME backgrounds, rising to 45% in Bristol. Whilst the evidence shows an achievement gap between white students and BAME students of 4%, this appears to be reducing, with overall achievement rates increasing in both white and BAME groups
- Adult education courses are supporting people out of work and in work to progress. In 2017/18 almost half the learning aims (47% in West of England) were started by learners that were not employed and were looking for work. Learners that were employed or self-employed and



KEY MESSAGES

working a low numbers of hours were less likely to enrol for Adult Education than those working 20 hours or more a week. In 2017/18 half the learning aims were started by learners that either had no qualifications or were qualified o below level 2. With almost half the learning aims (46%) in the subject area 'Preparation for Life and Work

Apprenticeships

- Apprenticeship starts have reduced in the region. The overall number of enrolments onto apprenticeships has decreased over the past three years, potentially due to a lack of business awareness. Enrolments are the highest for level 2 qualifications but have decreased over the last 3 years; level 4 enrolments are increasing but remain the smallest proportion of enrolments. Achievement rate for the 2017/18 cohort is similar across all levels. The highest rate was for level 4+ apprenticeships (69%) and lowest for Level 2 (64%).
- Diversity among apprentices remains an issue to address. There are large variations in the gender split depending on the sector of the apprenticeship and it is recognised that more needs to be done to attract females into certain sectors. BAME learners make up 8% of all

learners across the West of England, again there is a recognition that more needs to be done to attract individuals from a BAME background into apprenticeships, particularly in into certain sectors.

• As of 2017/18 there were 2,310 learners on apprenticeships to support innovation the. These learners were predominately male (89%).



Key Stage 2 Attainment⁴⁴

The percentage of pupils reaching the expected standard in reading, writing and maths at KS2 across England was 65% in 2017/18. The percentage of pupils in the West of England was similar to this at 64%.

Figure 3.1: Percentage of pupils reaching expected standard at KS2 for Disadvantaged Pupils and other Pupils

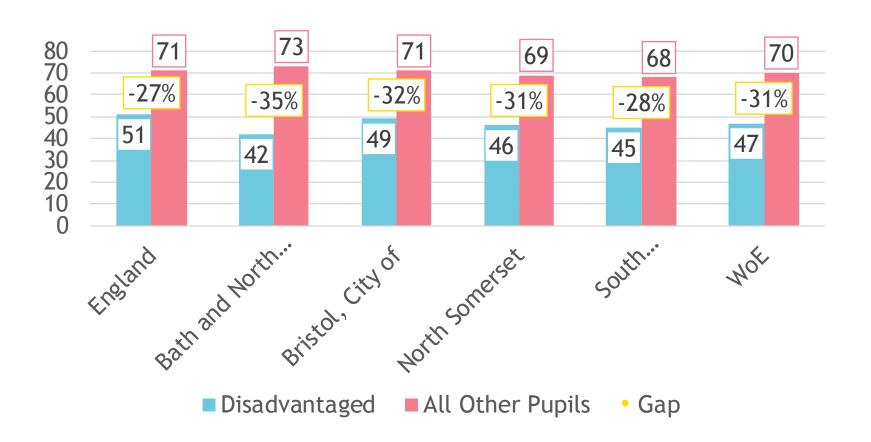
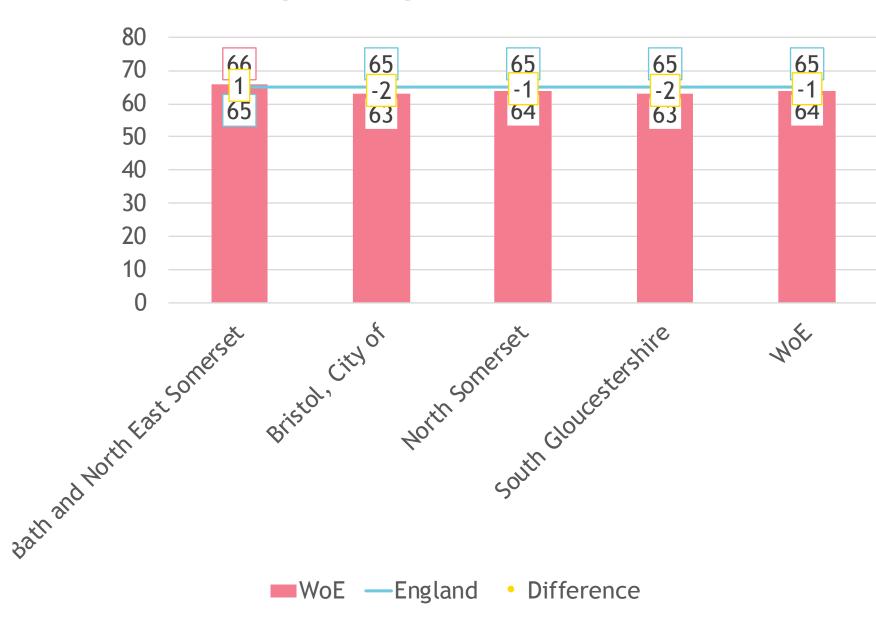


Figure 3.2: Percentage of pupils reaching the expected standard in reading, writing and math's



The gap in achievement between disadvantaged pupils and other pupils for England was 27%. The gap was slightly larger in the West of England at 31%, with the largest gap in B&NES at 35%.



Key Stage 4 Attainment⁴⁵

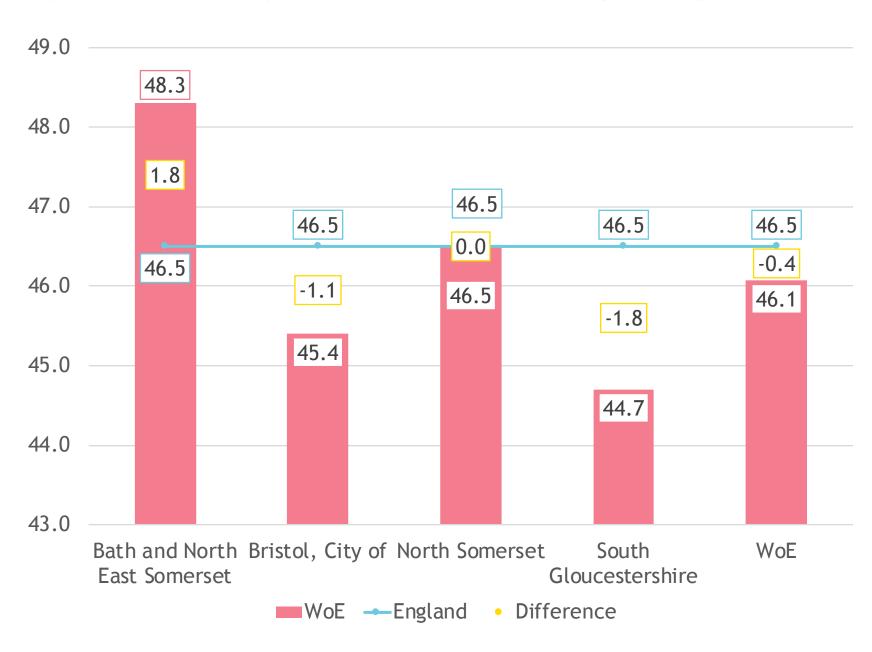
The Attainment 8 score is the average measure of an individual student's attainment across their 8 best performing subjects from three categories. In 2018, Attainment 8 had a maximum point score of 90.

In 2017/18 the average Attainment 8 score per pupil for England was 46.5. The average score in all West of England Local Authorities was slightly lower than the national average at 46.1 with N. Somerset having a score equal the national average and B&NES having a higher score of 48.3.

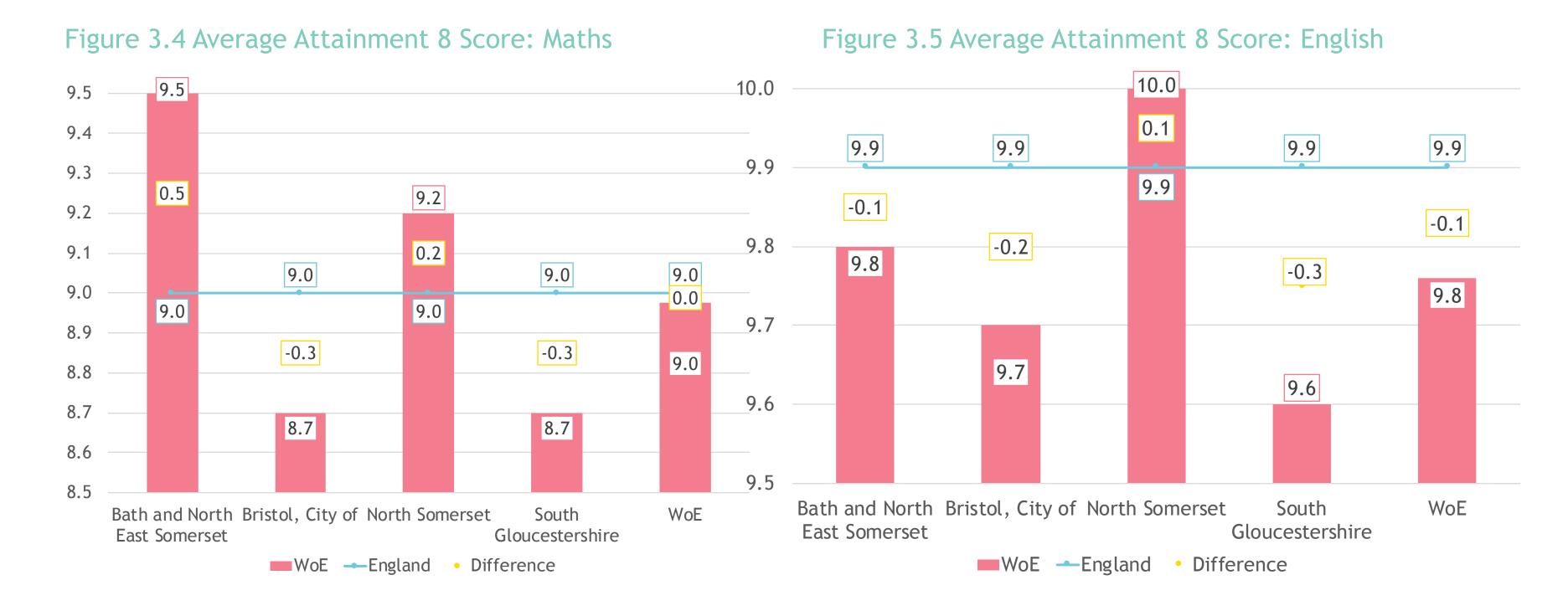
In English the national average score was 9.9 and in Maths 9.0. The West of England average score for English was 0.1 lower than the national average, North Somerset achieved an average of 10.0 per pupil.

