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Construction Skills Network South East 2014-2018

Labour Market Intelligence



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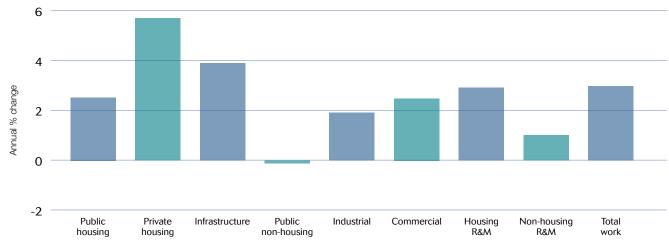
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1 Summary – South East

Construction output in the South East is forecast to rise at an average annual rate of 2.9% over the five years to 2018, higher than the UK average of 2.2%. The new work sectors are expected to exhibit stronger annual average growth than the repair and maintenance (R&M) sectors, at 3.4% and 2% respectively. The private housing sector is expected to be the strongest performer, with annual average growth of 5.7%. The region is set to see construction employment increase at an annual average rate of 1.6%, higher than the UK rate of 1.2%. The annual recruitment requirement (ARR) for the South East is 1,600, one of the lowest across the regions and devolved nations.



Annual average construction output growth 2014-2018 - South East

Source: CSN, Experian

ref. CSN Explained, Section 3, Note 2



1.1 Key findings

Growth is projected for all construction sectors in the South East over the forecast period as a whole, except for the public non-housing sector, which is still subject to funding constraints. However, even here, the decline is minimal over the five years to 2018 (-0.1%), with all of the fall occurring in the first year of the forecast period.

Average annual growth of 5.7% is forecast for the private housing sector, with output expected to rise each year of the 2014-2018 period. The South East's demographic factors tend to be positive, with higher than average population growth, and this, combined with schemes such as Help to Buy, is benefitting the sector.

The infrastructure sector is projected to grow by nearly 4% a year on average in the five years to 2018. The sector will be boosted by schemes such as the £750m green power park being developed on the Isle of Thanet in Kent, and electrification of the Great Western rail line, some of which runs through the region.

Commercial construction growth is predicted to average 2.5% a year over the forecast period, with a number of town centre regeneration schemes in the pipeline, and the possibility of a £2bn investment in a new theme park in north Kent.

Construction employment in the South East is expected to reach 379,500 in 2018, an annual average increase of 1.6% over the five years to 2018. Employment is expected to grow in each year of the forecast period. This rate of growth is higher than the UK average of 1.2%, but a little below the most buoyant region in employment terms, which is expected to be the East of England at 2%.

Employment growth is forecast to be strongest for scaffolders (7.6% a year on average), construction trades supervisors (5.7% a year) and plant mechanics/ fitters (5.3%). The majority of occupational groups (22 out of 28) should see some growth in employment levels over the next five years.

The South East's ARR is 1,600, which is equivalent to just 0.5% of base 2014 employment, the second lowest rate after Greater London and well below the UK average of 1.5%. This is in part due to the fact that both regions act as magnets for construction workers from both the rest of the country and overseas. Some 10% of the South East's construction workforce originated from overseas in 2012, according to the CITB's latest Workforce Mobility and Skills survey.

Regional comparison 2014-2018

	Annual average % change in output	Change in total employment	Total ARR
North East	2.4%	2,660	2,680
Yorkshire and Humber	2.2%	8,590	3,170
East Midlands	1.1%	5,910	1,980
East of England	3.0%	24,220	5,150
Greater London	2.0%	27,490	1,290
South East	2.9%	28,900	1,600
South West	3.5%	16,700	6,370
Wales	3.4%	9,490	3,570
West Midlands	0.8%	-2,090	380
Northern Ireland	2.3%	3,400	1,280
North West	1.3%	10,300	2,970
Scotland	2.0%	12,240	5,960
ИК	2.2%	147,810	36,400

Source: CSN, Experian

ref. CSN Explained, Section 3, Note 2

2 The outlook for construction in the South East

2.1 Construction output in the South East – overview

Following growth of 5% in 2011, construction output in the South East fell by 13% in 2012 to \pm 15bn in 2005 prices. This was the lowest annual outturn in the region since 1997. Both the new work and R&M sectors suffered similar contractions.

Falls were seen across the majority of sectors in 2012. The industrial sector was the only sector to post any growth in 2012, as output increased by 19%. Despite strong recent performance, the infrastructure sector showed the biggest decline of 31%, as the completion

Construction output – South East 1996-2012

of the latest tranche of M25 widening in the early part of the year affected the total. Marked falls in activity were also seen in the public housing (19%), public non-housing (16%) and commercial construction (13%) sectors.

2.2 Industry structure

The diagram, Construction industry structure 2012 – UK vs. South East, illustrates the sector breakdown of construction in the South East compared to that in the UK as a whole. The percentages for each sector illustrate the proportion of total output accounted for by each sector.



