

# 2012–2016 Construction Skills Network Yorkshire and Humber

LABOUR MARKET INTELLIGENCE



# Contents

1. Summary and key findings	04
2. The outlook for construction in Yorkshire and Humber	06
3. Construction employment forecasts for Yorkshire and Humber	12
4. Comparisons across the UK	14
5. CSN explained	16
5.1 CSN methodology	17
5.2 Glossary of terms	18
5.3 Notes and footprints	19
5.4 Definitions: types and examples of construction work	20
5.5 Occupational groups	22
5.6 CSN website and contact details	25

## Tables and Charts

1. Annual average construction output growth 2012–2016	04
2. Regional comparison 2012–2016	05
3. Construction output 1994–2010	06
4. Construction industry structure 2010	06
5. Economic structure	07
6. Economic indicators	07
7. New construction orders growth 1994–2010	08
8. New work construction orders	08
9. Annual average construction output growth 2012–2013	09
10. Construction output 2012–2013	10
11. Annual average construction output growth 2012–2016	11
12. Construction output 2012–2016	11
13. Total employment by occupation	12
14. Annual recruitment requirement by occupation	13
15. Annual average output growth by region	15
16. Annual recruitment requirement by region	15

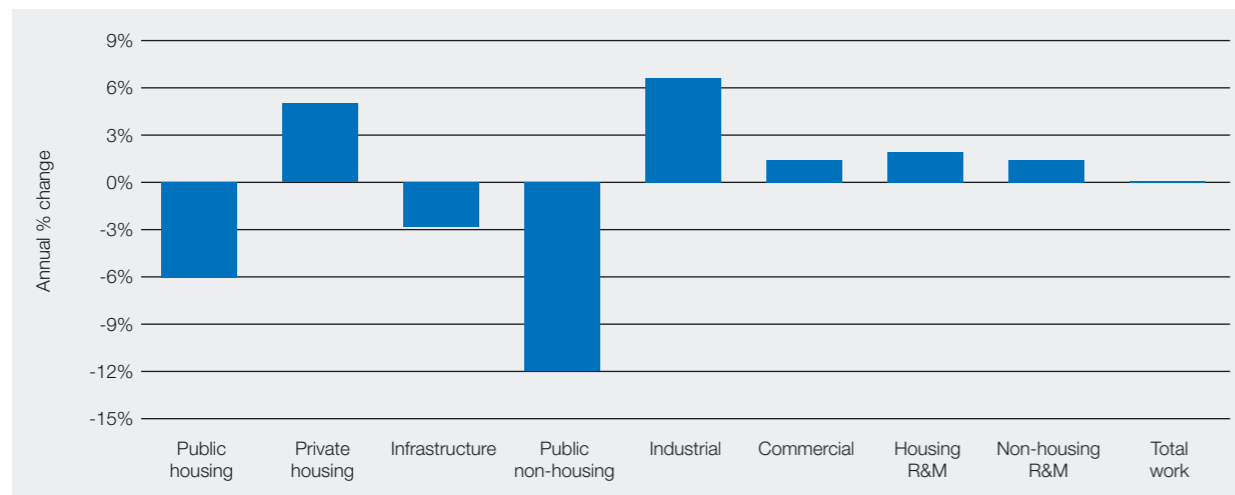
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# 1. Summary – Yorkshire and Humber

The region's construction industry is expected to stagnate over the forecast period with no annual average growth predicted. The repair and maintenance (R&M) sector (1.6%) is expected to perform better compared with the new work market (-1.0%). Public non-housing will see the greatest decline in the five years to 2016 an annual average growth rate of -12.0%. Construction employment in the region is forecast to reach 216,310 in 2016 which is 3% higher than in 2012.

Annual average construction output growth 2012-2016 - Yorkshire and Humber



Source: CSN, Experian ref. CSN Explained, Section 5.3, Note 2

Eco Village  
Gentoo Group



With growth of 1.6%, repair and maintenance is expected to perform better than new work (-1.0%)

## Key findings

The industrial sector is projected to have the best annual average growth rate (6.6%) during the 2012-2016 period. Private housing (5%) and the commercial (1.4%) sectors will also see rises in activity. The projected increase in output in the private housing sector over the forecast period is in line with that seen over the last growth period, 1995-2007, of 5.1% a year on average.

One of the big projects in the pipeline for the commercial market is a £100m Chinese styled theme park in Rotherham. If planning permission is successful it is expected that the project will take approximately 18 to 24 months to build.

The public non-housing sector will see the biggest fall as outturn decreases by 12% a year on average in the five years to 2016. Yorkshire and Humber benefited quite strongly from the Building Schools for Future (BSF) programme. Currently there are only a handful of schools still to be developed with almost all schools post wave 4 stopped. This, alongside relatively little funding available under the ProCure 21+ programme when compared to the ProCure 21 framework, leads to the strong falls in output.

The public housing (-6.1%) and infrastructure (-2.8%) sectors are also predicted to see negative growth during the forecast period. This is despite £150m of managed motorways construction on the M62 along with ports and power station work.

Construction employment in Yorkshire and Humber is forecast to reach 216,310 in 2016, 3% higher than 2012 but 7% lower when compared to 2010.

Civil engineers are expected to see the biggest rise in employment levels of 18% in 2016 when compared to 2012. Construction managers follow closely behind as employment increases by 14%. In absolute terms this occupation sees the largest increase as employment increases by 3,140 to 25,880. Other construction specific occupations such as labours nec. (11%) and other construction professionals and technical staff (4%) also see growth in employment levels.

The annual recruitment requirement (ARR) for Yorkshire and Humber, at 2,630, represents 1.3% of projected 2012 base employment, below the national average of 1.9%. This is not surprising considering the low employment demand in the region and the fact that it has very little workforce outflows to other regions.

At 630 and accounting for 24% of Yorkshire and Humber's total ARR, construction managers are the most in demand in the region.

## Regional comparison 2012-2016

	Annual average % change in output	Growth in total employment	Total ARR
North East	0.5%	4,840	2,170
Yorkshire and Humber	0.0%	-6,370	2,630
East Midlands	1.0%	-1,800	3,460
East of England	2.9%	10,660	5,710
Greater London	2.5%	16,560	1,790
South East	2.2%	28,020	4,520
South West	2.2%	9,560	7,220
Wales	1.3%	11,590	4,280
West Midlands	-1.1%	-7,360	3,730
Northern Ireland	2.1%	3,880	1,170
North West	-0.9%	-6,990	5,080
Scotland	1.3%	13,520	4,480
<b>UK</b>	<b>1.4%</b>	<b>76,110</b>	<b>46,240</b>

Source: CSN, Experian ref. CSN Explained, Section 5.3, Note 2

## 2. The outlook for construction in Yorkshire and Humber

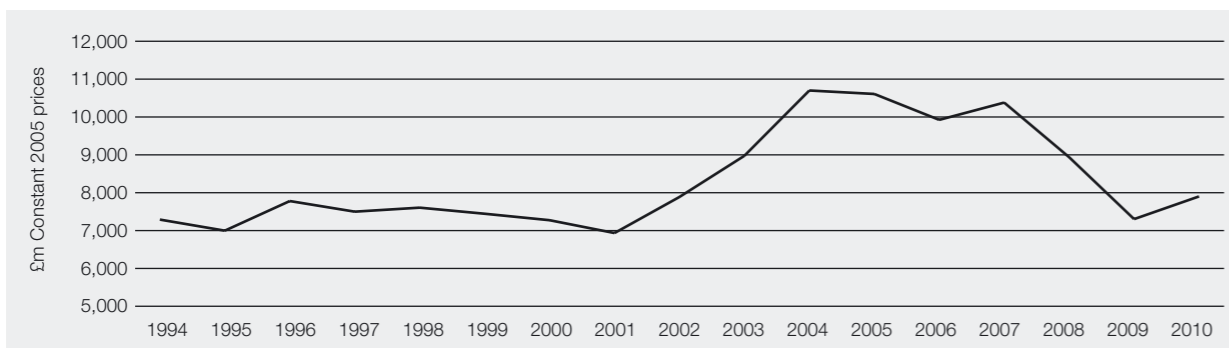
### 2.1 Construction output in Yorkshire and Humber – overview

Total construction output in 2010 stood at £7.9bn (2005 prices) up 8% on the previous year. The new work sector grew by 7% whilst repair and maintenance increased by 10%.

Public non-housing output increased by 53% to £1.3bn, the highest level since in the deflated series for the region, which

begins in 1990. Public housing followed closely behind as the sector grew by 51% boosted by work funding by the 2008-11 National Affordable Housing Programme (NAHP). Over the last couple of years the industrial sector has declined dramatically. In 2010 the market saw a fall of 25% to £327m, the lowest level in the deflated data series.