For Maths, the West of England average score was the same as the national average. B&NES had an average score of 9.5 and N. Somerset of 9.2.

Figure 3.3 Average Attainment 8 Score per Pupil







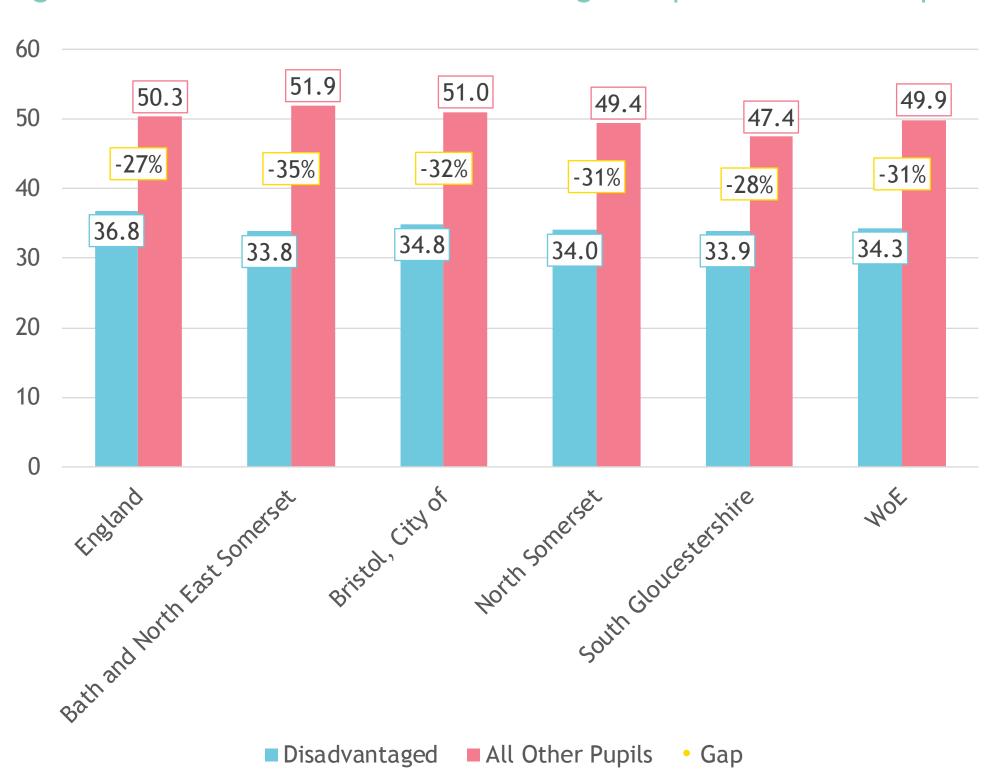


Key Stage 4 Attainment

The Attainment 8 average score for England for Disadvantaged pupils was 36.8. This was 27% lower than the average score for all other pupils.

The gap between Attainment 8 scores for the West of England was 31%. The largest gap was in B&NES at 35%.

Figure 3.5: Attainment 8 for Disadvantaged Pupils and Other Pupils





Key Stage 5 Attainment

The percentage of pupils in state-funded schools and colleges achieving at least 2 substantial level 3 qualifications in 2017/18 across England was 80.3%.

The percentage of students in B&NES and North Somerset was slightly higher, but Bristol had 4.8% less students achieving at least 2 level 3 qualifications and South Gloucestershire had 9.8% less than the national average.

The percentage of students achieving at least 2 A levels in 2017/18 across England was 76.9%. The percentage across the West of England was 2.8% less and in South Gloucestershire it was 11.3% less than the national average.

The Average Points Score (APS) per entry for all level 3 students across England was 31.84. The APS for the West of England was 1% less, and the APS for South Gloucestershire was 7% less than the national average.

Figure 3.6: Percentage of students achieving at least 2 substantial level 3 qualifications





Figure 3.7: Percentage of Students achieving at least 2 A-levels

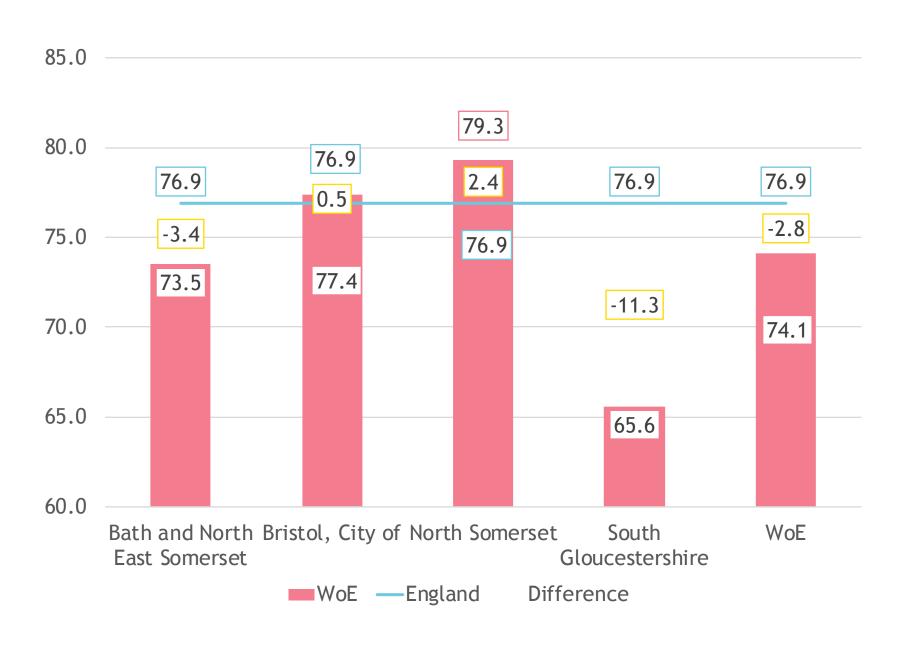
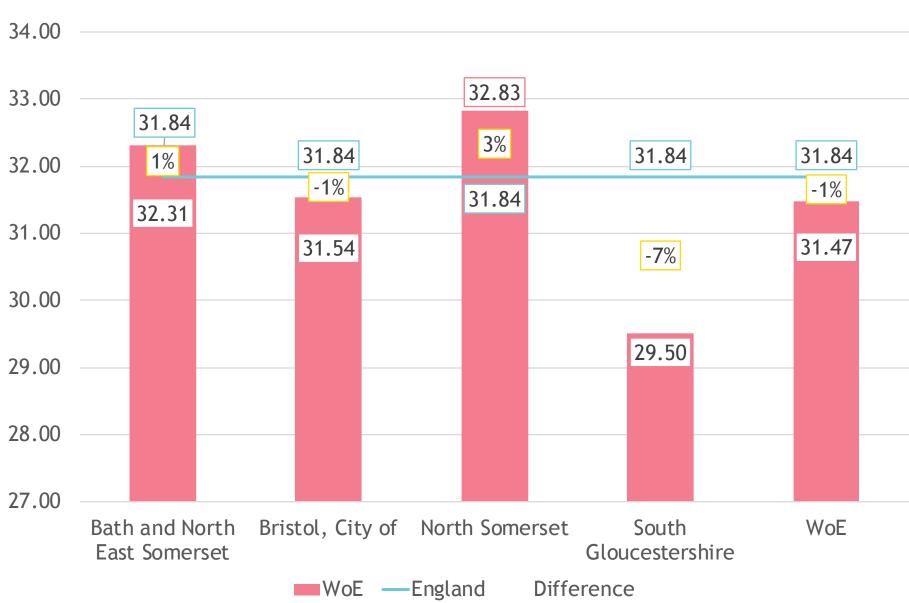


Figure 3.8: APS per entry for all level 3 students





Key Stage 5 Attainment Disadvantaged Pupils

Attainment amongst disadvantaged pupils at Key Stage 5 is significantly below the national average, with a significant gap in attainment between disadvantaged pupils and all other pupils.