1996 1997 1998 1999 2000 2001 2002 2003 2004 2005 2006 2007 2008 2009 2010 2011 2012

Source: ONS ref. CSN Explained, Section 3, Note 1

The new work sector in the South East accounted for 64% of total construction output in 2012, in line with the UK average. The new work sector's share of output remained unchanged from 2011.

The overall structure of the construction market in the South East is similar to the UK average. The biggest difference is a proportionally larger private housing sector in the region compared with the UK average (18% vs. 14%). Conversely, the non-housing R&M sector is proportionally smaller, accounting for only 17% of output in the South East compared with 20% in the UK as a whole. All other sectors are within 2% of each other in terms of share.

2.3 Economic overview

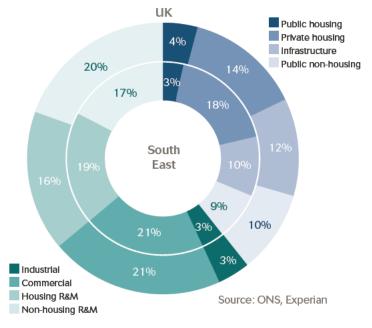
The expected performance of a regional or national economy over the forecast period (2014-2018) provides an indication of the construction sectors in which demand is likely to be strongest.

2.4 Economic structure

In 2012, the South East's economy remained largely flat. Gross value added (GVA) totalled \pm 189.5bn in 2010 prices, just 0.2% up on 2011. The region accounted for 14.1% UK GVA, unchanged from the previous year.

The largest sector in the South East in 2012 remained the professional and other private services sector, which

Construction industry structure 2012 UK vs. South East



took a 27% share of output. The sector was relatively more important in the region than nationally, where it accounted for 24% of output. The public services sector was again the second largest in the region, accounting for 16% of output in 2012, whilst the third largest was wholesale and retail, with a 13% share of output. Next was information and communication with 10% and manufacturing with just under 9% of the region's output in 2012.

Of the main sectors, growth was strongest in public services, up more than 3%, which is rather surprising given ongoing financial constraints. The largest sector

Economic structure – South East (£ billion, 2010 prices)

in the South East economy, professional and other private services, saw 1.7% growth, and information and communications saw a growth of 2.4%. However, wholesale and retail output declined slightly, by 0.2%, and manufacturing activity fell by nearly 4%.

Overall, the structure of the South East economy is similar to the UK as a whole, with the professional and other private and public services sectors accounting for the largest share of output in both the South East and wider UK. One of the largest differences is that public services accounts for a lower proportion of output in the South East than across the UK as a whole (16.3% vs. 19.2%).

Selected sectors	Actual	Forecast Annual % change, real terms					
	2012	2013	2014	2015	2016	2017	2018
Professional and other private services	27.4	2.2	2.6	2.4	2.6	2.5	2.6
Public services	16.3	2.7	0.5	0.6	0.9	1.1	1.7
Wholesale and retail	13.1	5.2	2.8	2.6	2.7	2.5	2.5
Information and communication	10.1	0.4	3.4	3.5	4.0	3.6	3.4
Manufacturing	8.7	-1.0	2.3	1.6	1.6	1.4	1.3
Total Gross Value Added (GVA)	189.5	1.6	2.2	2.3	2.6	2.4	2.5

Note: Top 5 sectors, excluding construction. Source: Experian. Ref. CSN Explained, Section 3, Note 3

2.5 Forward-looking economic indicators

The South East's economy is estimated to have grown by around 1.6% in 2013, a significantly better performance than in 2012. It is expected to see annual average growth in GVA of 2.4% over the 2014 to 2018 period, above the UK average of 2%.

The largest sector in the region, professional and other private services, is expected to see output rise by an average of 2.6% per year over the five years to 2018, whilst growth in public services, the next largest in the region, is forecast to be a much more modest 1%. One of the fastest growing sectors is expected to be information and communications, not just in the South East but across the UK as a whole. Output growth for this sector is projected to average 3.6% a year over the forecast period, taking its share of the South East's economy up to 10.6% in 2018, from 6.3% in 2000, making it the fourth largest sector by 2018.