#### Construction output 1994-2010 - Yorkshire and Humber



Source: ONS  
ref. CSN Explained, Section 5.3, Note: 1

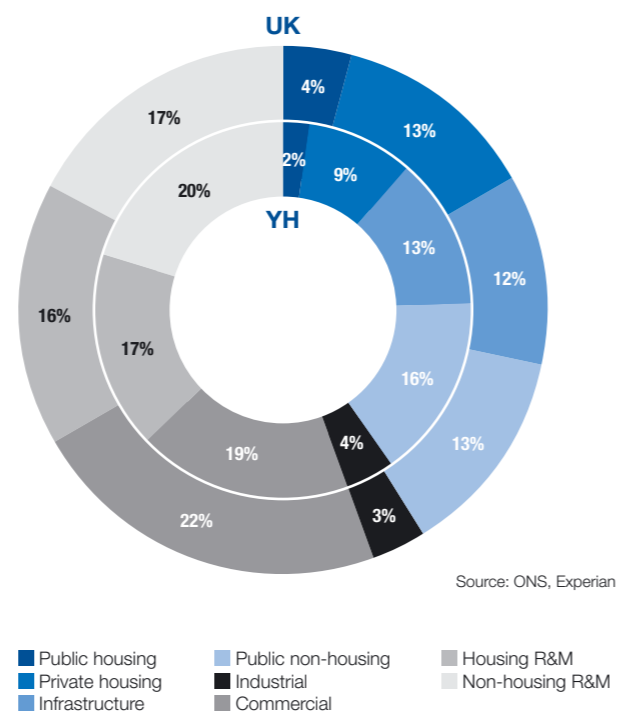
### 2.2 Industry structure

The diagram, Construction Industry structure 2010 – UK vs. Yorkshire and Humber, illustrates the sector breakdown of construction in the region compared to that in the UK. The percentages for each sector illustrate what proportion of total output each sector accounts for.

In 2010 as a share of total output Yorkshire and Humber's new work market was smaller (63%) than that of the UK (67%).

Housing accounted for only 11% of work in Yorkshire and Humber in 2010, compared with 17% in the UK as a whole. The commercial sector is also smaller in the region than the UK average (19% compared with 22%). In contrast, the public non-housing sector is proportionally larger in Yorkshire and Humber than in the UK (16% vs. 13%).

#### Construction industry structure 2010 - UK vs. Yorkshire and Humber



Source: ONS, Experian

#### Economic structure - Yorkshire and Humber (£ billion, 2006 prices)

Selected sectors	Actual	Forecast					
		Annual % change, real terms					
	2010	2011	2012	2013	2014	2015	2016
Public services	21.3	1.5	-0.6	-0.5	-0.4	-0.1	0.2
Financial and business services	15.8	1.0	1.5	2.1	2.5	2.9	3.1
Transport and communications	6.3	2.6	0.6	1.3	1.6	2.0	2.1
Manufacturing	15.2	2.0	2.5	3.0	2.2	1.6	1.0
Distribution, hotels and catering	11.9	1.2	0.5	1.5	2.0	2.3	2.7
<b>Total Gross Value Added (GVA)</b>	<b>85.1</b>	<b>1.0</b>	<b>0.6</b>	<b>1.3</b>	<b>1.5</b>	<b>1.7</b>	<b>1.8</b>

Source: Experian  
ref. CSN Explained, Section 5.3, Note 3

### 2.3 Economic overview

The expected performance of a regional or national economy over the forecast period (2012–2016) provides an indication of the construction sectors in which demand is likely to be strongest.

### 2.4 Economic structure

In 2010 Yorkshire and Humber's Gross Value Added (GVA) increased by 4% to £85.1bn (2006 prices), and accounted for 7% of UK GVA.

The manufacturing sector saw the greatest growth as output increased by 15%. Transport and communications and public services also saw rises in activity, of 5.9% and 0.9% respectively. The financial and business services sector saw the greatest decline of 2.2%. Distribution, hotels and catering output also fell, by 1.2%.

### 2.5 Forward looking economic indicators

GVA for Yorkshire and Humber is expected to increase at a modest rate over the forecast period. The highest rate of growth (1.8%) is forecast to be seen in 2016. The manufacturing sector is predicted to see moderate growth with the strongest increase, of 3.0%, anticipated in 2013. Thereafter growth in the sector is expected to decelerate. Transport and communications and financial and business services are also forecast to see moderate growth levels. The public services sector is expected to see output fall between 2012 and 2015, with the biggest decline in 2012 (-0.6%). A marginal recovery is predicted in 2016 with the sector growing by 0.2%.

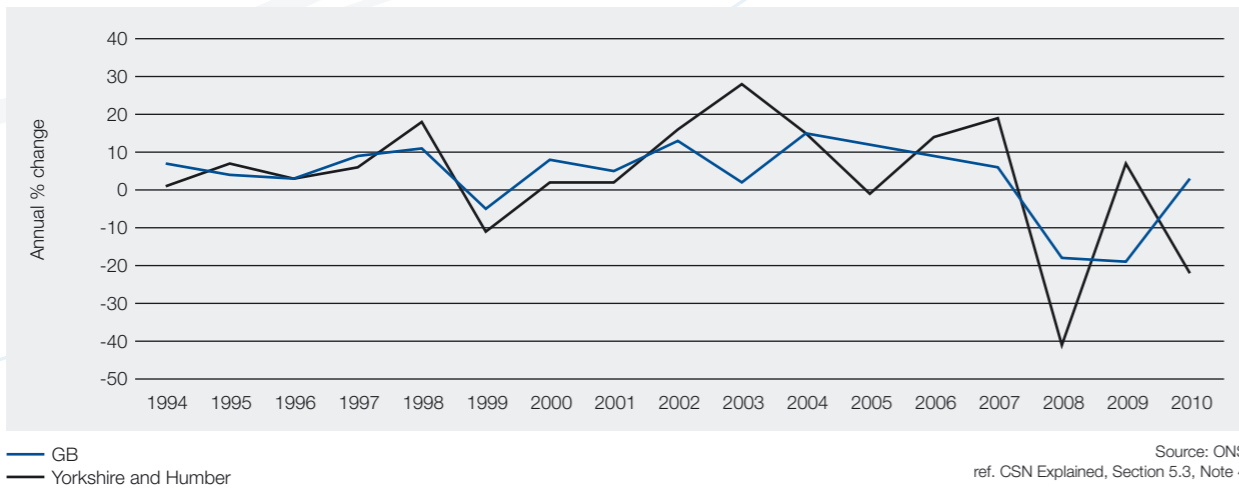
Real household disposable income is estimated to have declined in 2011, by 2.7%, a little worse than the UK average (2.2%). Thereafter growth in incomes is expected for each subsequent year of the forecast period. In 2016 incomes will grow at their highest rate of 2.4%. This same pattern is also true for household spending and house prices. LFS unemployment is estimated to have fallen in 2011 but weakening GVA growth could see it ticking up again in 2012. Thereafter the trend should be one of slow decline.

#### Economic indicators - Yorkshire and Humber (£ billion, 2006 prices - unless otherwise stated)

	Actual	Forecast					
		Annual % change, real terms					
	2010	2011	2012	2013	2014	2015	2016
Real household disposable income	71	-2.7	0.2	1.4	1.6	2.2	2.4
Household spending	63.3	-1.5	0.0	1.7	1.9	2.1	2.4
Working age population (000s and as % of all)	3,244.7	61.1	61.3	61.9	62.5	63.0	63.3
House prices (£)	152,505	-3.1	0.2	2.0	2.4	2.3	2.4
LFS unemployment (millions)	0.25	0.23	0.24	0.23	0.22	0.21	0.20

Source: ONS, DCLG, Experian

## New construction orders growth 1994-2010 - Yorkshire and Humber vs. GB



### 2.6 New construction orders – overview

In 2010 total new work orders fell by 22% to £3.5bn, their lowest level since 2002.

Infrastructure saw a very strong increase of 252% in 2009, largely due to the letting of contracts for A1 upgrades and term contracts made for water and sewerage works. Thus the big decline of 68% in 2010 to more normal levels was no surprise. The industrial and public non-housing sectors also saw falling orders in 2010 of 35% and 29% respectively. Private housing saw the biggest increase in orders of 41% whilst public housing followed closely behind with a 39% rise. The commercial sector saw a relatively modest growth as orders increased by nearly 13%.