Figure 3. 9: Percentage of Pupils achieving level 3 for disadvantaged pupils and other pupils

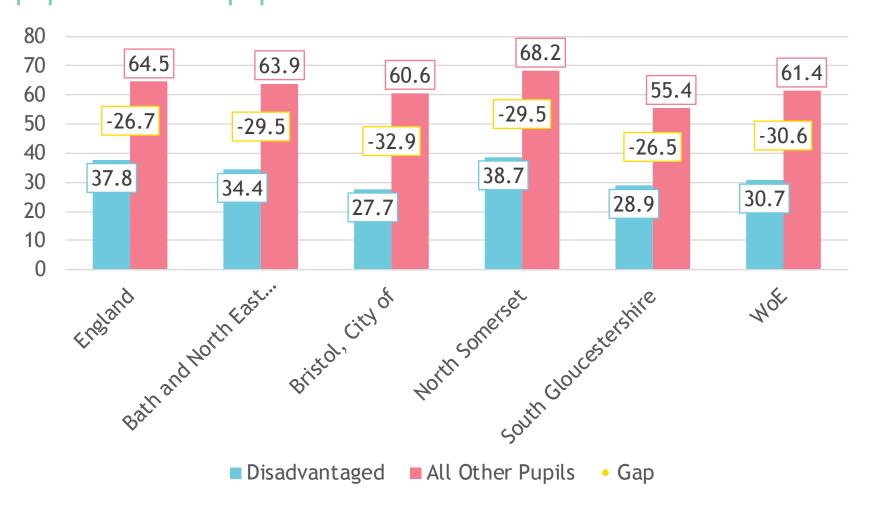
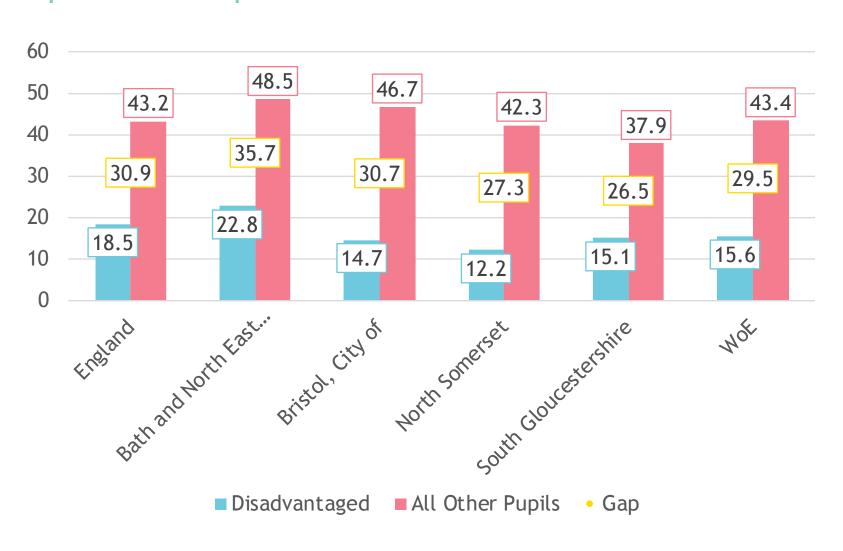


Figure 3.10: Percentage of Pupils achieving level 3 through Alevels, AS level and International Baccalaureat for Disadvantages Pupils & other Pupils





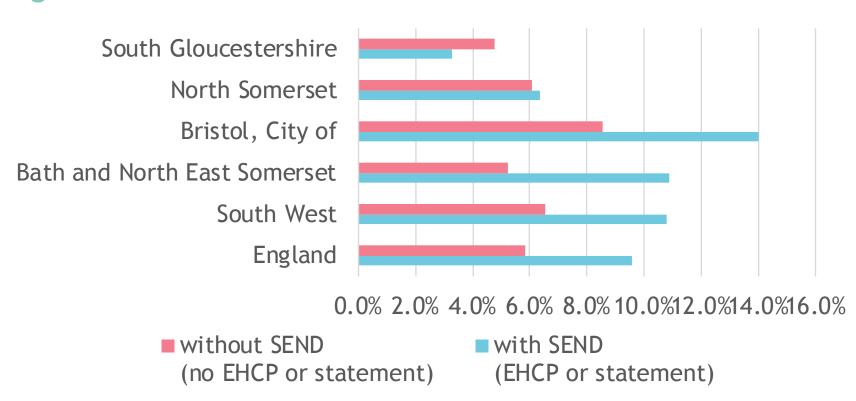
Not in Education, Employment or Training⁴⁷

Across the West of England, 6.6% of 16 and 17 year olds were Not in Education, Employment of Training (NEET), with higher than average levels seen in in Bristol (8.8%) and N. Somerset (6.1%). NEET levels were significantly higher for young people with Special Educational Needs or Disabilities (SEND) in Bristol (14%) and B&NES (10.9%). In 2018, there were 1,245 looked after children in the West of England area, 52% of which were from Bristol, which has a higher than average rate of looked after children. Approximately 37% of care leavers were NEET.

Figure 3.11: NEET (inc not known) as proportion of 16 and 17 year olds known to the local authority



Figure 3.12: NEET with and without SEND



Studies have shown that time spent NEET can have a detrimental effect on physical and mental health, and increase the likelihood of unemployment, low wages, or low quality of work later on in life. However, preventing disengagement at an earlier age and before young people become NEET is often more effective.



Careers Hub - Gatsby Benchmarks⁴⁸

Research by the Careers and Enterprise Company has found that 55/90 of our schools and colleges were using the Gatsby Benchmarks in 2017/2018. The West of England had an Average benchmark of 2.462, just higher than the National average of 2.457. Overall, the West of England is ranked 19th of the 38 LEPs by performance on Gatsby Benchmarks.

As shown in figure 3.13 the West of England has its highest tanking (9^{th)} for Benchmark 2: Learning from career and labour market information and lowest ranking (32nd) for Benchmark 7: Encounters with further and higher education.

Benchmark 4 and 8 have the highest percentage achievement (44%) however have lower than average ranks (21 and 29 respectfully).

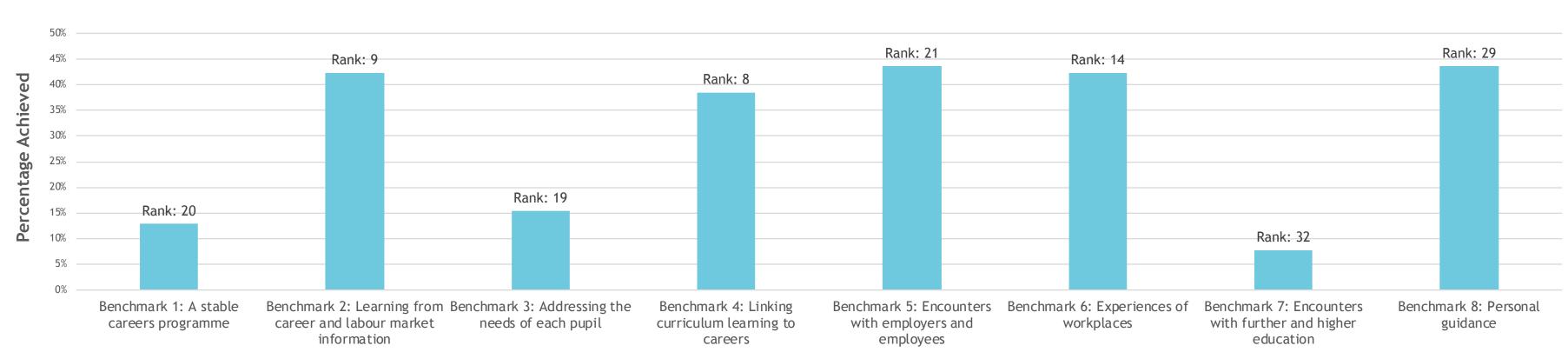


Figure 3.13: Percentage Achieved and LEP rank for Gatsby Benchmark

Gatsby Benchmark



Unlocking Regional Growth, CBI⁴⁹

The CBI 2017 report Unlocking Regional Growth; explores the underlying reasons as to why productivity varies between regions and cities and what businesses and government can do to tackle some of the issues. The report finds that the fundamental driver of economic performance is education.

Key findings from the study show:

- Nine out of ten UK cities perform below the European average, and more than half are among the 25% least productive cities on the continent. The UK has recently fallen further behind its international peers. Since the global financial crisis, only in London and the South East is GDP per head above its pre-crisis peak, as of 2015.2 As a result, the most productive area of the UK is now almost three times more productive than the least
- There are 4 main drivers of regional productivity differences:
 - 1. Educational attainment of young people at 16 and skills
 - 2. Transport links that widen access to labour
 - 3. Better management practices
 - 4. A higher proportion of firms who export and innovate

In terms of educational attainment the report states 'Ensuring strong school performance and children getting the best results at GCSE (or equivalent) is the single most important driver of productivity differences across the UK, but a focus on school results is not enough. Businesses must also get in-work training and development right. Attracting talent and skills from around the world to regions and nations across the UK is vital in helping businesses stay competitive in a global environment.' (p9)

You can access the full CBI report <u>here</u>.

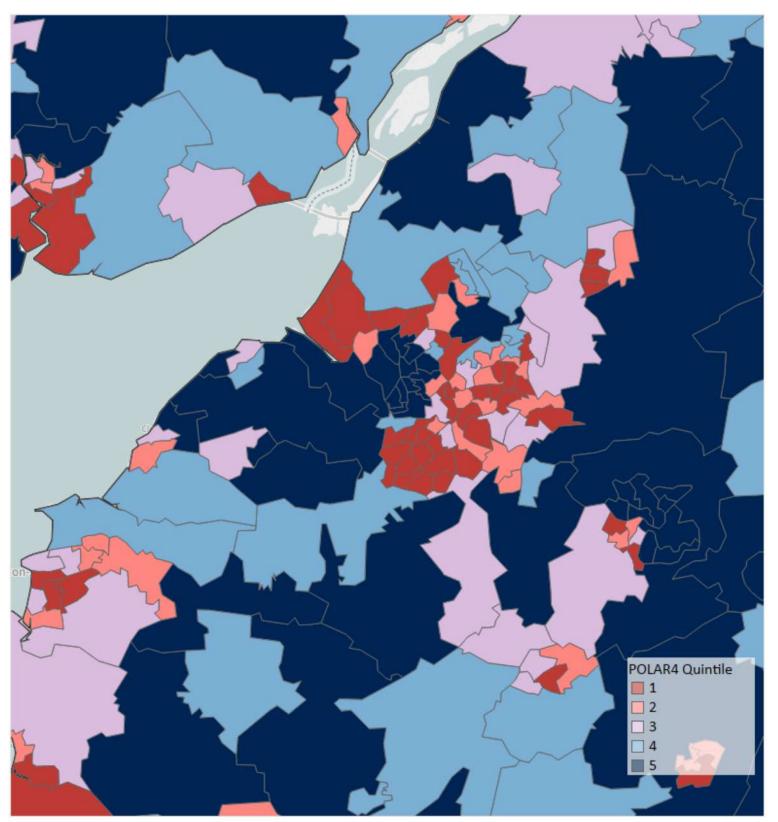


Progression into Higher Education

Polar 4⁵⁰ data provides measure of young participation in higher education. It measures the proportion of young people who enter higher education aged 18 or 19 between the years 2009-10 and 2014-15. Quintile 1 shows the lowest participating areas; whilst quintile 5 (Q5) indicates the highest participation.