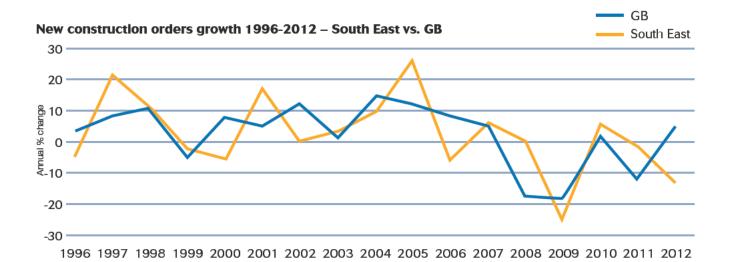
In the South East, household spending is estimated to have grown by 2.2% in 2012, despite a very weak rise in real household disposable income in that year (0.2%). This would indicate a significant decline in the region's savings ratio and/or a rise in debt. The prospects for household income are better over the forecast period, with inflation expected to edge down towards the 2% mark over the next year or so, and average earnings growth rising. Real household disposable income is forecast to rise at an average rate of 2.1% per year over the 2014 to 2018 period and this should boost consumer spending growth to around 2.7% a year.

Employment in the South East on the Workforce Jobs measure is estimated at a little below 5.3 million in 2013, 61% of the total population. It is projected to grow at an annual average rate of 1% over the five years to 2018. The estimated unemployment rate for the region in 2013 is 6.7%, below the UK average of 7.8%, and it is projected to fall to 5.2% by 2018.

Economic indicators - South East (£ billion, 2010 prices - unless otherwise stated)

	Actual	Forecast Annual % change, real terms					
	2012	2013	2013 2014 2015 2016 2017 2018				
Real household disposable income	155	0.2	1.9	2.0	2.1	2.2	2.5
Household spending	148	2.2	2.4	2.6	2.9	2.9	2.9
Working age population (000s and as % of all)	5,210	60.5%	60.8%	61.1%	61.3%	61.4%	61.4%
House prices (£)	288,817	1.9	3.5	3.9	3.7	3.7	4.0
LFS unemployment (millions)	0.29	6.14	-1.23	-7.66	-4.50	-3.90	-5.16

Source: ONS, DCLG, Experian



2.6 New construction orders – overview

Following a small contraction in 2011, the new construction orders in the South East fell a further 13% in 2012 to total £6.4bn, their lowest value since 2003.

Performance across the sectors was patchy, with infrastructure and industrial construction seeing growth of 16% and 18% respectively. Infrastructure orders reached a medium-term high, but industrial orders are still some way off, with 2012's outturn less than 50% of the 2006 figure.

In contrast, public non-housing orders dropped by 27%, to \pm 1.02bn, their lowest level since 2001. Public housing new orders declined by 1% in 2012 and commercial construction saw a large fall of 22%.

2.7 New construction orders – current situation

Construction new orders in the South East totalled £3.1bn in current prices in the six months to June 2013, 2% higher than in the corresponding period of 2012. New orders in the public housing sector jumped by 54% from a year earlier, although the sector is relatively small and any changes act as a multiplier in percentage terms when compared to the sector

as a whole. The private housing sector also saw a noteworthy annual upturn of 15%, to £1.1bn.

At the other end of the scale, public non-housing orders declined by 30% year-on-year, which is not surprising considering the scope of the public expenditure cuts. Industrial construction new orders fell by 26% over the same period.

Source: ONS

ref. CSN Explained, Section 3, Note 4

2.8 Construction output – short-term forecasts (2014-2015)

Regional Office for National Statistics (ONS) output statistics are published in current prices and are inclusive of any inflationary effect. At the time of writing, regional ONS construction output statistics were only available for the first two guarters of 2013.

In the six months to June 2013, construction output in the South East totalled £8.4bn in current prices, 7% lower than in the corresponding period of 2012. New work output fared worse than R&M, with declines of 11% and 2% respectively. In the first six months of 2013, no new work sectors saw an increase in output when compared to the same period of the previous year. The sharpest falls were seen in public non-housing and industrial construction at 22% and 16% respectively.

New work construction orders - South East (£ million, current prices)

	Actual	Annual % change					
	2012	2008	2009	2010	2011	2012	
Public housing	360	-28.7	-7.6	28.4	-21.7	-1.4	
Private housing	1,823	-36.2	-18.4	45.1	22.5	-16.1	
Infrastructure	1,265	-33.7	146.6	31.6	-37.3	16.4	
Public non-housing	1,017	18.3	-10.9	-2.7	-7.5	-26.9	
Industrial	335	19.1	-41.6	-51.6	58.3	17.5	
Commercial	1,581	25.9	-52.1	-18.7	14.0	-22.4	
Total new work	6,381	0.4	-25.2	6.1	-1.4	-13.1	

Source: ONS. Ref. CSN Explained, Section 3, Note 4

	Actual		Annual average		
	2012	2013	2014	2015	2014-15
Public housing	530	3%	-3%	1%	-1.0%
Private housing	2,690	-1%	9%	6%	7.5%
Infrastructure	1,508	-2%	16%	12%	14.0%
Public non-housing	1,321	-28%	-9%	O%	-4.7%
Industrial	448	-14%	8%	3%	5.6%
Commercial	3,114	-11%	-7%	O%	-3.1%
New work	9,613	-9%	2%	5%	3.5%
Housing R&M	2,819	1%	1%	5%	3.1%
Non-housing R&M	2,591	-10%	0%	1%	0.6%
Total R&M	5,410	-4%	1%	3%	2.0%
Total work	15,022	-7%	2%	4%	2.9%