### New work construction orders - Yorkshire and Humber (£ million, current prices)

	Actual	Annual % change				
	2010	2006	2007	2008	2009	2010
Public housing	201	-23.4	73.6	-28.4	-13.9	38.9
Private housing	613	14.9	12.9	-61.1	-31.6	41.2
Infrastructure	325	48.7	-25.1	-48.0	252.4	-68.1
Public non-housing	1,226	-1.8	19.2	-0.7	64.5	-29.1
Industrial	204	22.4	-30.0	-15.9	-39.3	-34.5
Commercial	945	12.1	59.0	-49.8	-44.7	12.5
<b>Total new work</b>	<b>3,514</b>	<b>14.0</b>	<b>18.9</b>	<b>-41.4</b>	<b>7.3</b>	<b>-21.6</b>

Source: ONS ref. CSN Explained, Section 5.3, Note 4

### 2.8 Construction output – short-term forecasts (2012–2013)

Regional Office for National Statistics (ONS) output statistics are published in current prices and are thus inclusive of any inflationary effect. At the time of writing, ONS construction output statistics were only available for the first two quarters of 2011.

Overall construction output fell by 2% in the six months to June 2011 when compared to the corresponding period of the preceding year. The R&M sector declined by 12% whilst

### 2.7 New construction orders – current situation

The first half of 2011 saw orders rise by 10% when compared to the first half of 2010.

The public housing (72%), infrastructure (54%) and private housing (45%) sectors all saw an increase. However the industrial (-7%), commercial (-4%) and public non-housing (-3%) sectors all saw small falls in orders.

the new work market increased by 4%. In the three months to June 2011, the greatest growth was seen in the infrastructure sector as output increased by 29% when compared to the previous quarter. The prognosis for 2011 as a whole is for output decline of around 8% in real terms.

Construction output in Yorkshire and Humber is expected to decline by an annual average rate of 1.3% over the 2012-2013 period. A big decline of 6% in 2012 is expected to be followed by growth of 3% in the following year.

The commercial market accounts for the largest share of new work and the market is expected to increase at a yearly average rate of 2.1%. Rotherham Council has backed China Vision Ltd and MCD Developments as first choice for a Chinese styled theme park. The £100m theme park will include gardens and oriental lakes as well as a spa, a hotel, a theatre and shops on a 120 acre site. If planning permission is successful it is expected that the project will take approximately 18 to 24 months to build.

The public non-housing sector accounts for the second largest share of the new work market. On an annual average basis the sector is expected to decline by nearly 17% over the two years to 2013. The region benefited strongly from the early waves of the BSF programme, with four separate programmes covering 59 schools in waves 1 to 4. Thus cancellation of the programme will hit education construction work in the region hard. Yorkshire and Humber also gained from investment pumped into approximately 20 hospitals/health centres under the ProCure21 framework. In contrast, under the ProCure21+ framework only Sheffield's Children's NHS Foundation Trust has benefited from funding (£1.8m).

Despite education projects winding down and a lack of funding available there are still some moderate sized schemes in the region. Interserve, the international support services and construction group, has completed a contract to design and build the new £32 million Leeds West Academy for Leeds City Council, delivered through Leeds LEP.

The infrastructure sector accounts for the third largest share of the new work market. On a yearly basis the sector is predicted to decline by 7.4%, however there are still sizeable projects in the region with improvements worth £150m currently being made to the M62 in West Yorkshire. As part of the project, new Emergency Refuge Areas (EARs) will be constructed which will allow vehicles in the event of a breakdown to stop safely away from live traffic. In total, six EARs will be built in the first phase of development between

junction 27 and junction 28. The work is expected to be fully completed in autumn/winter 2013.

North Yorkshire County Council has been offered £35.9m, an amount which was less than requested, from the Department for Transport to invest towards the A684 Bedale bypass. The council has until the beginning of 2012 to decide whether to accept the lower level of funding.

A plasma gasification plant is due to be constructed in the second half of 2012 subject to funding. The £40m plant in Hull is set to be built on a 1.7 acre site located on undeveloped land at King George Dock.

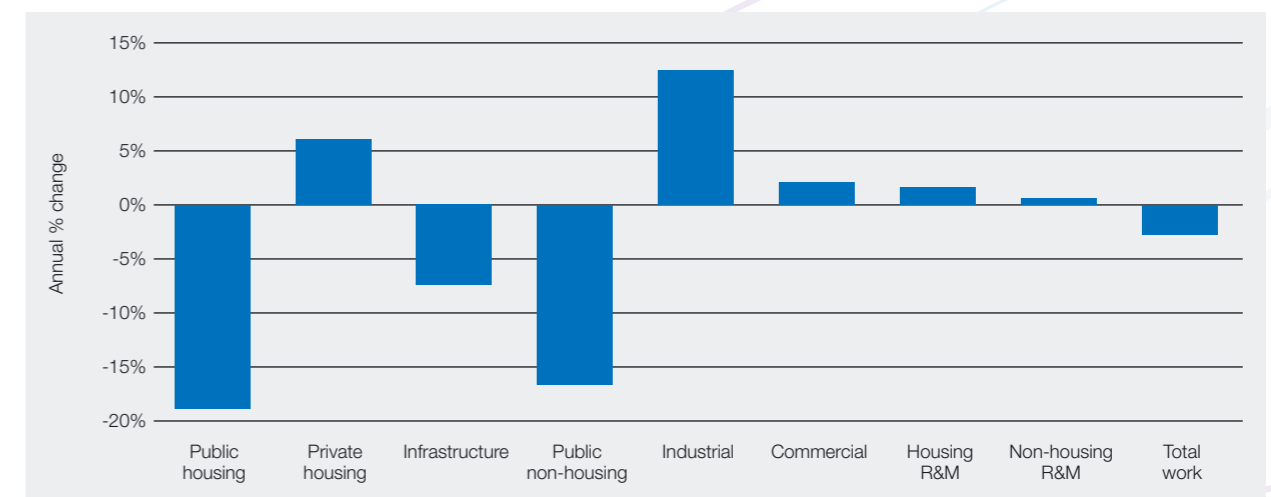
In the Autumn Statement the Chancellor of the Exchequer gave final approval to construct the Westernmost Rough Wind farm located 8km off the Yorkshire coast to the north of the Humber Estuary. The project will have a total installed capacity of up to 245MW. Contractor DONG Energy is to make a final investment decision on the scheme.

Leeds City Centre £150m flood scheme has been put on hold due to a lack of funding. The project which was due to be built along the River Aire is currently being reviewed by the council and the Environment Agency to find less costly options. It is thought the same level of defence as originally planned is no longer feasible, however work will be carried out that will provide Leeds with a greater level of protection than is currently in place.

The private housing, industrial and public housing sectors account for the fourth, fifth and sixth largest share of the new work market respectively. Whilst public housing is expected to see a 19% fall in its annual average growth rate, the private housing (6.1%) and industrial (12.5%) sectors will see rises in output.

The housing R&M sector is expected to see yearly average growth of 1.6% whilst the non housing R&M sector will see negligible growth of 0.6%.

### Annual average construction output growth 2012-2013 - Yorkshire and Humber



### Construction output - Yorkshire and Humber (£ million, 2005 prices)

	Actual	Forecast annual % change			Annual average
	2010	2011	2012	2013	2012-13
Public housing	197	-5%	-25%	-13%	-18.8%
Private housing	716	8%	4%	8%	6.1%
Infrastructure	1,023	-26%	-13%	-2%	-7.4%
Public non-housing	1,255	-15%	-22%	-11%	-16.6%
Industrial	327	-4%	10%	15%	12.5%
Commercial	1,463	0%	-4%	8%	2.1%
<b>New work</b>	<b>4,981</b>	<b>-8%</b>	<b>-8%</b>	<b>3%</b>	<b>-2.8%</b>
Housing R&M	1,321	-5%	-1%	4%	1.6%
Non-housing R&M	1,598	-8%	-2%	3%	0.6%
<b>Total R&amp;M</b>	<b>2,919</b>	<b>-7%</b>	<b>-2%</b>	<b>4%</b>	<b>1.0%</b>
<b>Total work</b>	<b>7,899</b>	<b>-8%</b>	<b>-6%</b>	<b>3%</b>	<b>-1.3%</b>

Source: Experian  
ref. CSN Explained, Section 5.3, Notes 1 and 2

### 2.9 Construction output – long-term forecasts (2012–2016)

The region's construction industry is expected to stagnate over the forecast period as an annual average growth rate of 0% is predicted. Public non-housing will see the greatest decline in the five years to 2016 as output is forecast to decline at an annual average rate of 12%.

The public housing sector is also forecast to decline in the five years to 2016 with a fall of 6.1% in output per year on average.

During the first quarter of 2011 the Homes and Communities Agency (HCA) allocated £16.6m to construct 443 homes for rent and £7m to construct 193 homes for low cost home ownership under the 2008-11 NAHP. The total funding made available under the scheme to the region was £425.5m. The new HCA operating areas have amalgamated the North East and Yorkshire and Humber, and the combined area is due to receive £181m funding from the much smaller 2011-2015 Affordable Housing Programme.