In the West of England people leaving KS5 are less likely to go into higher education; 53% in the West of England compared to 61% nationally⁵¹. There is a very local geographical dimension to this, with some areas having some of the highest rates of participation in the country and some the lowest. The areas with some of the lowest rates of participation correlate to those areas which are the most deprived as shown by the Index of Multiple Deprivation.

Map 3.1: POLAR 4 Data - KS5 Progression into Higher Education





Higher Education in the West of England⁵²

For the academic year 2017/18 there were approximately 79,185 HE students in the West of England.

Table 3.1: Students by HE Establishment 2017/18

	Female	Male	Other	Total
Bath Spa University	5,475	2,515	0	7,990
University of Bath	8,260	9,285	10	17,555
University of Bristol	13,730	11,105	15	24,850
UWE	16,145	12,640	0	28,790
TOTAL	43,610	35,545	25	79,185

The Universities within the West of England offer a wide range of courses; as of 2017/2018 there most popular course areas (in terms of number of students are as follows:

Bath Spa University

- Creative arts and design (35.5%)
- Education (20.7%)
- Business and administrative studies (10.1%)

University of Bath

- Engineering and technology (17.9%)
- Business and administrative studies (15.7%)
- Biological sciences (15.1%)

University of Bristol

- Social studies (13%)
- Physical sciences (10.7%)
- Engineering and technology (9.7%)

University of the West of England

- Subjects allied to medicine (27.3%)
- Business and administrative studies (16.4%)
- Architecture, building and planning (8.2%)

Destination of Graduate Leavers

A longitudinal study of graduates carried out in the winter 2016/17 survey which contacted 2012/13 leavers found that 83.5% of graduates from HE establishments in the South West were more likely to be in employment than the UK average of 81.7%. With a lower proportion of students going on into further study. However; there are significant difference by establishment



Table 3.2: Long term outcomes of students

	Total work	Further Study
Bath Spa University	85.70%	
University of Bath	78.60%	11.40%
Univeristy of Bristol	76.00%	12.80%
UWE	84.50%	4.70%
South West HE Providers	83.50%	5.90%
Total	81.70%	6.20%

Other evidence suggests that Graduates are more likely to be employed and in high-skilled employment than non-graduates, and consequently higher earning potential than that of non-graduates. Non-graduates are more likely to be unemployed and economically inactive (not looking for work).

Table 3.3: Graduate Average Earnings - 5yrs⁵³

	Male Earnigs	Female Earnings
Bath Spa University	21020.07	21020.07
University of Bath	40385.24	40385.24
University of Bristol	38482.69	38482.69
UWE	28404.21	28404.21



Adult Skills⁵⁴

The overall number of enrolments of learners in the West of England onto Adult Skills courses (also called Adult Skills learning aims) has stayed constant for the last 3 years at approx. 26,000 learning aims. The number of learning aims that were achieved in each year out of those that were taking a course (called the inyear achievements) has increased from 73% in 2015/16 to 80% in 2017/18. A small number of learners (less than 1,000) carry on studying into the next year.

B&NES had a 40% increase in enrolments in 2016/17 and peak of in-year achievements of 82% in that year.

Bristol has seen a slight decline in the enrolment numbers of approximately 5% a year for the last 2 years. Bristol has seen an 8% increase of in-year achievements to 78% in 2017/18.

South Gloucestershire saw a 5% increase in enrolments in 2016/17 and have had a slight increase of in-year achievements of 4% over 2 years.

North Somerset saw a dip in enrolment in 2016/17, but a 14% rise from 2015/16 to 2017/18. The in-year achievements have increased by 8% over the 2 year period to 83% in 2017/18.

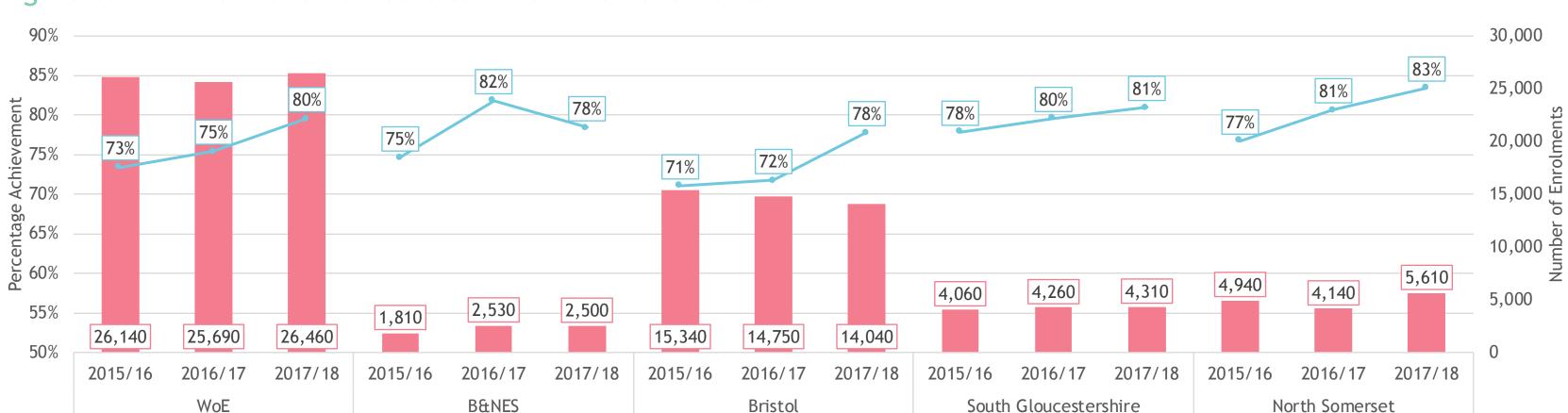


Figure 3.14: Enrolment Numbers & In-Year Achievements



Adult Skills: Age of Learners

There is a greater proportion of learning aims taken by younger ages across the West of England with 35% taken by 19-30 year olds in 2017/18 and 44% taken by learners in the larger age band of 31-49 year olds.

The proportion of learners in the 19-23 age band has decreased by 20% over the last 3 years, whilst the proportion in the 50-64 age band has increased by 17%.

Figure 3.15: Percentage of Enrolments

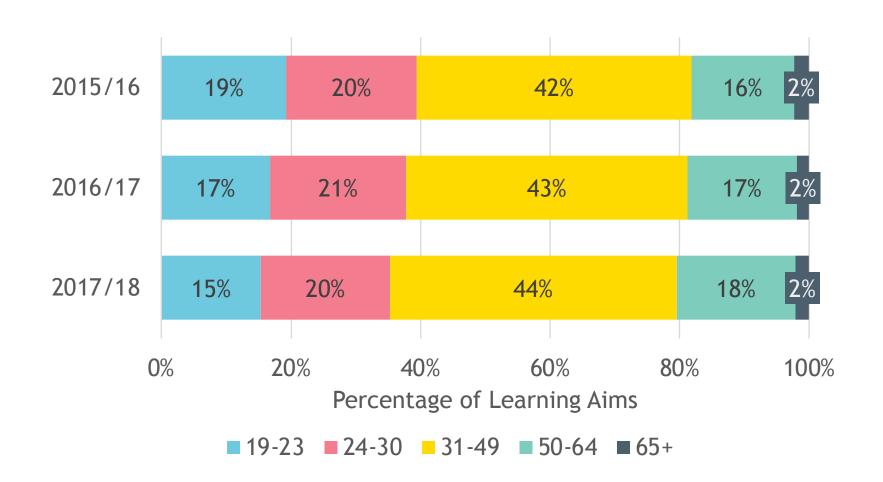
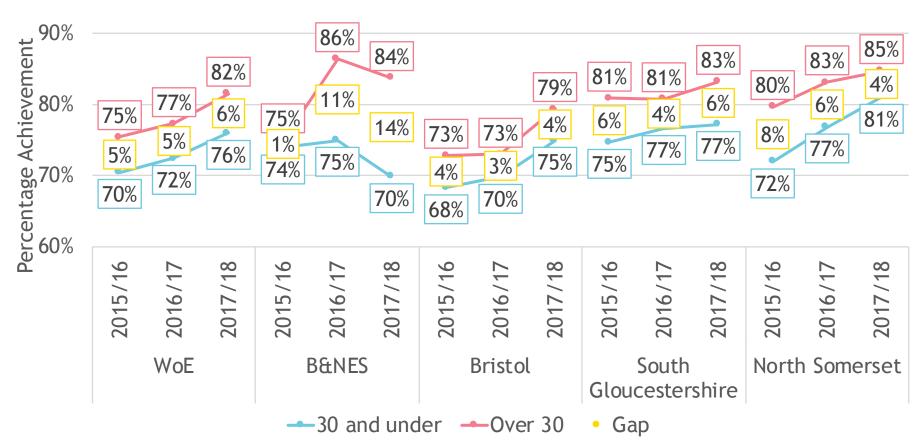


Figure 3.16: In-Year Achievement's Gap



In-year achievements have risen over the last 3 years across the West of England, with older learners having a higher proportion of achievements.

The in-year achievements gap in WoE between learners aged 30 plus and those aged 30 & under was 6% in 2017/18.

B&NES has had an increasing achievement gap over the last 2 years with 14% more learners over 30 achieving their learning aims than those aged 30 and under.



Adult Skills: Gender

There has been consistently more females than males enrolling on Adult Education courses for the last 3 years. This gender split is similar across all 4 Local Authorities. North Somerset has the most females compared to males.

In-year achievements are higher for males across all 4 Local Authorities. The gap between females and males is 4% for WoE, with the largest gap in B&NES at 8%.

Figure 3.16: Percentage of Enrolments

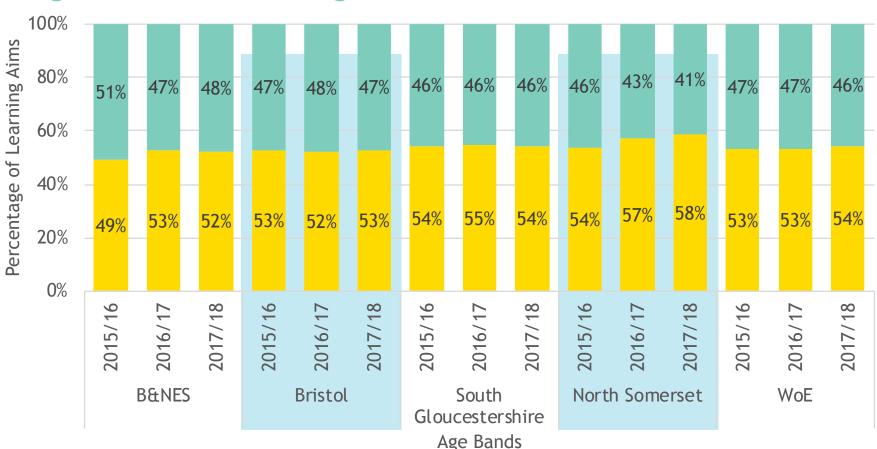
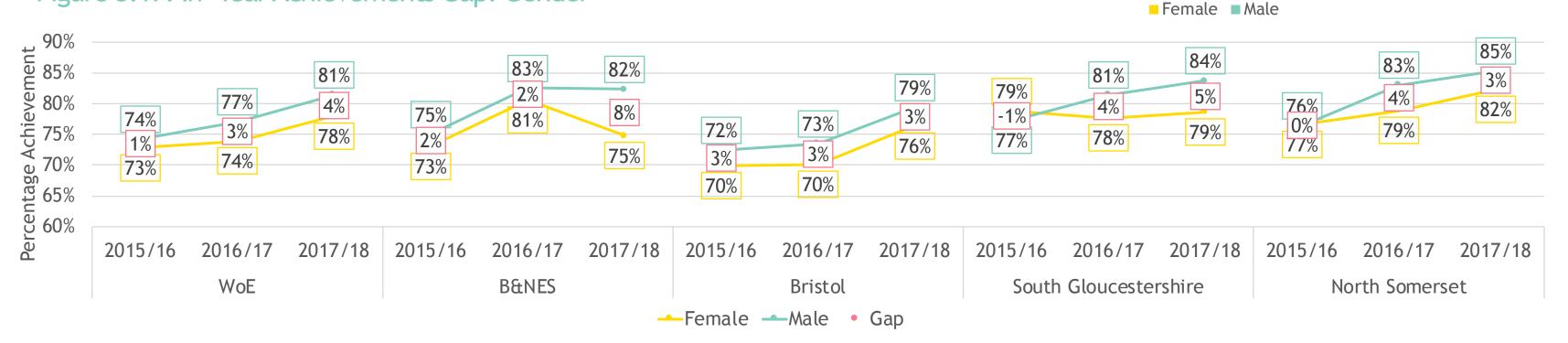


Figure 3.17: In- Year Achievements Gap: Gender



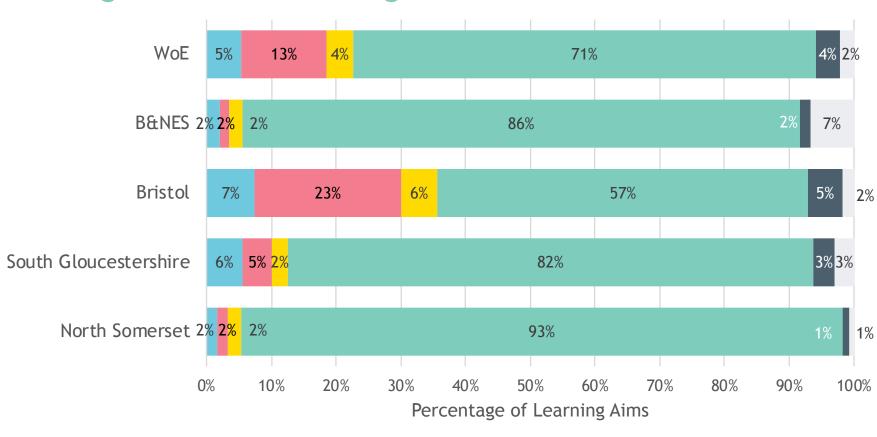


Adult Skills: Ethnicity

The majority of BAME learners are based in Bristol with the highest percentage of Black ethnicities. North Somerset has the lowest percentage of BAME learners.

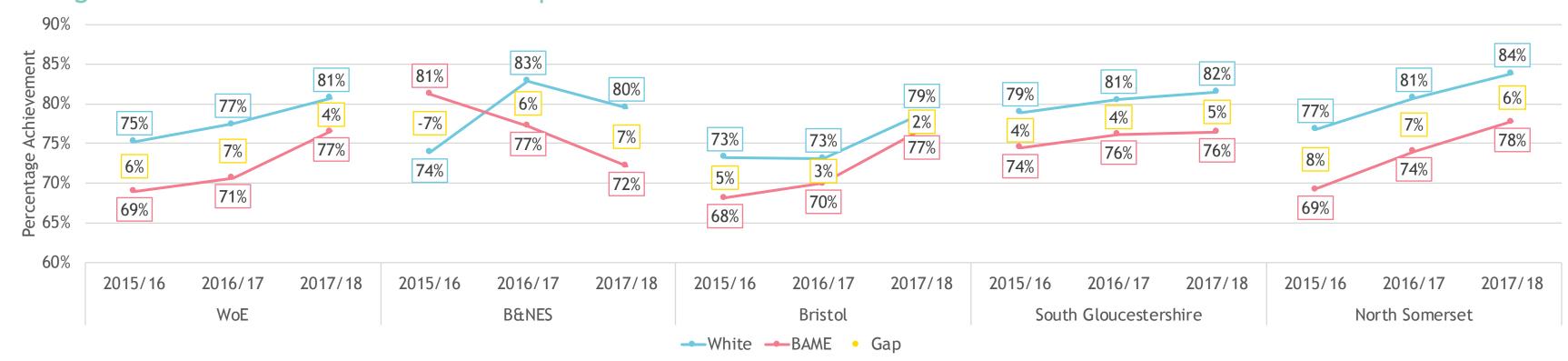
Achievements for White and BAME groups has increased from 2015/16 to 2017/18 across WoE and in most Local Authorities while the in-year achievements gap has decreased. In B&NES BAME learners have more in-year achievements that White learners.

Figure 3.18: Percentage of Enrolments in 2017/18



■ Asian ■ Black ■ Mixed ■ White ■ Other ■ Not Known

Figure 3.19: In-Year Achievements Gap





Adult Skills: Employment Status

In 2017/18 almost half the learning aims (47% in WoE) were started by learners that were not employed and were looking for work. Learners that were employed or self employed with low numbers of hours were less likely to enrol for Adult Education than those working 20 hours or more a week.

Adult Skills: Prior Attainment

In 2017/18 half the learning aims (50% in WoE) were started by learners that either had no qualifications or were qualified to below Level 2.

Bristol had proportionally more learners with no qualifications (32%), while B&NES had less with 11%.

North Somerset had a quarter of learners with a Full Level 2 as well as proportionally more that WoE with a Full Level 3.

Figure 3.18: Percentage of Enrolments in 2017/18: Employment Status

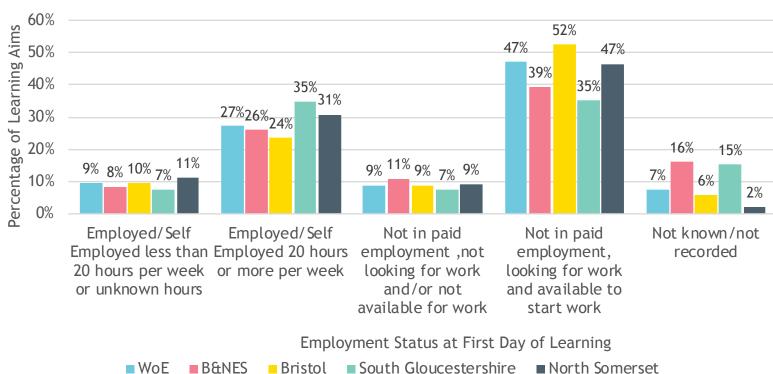
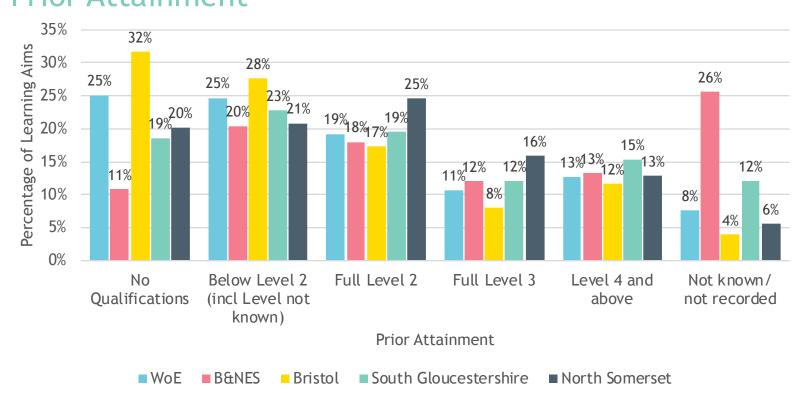


Figure 3.19: Percentage of Enrolments in 2017/18: Prior Attainment





Adult Skills: Learning Difficulty and/or Disability and/or Health Problem (LLDD)

In 2017/18 almost a quarter of learning aims in the West of England were taken by learners with a learning difficulty and/or disability and/or health problem (LLDD).

B&NES had almost a third of LLDD learners while South Gloucestershire had 22%.

There was not a significant achievement gap between LLDD learners and non-LLDD learners across any of the Local Authorities.

In South Gloucestershire, in-year achievements were slightly higher for LLDD learners (83%) that non-LLDD learners (80%).