The infrastructure sector is also expected to see small average annual declines of 2.8% over the 2012 to 2016 period. In the Autumn Statement 2011 the Chancellor of the Exchequer approved funding to support the £290m electrification of the Transpennine Express route from Manchester to Leeds. Associated British Ports hopes to start work in summer 2012 on its £100m deepwater berth at Hull, the location for Siemens' plant to manufacture offshore wind turbines.

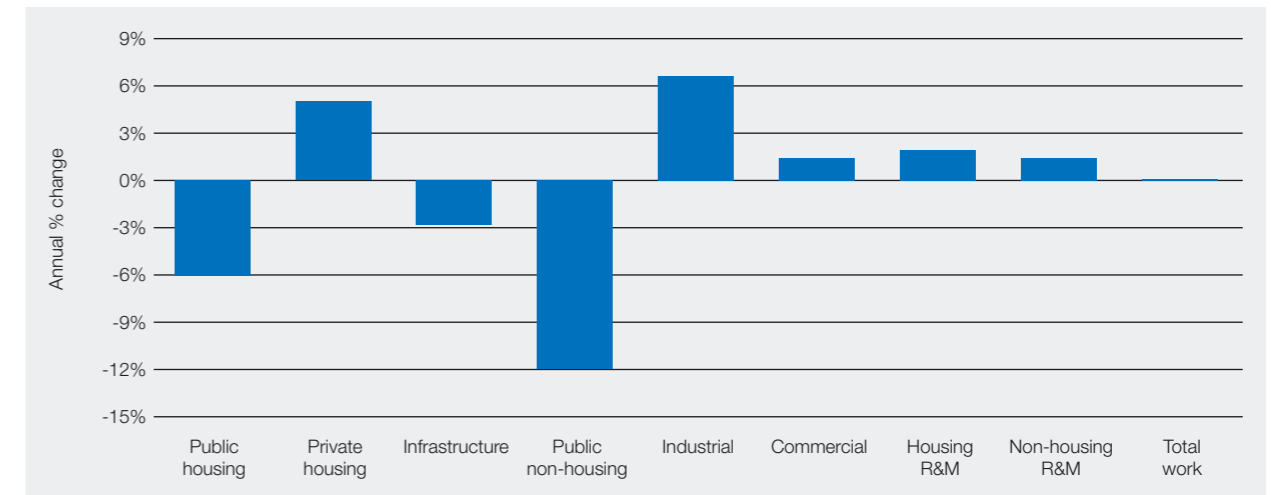
The industrial sector will see the biggest increase in output with a yearly average growth rate of 6.6%. Due to the size of the sector, small changes in the value of output tend to be magnified in percentage terms.

The private housing sector follows closely behind with annual average growth of 5.0% expected in the five years to 2016. This is pretty much in line with the average growth levels across the last upward part of the economic development cycle which averaged 5.1% between 1995 and 2007.

Annual average growth is a much more modest 1.4% for the commercial sector. The Barnsley Markets Project was given the green light in November 2011. The scheme will replace the Metropolitan shopping centre and the 52,000m<sup>2</sup> development will provide the town with a major new shopping centre, a series of cafes, a six-screen cinema, restaurants and parking for more than 800 cars. The £70m project is due to be completed in 2015.

Both the housing and non-housing R&M sectors will see positive annual average growth rates of 1.9% and 1.4% respectively.

### Annual average construction output growth 2012-2016 - Yorkshire and Humber



Source: CSN, Experian  
ref. CSN Explained, Section 5.3, Note 2

### Construction output - Yorkshire and Humber (£ million, 2005 prices)

	Estimate	Forecast annual % change					Annual average
	2011	2012	2013	2014	2015	2016	2012-16
Public housing	188	-25%	-13%	1%	7%	3%	-6.1%
Private housing	775	4%	8%	5%	5%	3%	5.0%
Infrastructure	757	-13%	-2%	1%	1%	-1%	-2.8%
Public non-housing	1,070	-22%	-11%	-17%	-5%	-4%	-12.0%
Industrial	313	10%	15%	3%	4%	1%	6.6%
Commercial	1,459	-4%	8%	1%	1%	1%	1.4%
<b>New work</b>	<b>4,562</b>	<b>-8%</b>	<b>3%</b>	<b>-1%</b>	<b>1%</b>	<b>1%</b>	<b>-1.0%</b>
Housing R&M	1,258	-1%	4%	2%	3%	1%	1.9%
Non-housing R&M	1,463	-2%	3%	2%	2%	2%	1.4%
<b>R&amp;M</b>	<b>2,721</b>	<b>-2%</b>	<b>4%</b>	<b>2%</b>	<b>2%</b>	<b>1%</b>	<b>1.6%</b>
<b>Total work</b>	<b>7,283</b>	<b>-6%</b>	<b>3%</b>	<b>0%</b>	<b>2%</b>	<b>1%</b>	<b>0.0%</b>

Source: CSN, Experian  
ref. CSN Explained, Section 5.3, Notes 2

### 2.10 Beyond 2016

The Department for Transport (DfT) are yet to decide whether they are willing to back Leeds trolleybus scheme. In 2007 £300m was put towards the scheme, however in 2010 funding was reduced to £245m with the DfT contributing towards 90% of the cost. In September 2011 further falls in investment were announced and the scheme is now thought to be worth around £200m.

Of the 15 power station projects given the go-ahead by the government in 2011, seven of them are in the Yorkshire and Humber region. The projects are a mix of wind developments, tidal stream, biomass and combined cycle gas turbines. The region has traditionally been an area for energy developments and given the increasing need for energy security and the development of renewable production, the demand for new power construction in the region is likely to continue over the long term.

# 3. Construction employment forecasts for Yorkshire and Humber

## 3.1 Total construction employment forecasts by occupation

The table presents actual construction employment (SICs 41-43, 71.1, and 74.9) in Yorkshire and Humber for 2010, the forecast total employment in 26 occupations and in the industry as a whole between 2012 and 2016. A full breakdown of occupational groups is provided in Section 5 of CSN Explained.

Construction employment in Yorkshire and Humber is forecast to reach 216,310 in 2016 which is 3% higher than 2012 but 7% lower when compared to 2010. A big drop of

6% in employment is expected in 2012. This decline decelerates throughout the following two years before growth of 1.1% is expected in 2015. At the end of the forecast period employment growth of 3.3% is predicted.

Civil engineers are expected to see an 18% rise in employment levels in 2016 when compared to 2012. Construction managers follow closely behind as employment increases by 14%. In absolute terms this occupation is projected to see the largest increase as of 3,140 to 25,880. Other construction specific occupations such as labours nec. (11%) and other construction professionals and technical staff (4%) also see growth in employment levels.

### Total employment by occupation - Yorkshire and Humber

	Actual	Forecast	
	2010	2012	2016
Senior, executive, and business process managers	12,260	10,540	9,380
Construction managers	23,950	22,740	25,880
Non-construction professional, technical, IT, and other office-based staff	25,460	21,980	21,040
Wood trades and interior fit-out	28,450	24,650	24,920
Bricklayers	8,310	8,620	8,640
Building envelope specialists	8,490	7,490	8,260
Painters and decorators	7,040	6,060	5,530
Plasterers and dry liners	4,580	4,740	4,990
Roofers	3,500	3,080	3,390
Floorers	2,560	2,650	2,720
Glaziers	1,830	1,890	1,840
Specialist building operatives nec*	5,250	4,590	5,010
Scaffolders	1,690	1,470	1,610
Plant operatives	3,590	3,150	3,480
Plant mechanics/fitters	4,870	4,150	3,320
Steel erectors/structural	1,930	2,000	2,100
Labourers nec*	10,340	9,000	10,020
Electrical trades and installation	15,870	13,710	15,080
Plumbing and HVAC trades	19,770	20,460	21,930
Logistics	3,610	3,180	3,030
Civil engineering operatives nec*	6,930	6,040	5,430
Non-construction operatives	3,350	2,890	2,550
Civil engineers	5,960	5,200	6,160
Other construction professionals and technical staff	14,730	12,640	13,150
Architects	2,180	2,300	1,960
Surveyors	5,480	4,690	4,890
<b>Total (SIC 41-43)</b>	<b>203,630</b>	<b>185,080</b>	<b>190,150</b>
<b>Total (SIC 41-43, 71.1, 74.9)</b>	<b>231,980</b>	<b>209,910</b>	<b>216,310</b>

Source: ONS, CSN, Experian ref. CSN Explained, Section 5.3, Notes 5 and 6  
NEC\* - Not elsewhere classified

## 3.2 Annual recruitment requirements (ARR) by occupation

The ARR is a gross requirement that takes into account workforce flows into and out of construction, due to factors such as movements between industries, migration, sickness, and retirement. However, these flows do not include movements into the industry from training, although robust data on training provision is being developed by ConstructionSkills. Thus, the annual recruitment requirement provides an indication of the number of new employees that would need to be recruited into construction each year in order to realise forecast output.