Figure 3.20: Percentage of Enrolments in 2017/18: LLDD

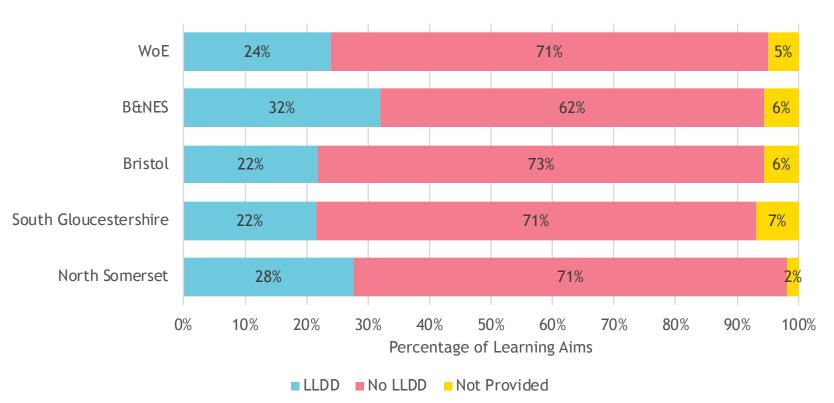
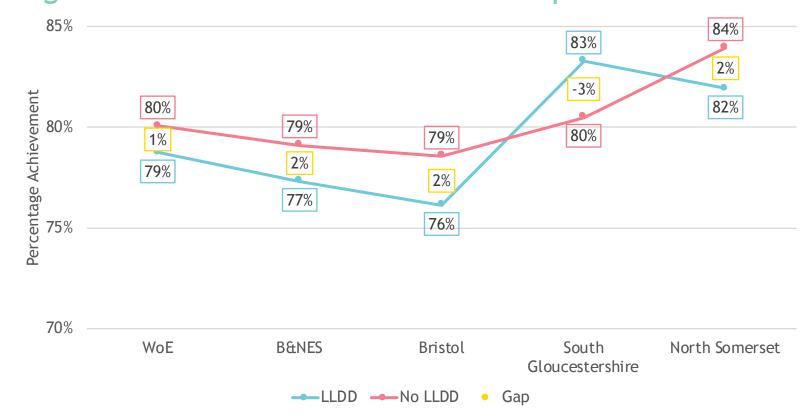


Figure 3.21: In Year Achievements Gap: LLDD





Adult Skills: Sector Subject Area

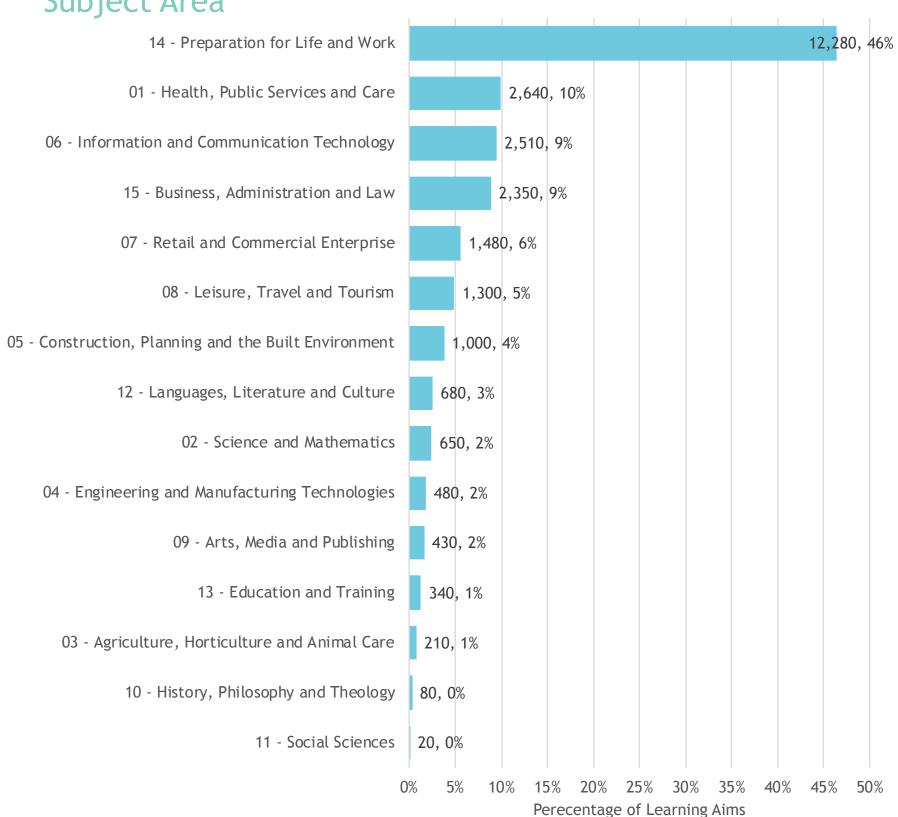
In 2017/18 almost half the learning aims (46%) were in the sector subject area 'Preparation for Life and Work'. The next most popular subject areas were 'Health, Public Services and Care', and, 'Information and Communication Technology'.

In B&NES less than a third of courses (31%) were 'Preparation for Life and Work'.

In South Gloucestershire 'Business, Administration and Law' and 'Leisure, Travel and Tourism' were both more popular than 'Information and Communication Technology'.

In North Somerset 'Business, Administration and Law' was the 3rd most popular subject area.







Apprenticeships: Learners/Enrolments Overview⁵⁵

The number of distinct learners have fluctuated over the past three years, peaking in 2016/17. This could be due to the introduction of the Apprenticeship Levy, which came into effect on the 6th April 2017.

The number of units (or learning aims) being studied in an academic year is quantified by the number of enrolments. The overall number of enrolments has decreased over the past three years. In 2017/18 the average learners in the West of England had 3.24 enrolments.

Figure 3.23: Number of Distinct Learners

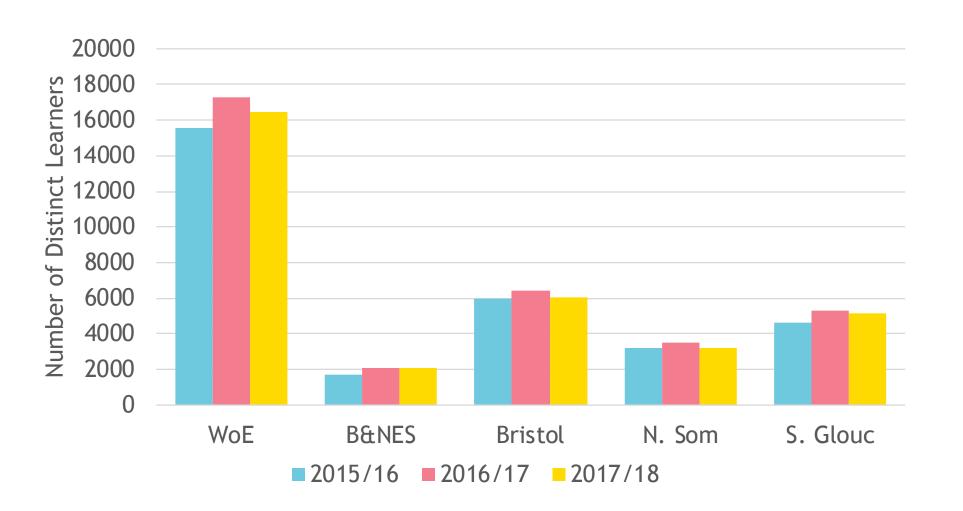
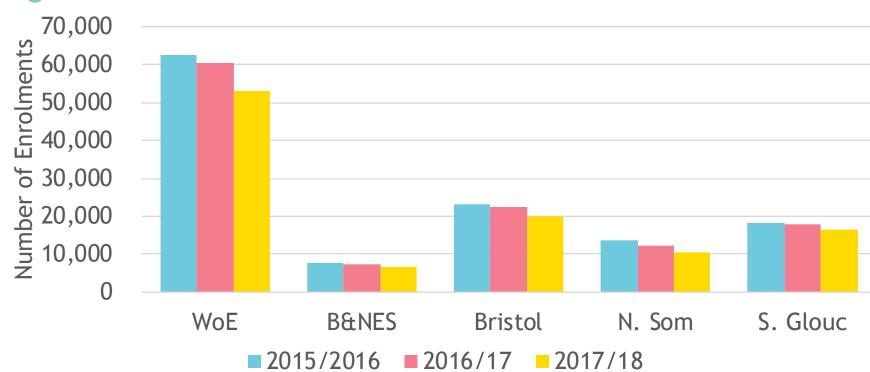
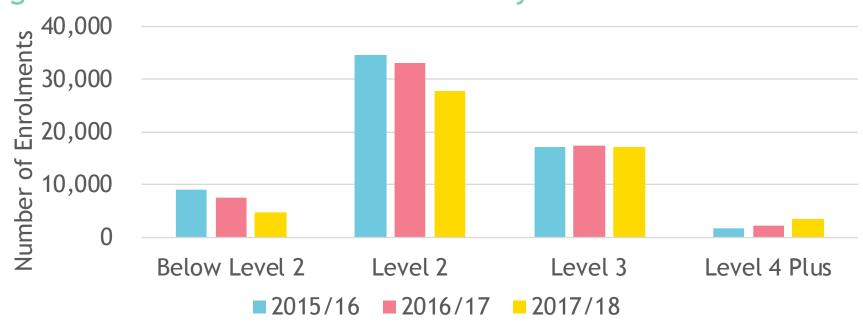


Figure 3.24: Number of Enrolments



Enrolments for Level 2 qualifications is the highest but has decreased over the past three years. Level 4 plus enrolments are increasing over the same time period but remain the smallest proportion of enrolments.

Figure 3.25: Number of Enrolments by Level





Apprenticeships: Achievements Overview⁵⁶

Achievements rates as published in the Statistical First Release are calculated using the number of framework aims with a planned end date in a given year.

The achievement rates for WoE have remained fairly constant over the last 3 years. B&NES have the lowest cohort but consistently high achievement rates. S. Gloucestershire had the highest achievement rates in 2015/16 and 2016/17 but have dropped slightly in 2017/18. Achievement rate for the 2017/18 cohort is similar across all levels. The highest rate was for level 4+ apprenticeships (69%) and lowest for Level 2 (64%).

Figure 3.27: Achievement Rate by Apprenticeship Level

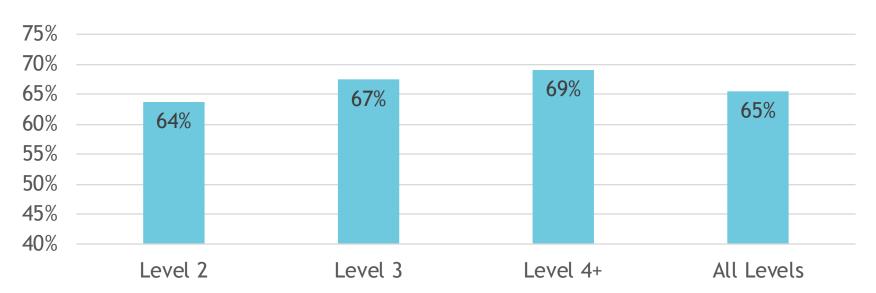
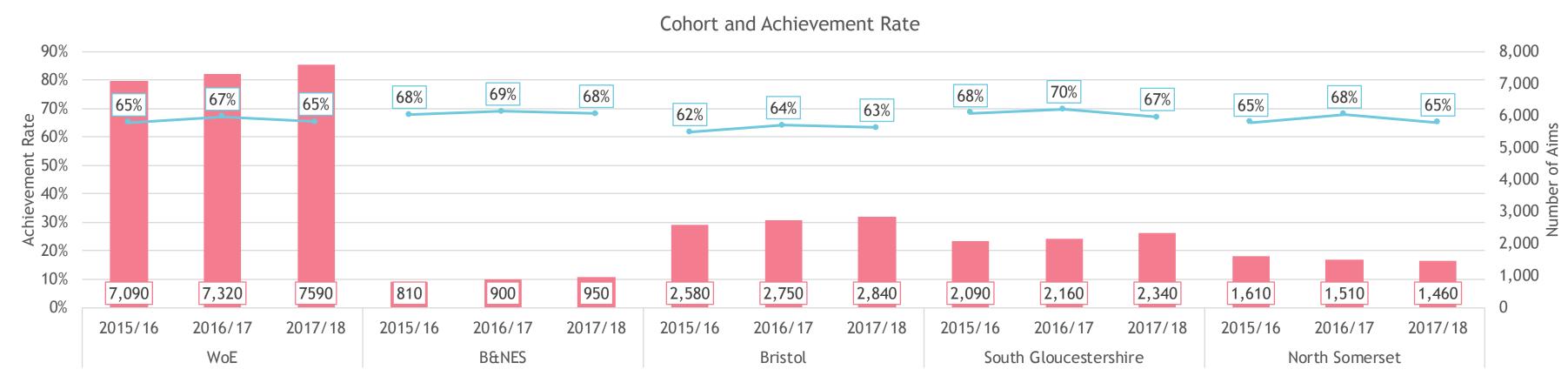


Figure 3.26: Achievement Rate

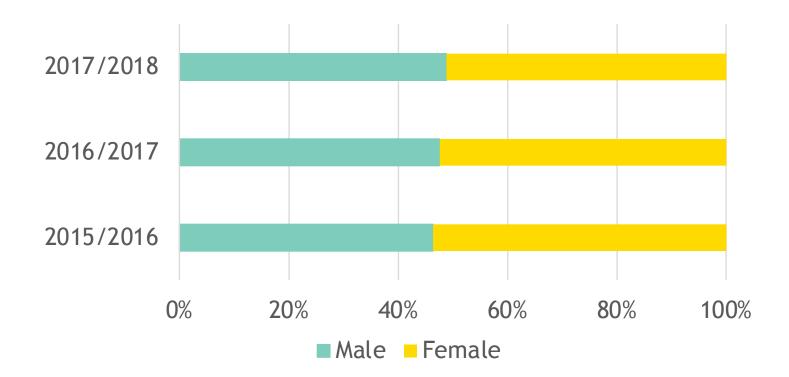




Apprenticeships: Gender

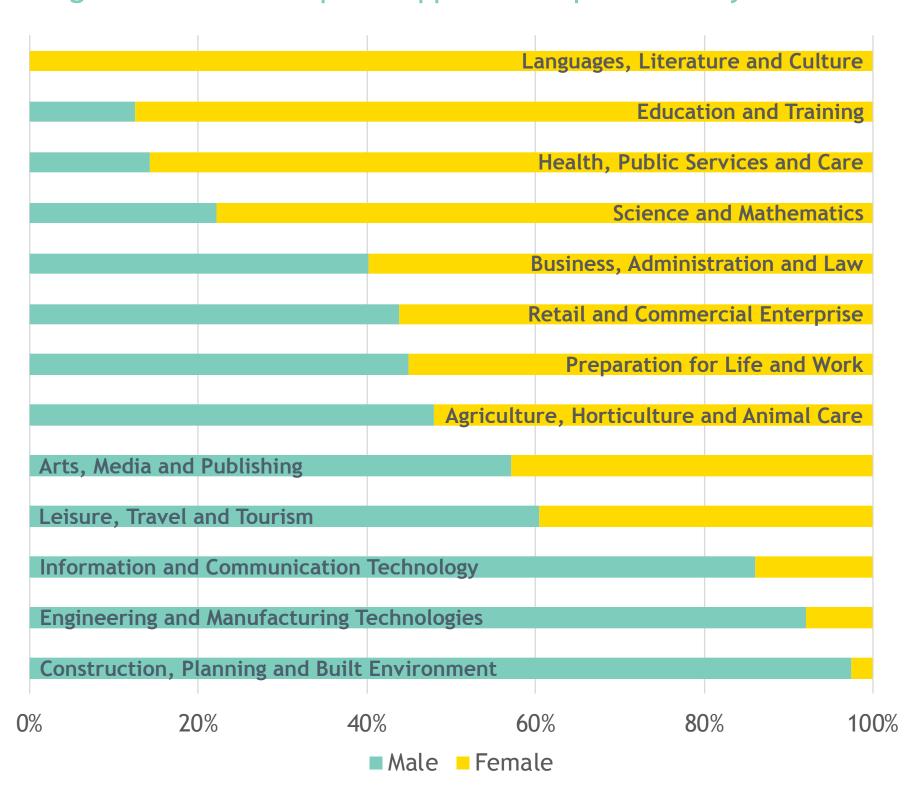
There are more females taking apprenticeships than males across the West of England, however the proportion has become more balanced over the past three years. In 2017/18 there were a similar numbers of male and female apprentices overall (51% Females, 49% Male).

Figure 3.28: Gender Split of Apprenticeship Learners



There are large variations in the gender split depending on the sector of the apprenticeship (as shown in figure 3.29). More needs to be done to attract females into certain sectors.

Figure 3.29: Gender Split of Apprenticeship Learners by Sector



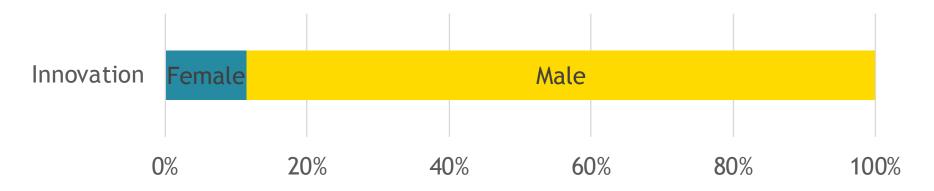


Apprenticeships: Innovation

In order to explore apprenticeships in the innovation space we have considered apprenticeships in three sectors. (Science and Mathematics, Engineering and Manufacturing Technologies, Information and Communication Technology). These had a total of 2,310 learners in 2017/18.

These learners were predominately male (89%). Although, 78% of learners on a science and maths apprenticeship are female, however it only has a small proportion of learners compared to the other sectors. 46% of learners on 'innovation apprenticeships' are age between 19-24. Engineering and Manufacturing (4%) and ICT (6%) have low BAME proportion in comparison to Science and Maths (11%).

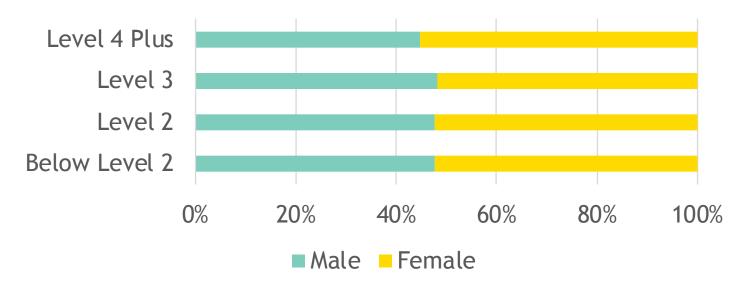
Figure 3.30: Gender split for innovation





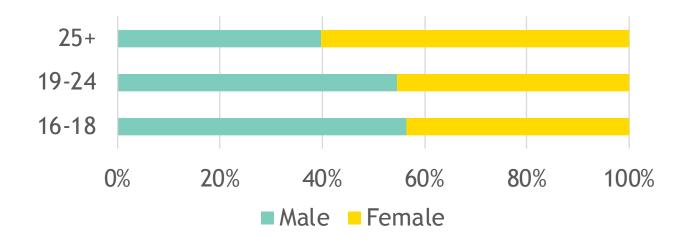
The female to male ratio is greater to Level 4 plus apprenticeships with females making up 55% of learners at this level in 2017/18.

Figure 3.31: Level Gender Split



In 2017/18 there were a greater proportion of females (60%) aged 25+, and a greater proportion of males (56%) aged16-18.