The ARR for the 26 occupations within Yorkshire and Humber's construction industry is illustrated in the table. The figure of 2,630 is indicative of the average requirements per year for the industry, as based on the output forecasts for the region. This takes into account 'churn' i.e. the flows into and out of the industry, excluding training flows.

At 630 and accounting for 24% of Yorkshire and Humber's total, construction managers have the highest ARR in the region.

Yorkshire and Humber accounts for 6% of total UK ARR. As a proportion of base 2012 employment the ARR in

Yorkshire and Humber is 1.3% below the UK average of 1.9%. Given the poor output and employment prospects for the region and the low level of workforce outflows to other regions, the small ARR comes as no surprise.

Please note that all of the ARRs presented in this section are employment requirements and not necessarily training requirements. This is because some new entrants to the construction industry, such as skilled migrants or those from other industries where similar skills are already used, will be able to work in the industry without the need for significant retraining.

Non-construction operatives is a diverse occupational group including all of the activities under the SICs 41-43, 71.1, and 74.9 umbrella that cannot be classified elsewhere, such as cleaners, elementary security occupations nec. and routine inspectors and testers. The skills required in these occupations are highly transferable to other industries and forecasting such movement is hazardous given the lack of robust supportive data. Therefore the ARR for non-construction operatives is not published.

Finally, for certain occupations there will be no appreciable requirement over the forecast period, partly due to the recession creating a 'pool' of excess labour.

### Annual recruitment requirement by occupation - Yorkshire and Humber

	2012-2016
Senior, executive, and business process managers	-
Construction managers	630
Non-construction professional, technical, IT, and other office-based staff	-
Wood trades and interior fit-out	-
Bricklayers	260
Building envelope specialists	-
Painters and decorators	410
Plasterers and dry liners	80
Roofers	70
Floorers	430
Glaziers	-
Specialist building operatives nec*	-
Scaffolders	-
Plant operatives	110
Plant mechanics/fitters	-
Steel erectors/structural	<50
Labourers nec*	60
Electrical trades and installation	-
Plumbing and HVAC trades	310
Logistics	230
Civil engineering operatives nec*	-
Non-construction operatives	-
Civil engineers	-
Other construction professionals and technical staff	-
Architects	-
Surveyors	-
<b>Total (SIC 41-43)</b>	<b>2,630</b>
<b>Total (SIC 41-43, 71.1, 74.9)</b>	<b>2,630</b>

Source: CSN, Experian ref. CSN Explained, Section 5.3, Notes 5 and 6  
NEC\* - Not elsewhere classified

# 4. Comparisons across the UK

Yorkshire and Humber is the only region forecast to experience stagnation in output over the forecast period, although this is a better performance than the North West and West Midlands, both of which are forecast to experience declines in activity. For the UK the yearly growth rate is 1.4%. The best performing region is expected to be the East of England with a rate of 2.9%.

Over the forecast period, we seem to be seeing the emergence of a north/south divide, with the greater south east (the South East, Greater London and the East of England) faring best, and the northern English regions faring worst. In between are the devolved nations, who, although they have their overall expenditure limits set by Westminster, through their devolved administrations have more control on what it will be spent on than the English regions. Already the devolved administrations in Scotland and Northern Ireland have redirected a proportion of resource funding to the capital expenditure account, which should benefit the construction industry in these areas.

There are a number of reasons for the emergence of this north/south divide. The first is the more constrained outlook for public expenditure going forward. While declines in public housing activity are expected to be fairly similar across the board, with one or two exceptions, the profile for the public non-residential sector is very different. Output in this sector hit a new historic high in 2010 and since 2007 had grown by over 72% in real terms, primarily driven by work under the BSF programme. Yorkshire and Humber was one of the main beneficiaries of the early stages of the BSF programme, contributing strongly to its 83% rise in public non-housing output between 2008 and 2010. On this basis the region has further to fall than many others once BSF 'legacy' projects are completed.

Second, major infrastructure projects are tending to be greater South East centric at present. Infrastructure activity in the UK is at a historic high, exceeding its previous peak in 1993 during the building of the Channel Tunnel. This level of activity is being driven largely projects in the South East corner of England – Crossrail, Thameslink, M25 widening, London Gateway port, to name a few. That is not to say that there are not projects elsewhere, there are, but they are tending to be of a lesser size. The largest transport project in Yorkshire and Humber once the current round of A1 improvements are completed in 2012 is £150 of managed motorway works on the M62.

Third, growth in the commercial sector is likely to be stronger in the greater South East than elsewhere in England. The offices market has already been strengthening in London and along the M4 corridor/Thames Valley, while excess capacity issues remain a problem across many regional centres. The northern English regions also have many currently mothballed retail and leisure developments for which it is difficult to see an economic imperative to restart, at least in the short term.

Not surprisingly given Yorkshire and Humber's poor output projections, the region is looking at an overall decline in employment in the five years to 2016, at an annual average rate of 0.6% compared with an annual rise of 0.6% for the UK as a whole. Wales is predicted to have the strongest growth in employment, despite only moderate growth in output. That is because most of its growth is focussed in the more labour intensive repair and maintenance sectors. Not surprisingly, employment growth is also stronger than the UK average in the South East, Greater London and the East of England.

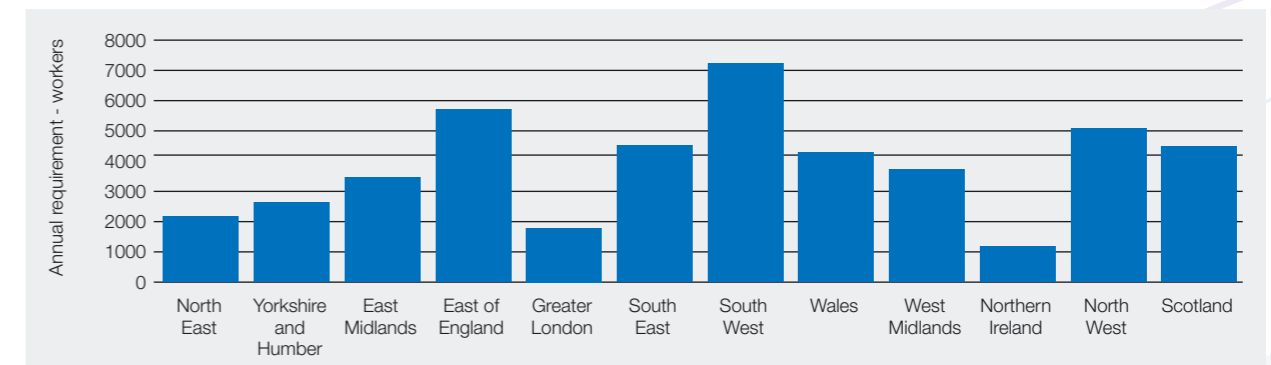
Employment in the region is forecast to reach **216,310 in 2016**, but this will be 7% lower than 2010 employment

Annual average output growth by region 2012-2016



Source: CSN, Experian ref CSN Explained, Section 5.3, Note 2

Annual recruitment requirement (ARR) by region 2012-2016



Source: CSN, Experian

Eco Village  
Gentoo Group



The Public non-housing sector will see the **biggest fall in outturn**, decreasing by a year on year average of 12% over the forecast



## 5. CSN explained

This appendix provides further details and clarification of some of the points covered in the report.

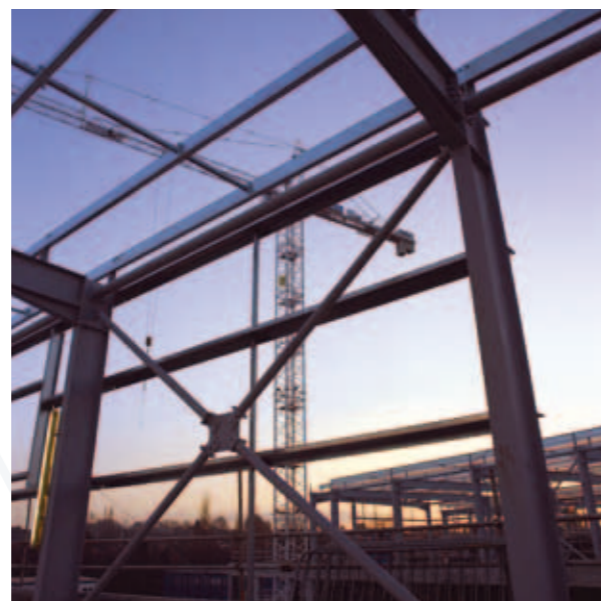
Section 5.1 gives an overview of the underpinning methods that are used by the CSN, working in partnership with Experian, to produce the suite of reports at both a UK, national and regional level.

Section 5.2 provides a glossary to clarify some of the terms that are used in the reports, while section 5.3 has some further notes that relate to the data sources that are used for the various charts and tables. Section 5.3 also outlines what is meant by the term footprint, when talking about the areas of responsibility that lie with a Sector Skills Council.

Section 5.4 explains the sector definitions used within the report and provides examples of what is covered in each.

Section 5.5 gives a detailed breakdown of the 26 occupational groups into the individual standard occupational classification (SOC) codes that are aggregated to provide the employment and recruitment requirement.

Section 5.6 then concludes by giving details about the range of LMI reports, the advantages of being a CSN member and the contact details should people be interested in joining.



## 5.1 CSN methodology

### Background

The **Construction Skills Network (CSN)**, launched in 2005, represents a radical change in the way that ConstructionSkills collect and produce information on the future employment and training needs of the industry. CITB-ConstructionSkills, CIC and CITB Northern Ireland are working as ConstructionSkills, the Sector Skills Council for Construction to produce robust Labour Market Intelligence to provide a foundation on which to plan for future skills needs and to target investment.

The CSN functions at both a national and regional level. It comprises of a National Group, 12 Observatory groups, a forecasting model for each of the regions and countries, and a Technical Reference Group. An Observatory group currently operates in each of the nine English regions and also in Wales, Scotland and Northern Ireland.

Observatory groups currently meet bi-annually and consist of key regional stakeholders invited from industry, Government, education and other SSCs, all of whom contribute local industry knowledge and views on training, skills, recruitment, qualifications and policy. The National Group also includes representatives from industry, Government, education and other SSCs. This Group convenes once a year and sets the national scene, effectively forming a backdrop for the Observatories.

At the heart of the CSN are a number of forecasting models which generate forecasts of employment requirements within the industry for a range of occupational groups. The models are designed and managed by Experian under the independent guidance and validation of the Technical Reference Group, comprised of statisticians and modelling experts.

It is envisaged that the models will evolve over time as new research is published and modelling techniques improve. Future changes to the model will only be made after consultation with the Technical Reference Group.

### The model approach

The model approach relies on a combination of primary research and views from the CSN to facilitate it. National data is used as the basis for the assumptions that augment the models, which are then adjusted with the assistance of the Observatories and National Group. Each English region, Wales, Scotland and Northern Ireland has a separate model (although all models are inter-related due to labour movements) and, in addition, there is one national model that acts as a constraint to the individual models and enables best use to be made of the most robust data (which is available at the national level). The models work by forecasting demand and supply of skilled workers separately. The difference between demand and supply forms the employment requirement.

The forecast **total employment** levels are derived from expectations about construction output and productivity. Essentially this is based upon the question 'How many people will be needed to produce forecast output, given the assumptions made about productivity?'

The **annual recruitment requirement (ARR)** is a gross requirement that takes into account workforce flows into and out of construction, due to such factors as movements between industries, migration, sickness, and retirement. However, these flows do not include movements into the industry from training, although robust data on training provision is being developed by ConstructionSkills in partnership with public funding agencies, Further Education, Higher Education and employer representatives. Thus, the annual recruitment requirement provides an indication of the number of new employees that would need to be recruited into construction each year in order to realise forecast output.

Demand is based upon the results of discussion groups comprising industry experts, a view of construction output and a set of integrated models relating to wider national and regional economic performance. The models are dynamic and reflect the general UK economic climate at any point in time. To generate the labour demand, the models make use of a set of specific statistics for each major type of work that determine the employment, by trade, needed to produce the predicted levels of construction output. The labour supply for each type of trade or profession is based upon the previous years' supply (the total stock of employment) combined with flows into and out of the labour market.

The key leakages (outflows) that need to be considered are:

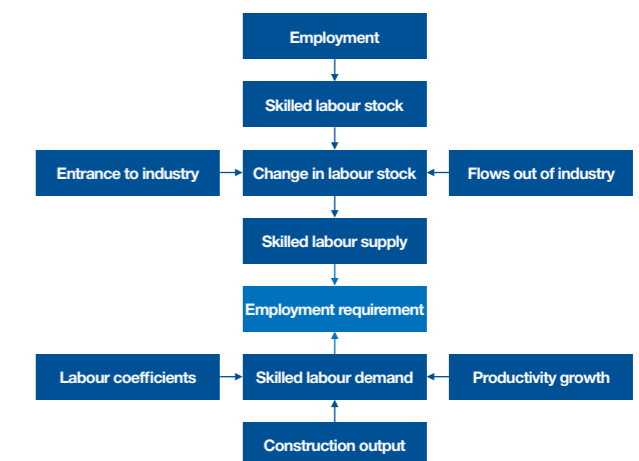
- transfers to other industries
- international/domestic OUT migration
- permanent retirements (including permanently sick)
- outflow to temporarily sick and home duties.

The main reason for outflow is likely to be transfer to other industries.

Flows into the labour market include:

- transfers in from other industries
- international/domestic IN migration
- inflow from temporarily sick and home duties.

The most significant inflow is likely to be from other industries. A summary of the model is shown in the flow chart.



## 5.2 Glossary of terms

- **Building envelope specialists** – any trade involved with the external cladding of the building other than bricklaying, e.g. curtain walling.
- **Demand** – demand is calculated using construction output data from the Office for National Statistics (ONS) and the Department of Finance and Personnel Northern Ireland (DFP), along with vacancy data from the National Employers Skills Survey, from the Department for Education and Skills. These data sets are translated into labour requirements by trade by using a series of **coefficients** to produce the labour demand that relates to the forecasted output levels.
- **GDP** – Gross Domestic Product – total market value of all final goods and services produced. A measure of national income.  $GDP = GVA$  plus taxes on products minus subsidies on products.
- **GVA** – Gross Value Added – total output minus the value of inputs used in the production process. GVA measures the contribution of the economy as a difference between gross output and intermediate outputs.
- **Coefficients** – To generate the labour demand, the model makes use of a set of specific statistics for each major type of work to determine employment, by trade or profession, based upon the previous years' supply. In essence this is the number of workers of each occupation/trade to produce £1m of output across each sub-sector.
- **LFS** (Labour Force Survey) – a UK household sample survey which collects information on employment, unemployment, flows between sectors and training, from around 53,000 households each quarter (>100,000 people).
- **LMI** (Labour Market Intelligence) – data that are quantitative (numerical) or qualitative (insights and perceptions) on workers, employers, wages, conditions of work, etc.
- **Macroeconomics** – the study of an economy on a national level, including total employment, investment, imports, exports, production and consumption.
- **Nec** – not elsewhere classified, used as a reference in LFS data.
- **ONS** – Office for National Statistics – official statistics on economy, population and society at national UK and local level.
- **Output** – total value of all goods and services produced in an economy.
- **Productivity** – output per employee.
- **SIC codes** – Standard Industrial Classification codes – from the UK Standard Industrial Classification of Economic Activities produced by the **ONS**.
- **SOC codes** – Standard Occupational Classification codes.
- **Supply** – the total stock of employment in a period of time plus the flows into and out of the labour market. Supply is usually calculated from **LFS** data.



## 5.3 Notes and footprints

### Notes

- 1 Except for Northern Ireland, output data for the English regions, Scotland and Wales are supplied by the Office for National Statistics (ONS) on a current price basis. Thus national deflators produced by the ONS have been used to deflate to a 2005 constant price basis, i.e. the effects of inflation have been stripped out.
- 2 The annual average growth rate of output is a compound average growth rate, i.e. the rate at which output would grow each year if it increased steadily year-on-year over the forecast period.
- 3 Only selected components of gross value added (GVA) are shown in this table and so do not sum to the total.
- 4 For new construction orders comparison is made with Great Britain rather than the UK, owing to the fact that there are no orders data series for Northern Ireland.
- 5 Employment numbers are rounded to the nearest 10.
- 6 The tables include data relating to plumbers and electricians. As part of SIC 45, plumbers and electricians working in contracting are an integral part of the construction process. However, it is recognised by ConstructionSkills that SummitSkills has responsibility for these occupations across a range of SIC codes, including SIC 45.31 and 45.33.

### Footprints for Built Environment SSCs

ConstructionSkills is responsible for SIC 45 Construction and part of SIC 74.2 Architectural and Engineering activities and related technical consultancy.