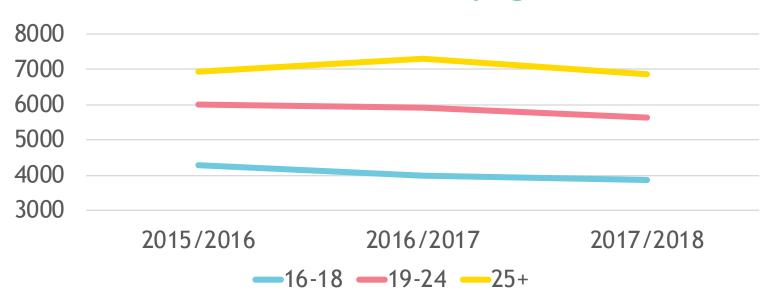
Figure 3.32: Age/Gender Split



Apprenticeships: Age/Achievement

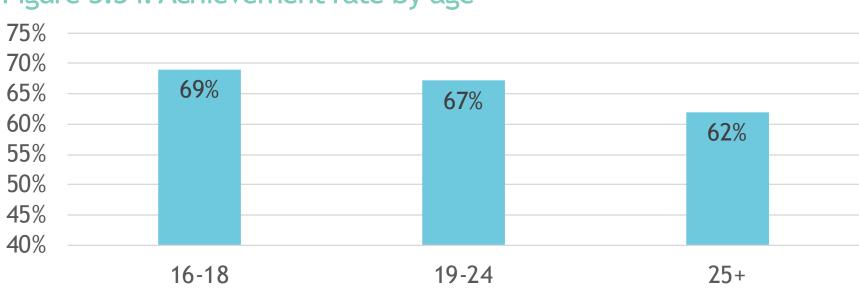
The number of learners in age category have fallen over the past three years. The number of 16-18 year old has seen the biggest decrease.

Figure 3.33: Number of distinct leaners by age



Achievement rates for the 2017/18 cohort is highest in 16-18 year olds (69%) and lowest in 25+ year olds (62%).

Figure 3.34: Achievement rate by age

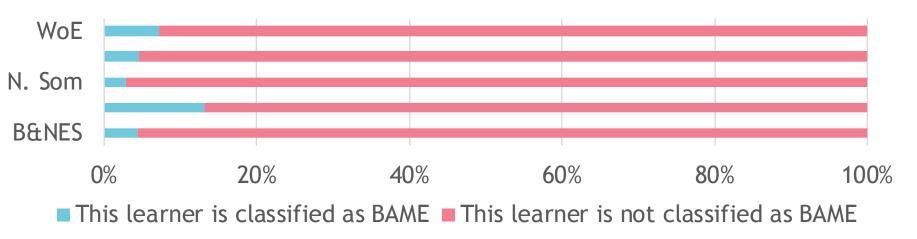




Apprenticeships: BAME

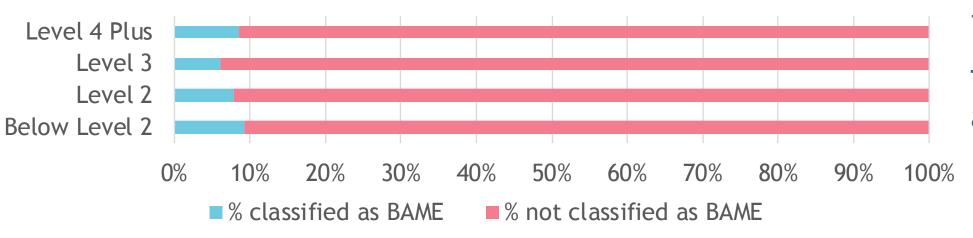
BAME learners make up 8% of all learners across the West of England, this 13% of apprenticeship learners across the west of England consider is broadly in line with the population profile of the working age population (9% BAME). Within the UA's Bristol has the highest proportion of BAME learners (15%).

Figure 3.35: Proportion of BAME distinct learners



BAME learners make up a higher proportion of learners (9%) for apprenticeships below level 2 and level 4 plus.

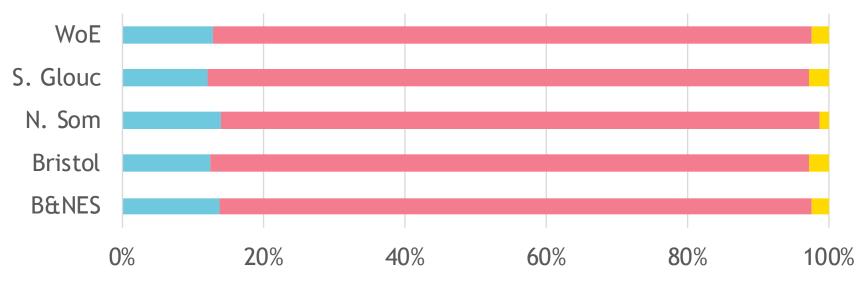
Figure 3.36: Level studied by BAME



Apprenticeships: LLD

themselves LLD.

Figure 3.37: Proportion of LLD Learners by UA



- Learner considers himself or herself to have a learning difficulty and/or disability and/or health problem
- Learner does not consider himself or herself to have a learning difficulty and/or disability and/or health problem
- No Information Provided By The Learner

Higher proportion of Females (14%) than Males (11%) consider themselves to have a learning difficulty and/or disability and/or health problem.

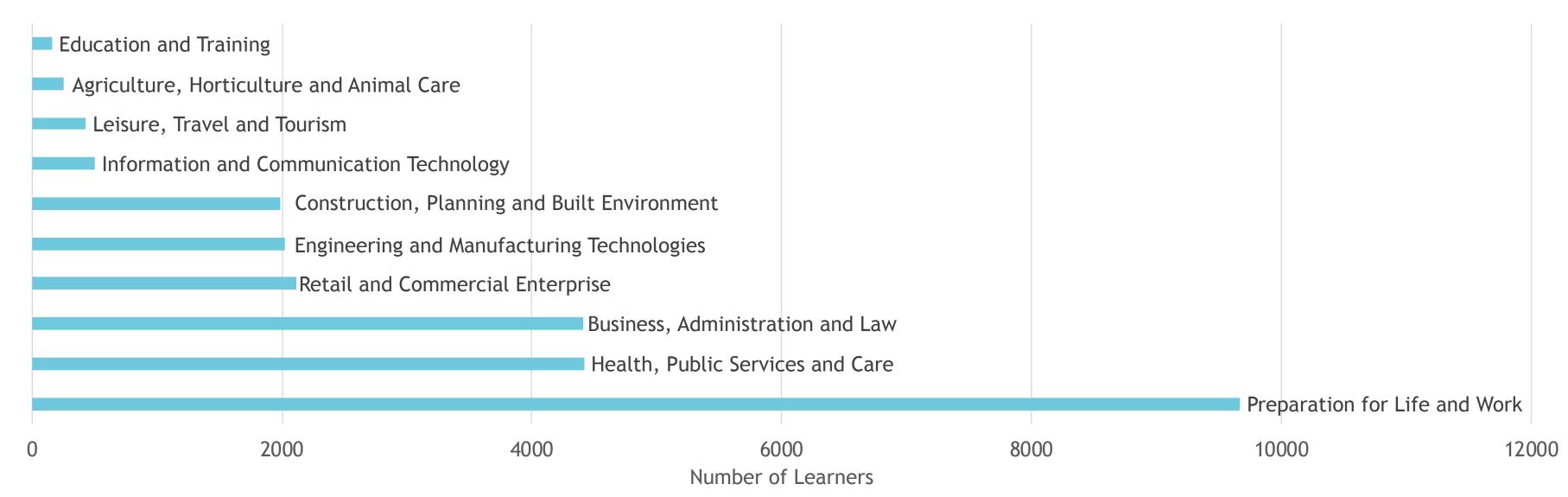
The percentage of learners with who consider themselves LLD decreases as the apprenticeship level increases. (14% below level 2; 11% Level 4+)



Apprenticeships: Sector (Number of Learners by Sector)

Some sectors have significantly more learners than others. 94% of all learners are found across the top 6 sectors. The largest sector for apprenticeships in the region is Preparation for Life and Work, which contains 37% of all learners.

Figure 3.38: Distinct learners by Sector



There are three Sectors with fewer than 100 learners:

- Science and Mathematics
- Arts, Media and Publishing
- Languages, Literature and Culture

Sectors with no learners:

- Social Sciences
- History Philosophy and Theology



SOURCES



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⁴ Source: Population Estimates, ONS

⁵ Source: Population Projections, ONS

⁶ PwC Analysis: International Migration, ONS

⁷ PwC Analysis: Internal Migration, ONS

⁸ Source: Annual Population Survey, ONS

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¹³ Source: Job Seekers Allowance, NOMIS

¹⁴ Source: Claimant Count, NOMIS

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¹⁷ Source: Annual Population Survey, ONS

¹⁸ Source: Annual Population Survey, ONS

¹⁹ Source: Labour Insight, Burning Glass

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²² West of England Workings: Source: Annual Survey of Hours and Earnings, ONS and Living Wage Foundation

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- ²⁸ West of England Workings: House Price Index & Annual Survey of Hours and Earnings
- ²⁹ Source: Valuation Office Agency
- ³⁰ West of England Workings: Valuation Office Agency & Annual Survey of Hours and Earnings
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- ³⁵ Source: Annual Population Survey, ONS
- ³⁶ Source: Business Register and Employment Survey, ONS
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- ³⁹ Source: Employer Skills Survey (2017), DfE
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- ⁴¹ Source: OECD http://www.oecd.org/employment/future-of-work/
- ⁴² Source: Labour Insight, Burning Glass



Section 3: Skills Supply

⁴³ Source: gov.uk

⁴⁴ Source: Key Stage 2 Performance Data, DfE

⁴⁵ Source: Key Stage 4 Performance Data, DfE

⁴⁶ Source: Key Stage 5 Performance Data, DfE

⁴⁷ Source: NEET Data by Local Authority, DfE

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⁴⁹ Source: Unlocking Regional Growth, CBI (2017) https://cbicdnend.azureedge.net/media/1170/cbi-unlocking-regional-growth.pdf?v=20190529.1

⁵⁰ Source: POLAR 4, Office for Students https://www.officeforstudents.org.uk/data-and-analysis/polar-participation-of-local-areas/

⁵¹ Source: Key stage 5 destination measures 2016 to 2017, DfE

⁵² Source: HESA, https://www.hesa.ac.uk/data-and-analysis

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⁵⁴ Source: WECA Analysis of the ESFA Data Cube on Adult Learning

⁵⁵ Source: WECA Analysis of the ESFA Data Cube on Apprenticeships

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