The table summarises the SIC codes (2003) covered by ConstructionSkills:

	SIC Code	Description
<b>ConstructionSkills</b>	45.1	Site preparation
	45.2	Building of complete construction or parts; civil engineering
	45.3	Building installations (except 45.31 and 45.33 which are covered by SummitSkills)
	45.4	Building completion
	45.5	Renting of construction or demolition equipment with operator
	74.2*	Architectural and engineering activities and related technical consultancy

\* AssetSkills has a peripheral interest in SIC 74.2

The sector footprints for the other SSCs covering the Built Environment:

### SummitSkills

**Footprint** – Plumbing, Heating, Ventilation, Air Conditioning, Refrigeration and Electrotechnical.

**Coverage** – Building Services Engineering.

ConstructionSkills shares an interest with SummitSkills in SIC 45.31 Installation of wiring and fittings and SIC 45.33 Plumbing. ConstructionSkills recognises the responsibility of Summit Skills across Standard Industrial Classifications (SIC) 45.31 and 45.33, thus data relating to the building services engineering sector is included here primarily for completeness.

### AssetSkills

**Footprint** – Property Services, Housing, Facilities Management, Cleaning.

**Coverage** – Property, Housing and Land Managers, Chartered Surveyors, Estimators, Valuers, Home Inspectors, Estate Agents and Auctioneers (property and chattels), Caretakers, Mobile and Machine Operatives, Window Cleaners, Road Sweepers, Cleaners, Domestic, Facilities Managers.

AssetSkills has a peripheral interest in SIC 74.2.

### Energy and Utility Skills

**Footprint** – Electricity, Gas (including gas installers), Water and Waste Management.

**Coverage** – Electricity generation and distribution; Gas transmission, distribution and appliance installation and maintenance; Water collection, purification and distribution; Waste water collection and processing; Waste Management.

## 5.4 Definitions: types and examples of construction work

### Public sector housing - local authorities and housing associations, new towns and government departments

Housing schemes, old people's homes and the provision within housing sites of roads and services for gas, water, electricity, sewage and drainage.

### Private sector housing

All privately owned buildings for residential use, such as houses, flats and maisonettes, bungalows, cottages and the provision of services to new developments.

### Infrastructure - public and private

#### Water

Reservoirs, purification plants, dams, water works, pumping stations, water mains, hydraulic works etc.

#### Sewerage

Sewage disposal works, laying of sewers and surface drains.

#### Electricity

Building and civil engineering work for electrical undertakings such as power stations, dams and other works on hydroelectric schemes, and decommissioning of nuclear power stations, onshore wind farms.

#### Gas, communications, air transport

Gas works, gas mains and gas storage; post offices, sorting offices, telephone exchanges, switching centres etc.; air terminals, runways, hangars, reception halls, radar installations.

#### Railways

Permanent way, tunnels, bridges, cuttings, stations, engine sheds etc., signalling and other control systems and electrification of both surface and underground railways.

#### Harbours

All works and buildings directly connected with harbours, wharves, docks, piers, jetties, canals and waterways, sea walls, embankments and water defences.

#### Roads

Roads, pavements, bridges, footpaths, lighting, tunnels, flyovers, fencing etc.

### Public non-residential construction<sup>1</sup>

#### Factories and warehouses

Publicly owned factories, warehouses, skill centres.

#### Oil, steel, coal

Now restricted to remedial works for public sector residual bodies.

#### Schools, colleges, universities

State schools and colleges (including technical colleges and institutes of agriculture); universities including halls of residence, research establishments etc.

#### Health

Hospitals including medical schools, clinics, welfare centres, adult training centres.

#### Offices

Local and central government offices, including town halls, offices for all public bodies except the armed services, police headquarters.

#### Entertainment

Theatres, restaurants, public swimming baths, caravan sites at holiday resorts, works and buildings at sports grounds, stadiums, racecourses etc. owned by local authorities or other public bodies.

#### Garages

Buildings for storage, repair and maintenance of road vehicles, transport workshops, bus depots, road goods transport depots and car parks.

#### Shops

Municipal shopping developments for which the contract has been let by a Local Authority.

#### Agriculture

Buildings and work on publicly financed horticultural establishments; fen drainage and agricultural drainage; veterinary clinics.

#### Miscellaneous

All work not clearly covered by any other headings, such as fire stations, police stations, prisons, reformatories, remand homes, civil defence work, UK Atomic Energy Authority work, council depots, museums, libraries.

### Private industrial work

Factories, warehouses, wholesale depots, all other works and buildings for the purpose of industrial production or processing, oil refineries, pipelines & terminals, concrete fixed leg oil production platforms (not rigs); private steel work; all new coal mine construction such as sinking shafts, tunnelling, etc.

### Private commercial work<sup>2</sup>

#### Schools and universities

Schools and colleges in the private sector, financed wholly from private funds.

#### Health

Private hospitals, nursing homes, clinics.

#### Offices

Office buildings, banks.

#### Entertainment

Privately owned theatres, concert halls, cinemas, hotels, public houses, restaurants, cafés, holiday camps, swimming pools, works and buildings at sports grounds, stadiums and other places of sport or recreation, youth hostels.

#### Garages

Repair garages, petrol filling stations, bus depots, goods transport depots and any other works or buildings for the storage, repair or maintenance of road vehicles, car parks.

#### Shops

All buildings for retail distribution such as shops, department stores, retail markets, showrooms, etc.

#### Agriculture

All buildings and work on farms, horticultural establishments.

#### Miscellaneous

All work not clearly covered by any other heading, e.g. exhibitions, caravan sites, churches, church halls.

### New work

#### New housing

Construction of new houses, flats, bungalows only.

#### All other types of work

All new construction work and all work that can be referred to as improvement, renovation or refurbishment and which adds to the value of the property.<sup>3</sup>

### Repair and maintenance

#### Housing

Any conversion of, or extension to any existing dwelling and all other work such as improvement, renovation, refurbishment, planned maintenance and any other type of expenditure on repairs or maintenance.

#### All other sectors

Repair and maintenance work of all types including planned and contractual maintenance.<sup>4</sup>

<sup>1</sup> Where contracts for the construction or improvement of non-residential buildings used for public service provision, such as hospitals, are awarded by private sector holders of contracts awarded under the Private Finance Initiative, the work is classified as 'private commercial'.

<sup>2</sup> Where contracts for the construction or improvement of non-residential buildings used for public service provision, such as hospitals, are awarded by private sector holders of contracts awarded under the Private Finance Initiative, the work is classified as 'private commercial'.

<sup>3</sup> Contractors reporting work may not always be aware of the distinction between improvement or renovation work and repair and maintenance work in the non-residential sectors.

<sup>4</sup> Except where stated, mixed development schemes are classified to whichever sector provides the majority (i.e. over 50%) of finance.

## 5.5 Occupational groups

### Occupational group

Description, SOC reference.

### Senior, executive and business process managers

Directors and chief executives of major organisations, 1112  
 Senior officials in local government, 1113  
 Financial managers and chartered secretaries, 1131  
 Marketing and sales managers, 1132  
 Purchasing managers, 1133  
 Advertising and public relations managers, 1134  
 Personnel, training and Industrial relations managers, 1135  
 Office managers, 1152  
 Civil service executive officers, 4111  
 Property, housing and land managers, 1231  
 Information and communication technology managers, 1136  
 Research and development managers, 1137  
 Customer care managers, 1142  
 Storage and warehouse managers, 1162  
 Security managers, 1174  
 Natural environment and conservation managers, 1212  
 Managers and proprietors in other services nec\*, 1239

### Construction managers

Production, works and maintenance managers, 1121  
 Managers in construction, 1122  
 Quality assurance managers, 1141  
 Transport and distribution managers, 1161  
 Recycling and refuse disposal managers, 1235  
 Managers in mining and energy, 1123  
 Occupational hygienists and safety officers (H&S), 3567  
 Conservation and environmental protection officers, 3551

### Non-construction professional, technical, IT, and other office-based staff (excl. managers)

IT operations technicians, 3131  
 IT user support technicians, 3132  
 Estimators, valuers and assessors, 3531  
 Finance and investment analysts/advisers, 3534  
 Taxation experts, 3535  
 Financial and accounting technicians, 3537  
 Vocational and Industrial trainers and instructors, 3563  
 Business and related associate professionals nec\*, 3539  
 Legal associate professionals, 3520  
 Inspectors of factories, utilities and trading standards, 3565  
 Software professionals, 2132  
 IT strategy and planning professionals, 2131  
 Estate agents, auctioneers, 3544  
 Solicitors and lawyers, judges and coroners, 2411  
 Legal professionals nec\*, 2419  
 Chartered and certified accountants, 2421  
 Management accountants, 2422

Management consultants, actuaries, economists and statisticians, 2423  
 Receptionists, 4216  
 Typists, 4217  
 Sales representatives, 3542  
 Civil Service administrative officers and assistants, 4112  
 Local government clerical officers and assistants, 4113  
 Accounts and wages clerks, book-keepers, other financial clerks, 4122  
 Filing and other records assistants/clerks, 4131  
 Stock control clerks, 4133  
 Database assistants/clerks, 4136  
 Telephonists, 4141  
 Communication operators, 4142  
 General office assistants/clerks, 4150  
 Personal assistants and other secretaries, 4215  
 Sales and retail assistants, 7111  
 Telephone salespersons, 7113  
 Buyers and purchasing officers (50%), 3541  
 Marketing associate professionals, 3543  
 Personnel and industrial relations officers, 3562  
 Credit controllers, 4121  
 Market research interviewers, 4137  
 Company secretaries (excluding qualified chartered secretaries), 4214  
 Sales related occupations nec\*, 7129  
 Call centre agents/operators, 7211  
 Customer care occupations, 7212  
 Elementary office occupations nec\*, 9219

### Wood trades and interior fit-out

Carpenters and joiners, 5315  
 Pattern makers, 5493  
 Paper and wood machine operatives, 8121  
 Furniture makers, other craft woodworkers, 5492  
 Labourers in building and woodworking trades (9%), 9121  
 Construction trades nec\* (25%), 5319



### Bricklayers

Bricklayers, masons, 5312

### Building envelope specialists

Construction trades nec\* (50%), 5319  
 Labourers in building and woodworking trades (5%), 9121

### Painters and decorators

Painters and decorators, 5323  
 Construction trades nec\* (5%), 5319

### Plasterers and dry liners

Plasterers, 5321

### Roofers

Roofers, roof tilers and slaters, 5313

### Floorers

Floorers and wall tilers, 5322

### Glaziers

Glaziers, window fabricators and fitters, 5316  
 Construction trades nec\* (5%), 5319

### Specialist building operatives nec\*

Construction operatives nec\* (80%), 8149  
 Construction trades nec\* (5%), 5319  
 Industrial cleaning process occupations, 9132

### Scaffolders

Scaffolders, staggers, riggers, 8141

### Plant operatives

Crane drivers, 8221  
 Plant and machine operatives nec\*, 8129  
 Transport operatives nec\*, 8219  
 Fork-lift truck drivers, 8222  
 Mobile machine drivers and operatives nec\*, 8229  
 Agricultural machinery drivers, 8223

### Plant mechanics/fitters

Metal working production and maintenance fitters, 5223  
 Motor mechanics, auto engineers, 5231  
 Labourers in process and plant operations nec\*, 9139  
 Tool makers, tool fitters and markers-out, 5222  
 Vehicle body builders and repairers, 5232  
 Auto electricians, 5233  
 Vehicle spray painters, 5234  
 Tyre, exhaust and windscreen fitters, 8135



### Steel erectors/structural

Steel erectors, 5311  
 Welding trades, 5215  
 Sheet metal workers, 5213  
 Metal plate workers, shipwrights and riveters, 5214  
 Construction trades nec\* (5%), 5319  
 Smiths and forge workers, 5211  
 Moulders, core makers, die casters, 5212  
 Metal machining setters and setter-operators, 5221

### Labourers nec\*

Labourers in building and woodworking trades (80%), 9121

### Electrical trades and installation

Electricians, electrical fitters, 5241  
 Electrical/electronic engineers nec\*, 5249  
 Telecommunications engineers, 5242  
 Lines repairers and cable jointers, 5243  
 TV, video and audio engineers, 5244  
 Computer engineers, installation and maintenance, 5245

### Plumbing and heating, ventilation, and air conditioning trades

Plumbers and HVAC trades, 5314  
 Pipe fitters, 5216  
 Labourers in building and woodworking trades (6%), 9121  
 Construction trades nec\* (5%), 5319

## 5.6 CSN website and contact details

### Logistics

Heavy goods vehicle drivers, 8211  
Van drivers, 8212  
Packers, bottlers, canners, fillers, 9134  
Other goods handling and storage occupations nec\*, 9149  
Buyers and purchasing officers (50%), 3541  
Transport and distribution clerks, 4134  
Security guards and related occupations, 9241

### Civil engineering operatives nec\*

Road construction operatives, 8142  
Rail construction and maintenance operatives, 8143  
Quarry workers and related operatives, 8123  
Construction operatives nec\* (20%), 8149  
Labourers in other construction trades nec\*, 9129

### Non-construction operatives

Metal making and treating process operatives, 8117  
Process operatives nec\*, 8119  
Metal working machine operatives, 8125  
Water and sewerage plant operatives, 8126  
Assemblers (vehicle and metal goods), 8132  
Routine inspectors and testers, 8133  
Assemblers and routine operatives nec\*, 8139  
Stevedores, dockers and slingers, 9141  
Hand craft occupations nec\*, 5499  
Elementary security occupations nec\*, 9249  
Cleaners, domestics, 9233  
Road sweepers, 9232  
Gardeners and groundsmen, 5113  
Caretakers, 6232

### Civil engineers

Civil engineers, 2121

### Other construction professionals and technical staff

Mechanical engineers, 2122  
Electrical engineers, 2123  
Chemical engineers, 2125  
Design and development engineers, 2126  
Production and process engineers, 2127  
Planning and quality control engineers, 2128  
Engineering professional nec\*, 2129  
Electrical/electronic technicians, 3112  
Engineering technicians, 3113  
Building and civil engineering technicians, 3114  
Science and engineering technicians nec\*, 3119  
Architectural technologists and town planning technicians, 3121  
Draughtspersons, 3122  
Quality assurance technicians, 3115  
Town planners, 2432  
Electronics engineers, 2124  
Building inspectors, 3123  
Scientific researchers, 2321

### Architects

Architects, 2431

### Surveyors

Quantity surveyors, 2433  
Chartered surveyors (not Quantity surveyors), 2434

### The CSN website – <http://www.cskills.org/csn>

The CSN website functions as a **public gateway** for people wishing to access the range of **Labour Market Intelligence (LMI)** reports and **research material** regularly produced by the CSN.

The main UK report, along with the twelve LMI reports (one for Northern Ireland, Scotland, Wales and each of the nine English regions) can be downloaded from the site, while research reports such as the '2020Vision' and 'Closer look at Greater London' are also freely available.

Having access to this range of labour market intelligence and trend insight allows industry, government, regional agencies and key stakeholders to:

- pinpoint the associated, specific, skills that will be needed year by year
- identify the sectors which are likely to be the strongest drivers of output growth in each region and devolved nation
- track the macro economy
- understand how economic events impact on regional and devolved nations economic performance
- highlight trends across the industry such as national and regional shifts in demand
- plan ahead and address the skills needs of a traditionally mobile workforce
- understand the levels of qualified and competent new entrants required into the workforce.

The website also contains further information about:

- how the CSN functions
- the CSN Model approach
- how the Model can be used to explore scenarios
- CSN team contact information
- access to related ConstructionSkills research
- details for those interested in becoming members of the network.

The CSN website can be found at:

<http://www.cskills.org/csn>

### CSN members area

While the public area of the CSN Website is the gateway to the completed LMI and research reports, being a member of the CSN offers further benefits.

As a CSN member you will be linked to one of the Observatory groups, which play a vital role in being able to feed back observations, knowledge and insight on what is really happening on the ground in every UK region and nation. This feedback is used to fine tune the assumptions and data that goes into the forecasting programme such as:

- details of specific projects
- demand within various types of work or sectors
- labour supply
- inflows and outflows across the regions and devolved nations.

CSN members therefore have:

- early access to forecasts
- the opportunity to influence and inform the data
- the ability to request scenarios that could address "What would happen if..." types of questions using the model.

Through the Members area of the CSN website, members can:

- access observatory related material such as meeting dates, agendas, presentations and notes
- access sub-regional LMI reports
- download additional research material
- comment/feedback to the CSN Team.

As the Observatory groups highlight the real issues faced by the industry in the UK, we can more efficiently and effectively plan our response to skills needs. If you would like to contribute your industry observations, knowledge and insight to this process and become a member of the CSN, we would be delighted to hear from you.

### Contact details

For further information about the CSN website, enquiries relating to the work of the CSN, or to register your interest in joining the CSN as a member, please contact us at:

[csn@cskills.org](mailto:csn@cskills.org)



For more information about the  
**Construction Skills Network**, contact

**Lee Bryer**

Research and Development

Operations Manager

0344 994 4400

Lee.bryer@cskills.org

**Cskills website**

<http://www.cskills.org/>

<http://www.cskills.org/contact-us/offices.aspx>

**CSN webpage**

<http://www.cskills.org/supportbusiness/businessinformation/csn/index.aspx>