Construction output 2014-2015 – South East (£ million, 2010 prices)

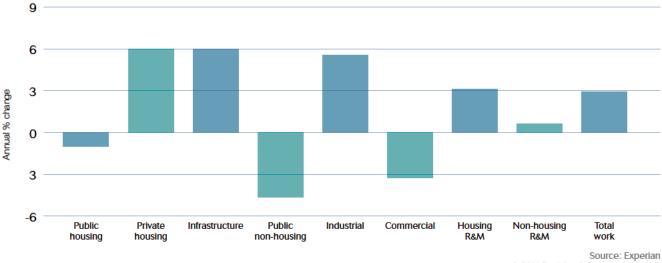
Source: Experian. Ref. CSN Explained, Section 3, Notes 1 and 2

For 2013 as a whole, construction output in the South East is estimated to have declined by 7% in real terms. However, the turnaround is expected to be swift, with growth starting in 2014 and strengthening in 2015, to give an annual average rate over the two years of 2.9%. New work is expected to fare better than R&M, with average annual increases of 3.5% and 2% respectively, over the 2014 to 2015 period.

The region's infrastructure sector is projected to be the strongest performer in the short term, with annual average growth of 14% over the two years to 2015. Projects such as the \pm 750m green power park on the Isle of Thanet in Kent, the start of electrification on the Great Western rail line and works at Gatwick Airport to extend one of the docking piers, will help to boost activity.

The private housing sector is expected to see growth averaging 7.5% a year over the next two years as economic conditions improve and funding schemes such as Help to Buy benefit the sector. Private housing output has already recovered quite strongly in the South East from its 2009 low and the estimated outturn for 2013 is only 9% down on its 2007 peak. However, private housing starts have been much weaker, with the 2012 outturn being only 50% of the 2007 peak. Nevertheless, they are back on a rising trend, with starts in the first three quarters of 2013, a third up on the corresponding period of 2012.

In the short term the strongest declines are expected to be in the public non-housing and commercial sectors, with annual average falls of 4.7% and 3.1% respectively between 2014 and 2015. Funding remains an issue in the former sector, while lack of significant projects is the main reason for the fall in the latter. The contractions are less severe than those seen in recent years and noteworthy growth is expected in all the remaining new work sectors. While the prospects for the future economy are much better than they were a year ago, the impact of the 2008-2009 recession continues. Consumer spending and investment remain at relatively low levels, impacting both the retail and leisure sectors.



Annual average construction output growth 2014-2015 – South East

2.9 Construction output – long-term forecasts (2014-2018)

The South East's annual average output growth rate over the longer period is the same as for 2014 to 2015, namely 2.9%. This compares favourably with the UK average of 2.2%. New work is expected to fare better than R&M, with average growth rates of 3.4% and 2% respectively.

Private housing becomes the strongest sector over the medium term, with an annual average growth rate of 5.7% over the five years to 2018. House price growth is expected to accelerate from its estimated 2013 outturn of 1.9% to average around 3.7% during the forecast period, building on the relatively buoyant growth in the 2008 to 2013 period (3.2%). Large regeneration schemes are due to start on site at Sheerwater and Lewes, both with a large residential element, and a new urban village is planned at Aylesham, near Dover, with work on site possibly starting in 2014.

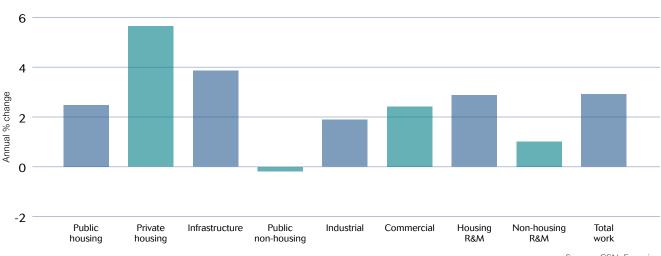
Growth in infrastructure is predicted to slow to just below 4% a year between 2014 and 2018 as activity on the schemes mentioned above slows, with little currently in the pipeline to replace them. A £300m project for a biomass power station in Southampton is due to start in 2015, but the future of the big offshore wind farm developments planned around Hastings and the Isle of Wight must now be uncertain, given the cancellation of the Atlantic Array project off the north Devon coast.

Commercial construction output in the South East is projected to grow by an annual average of 2.5%, although expansion will be centred on the second half of the forecast period as better economic conditions stimulate investment. A number of sizeable projects are in the pipeline, such as the £800m retail development in Crawley town centre. In addition, there are plans for a £2bn theme park on the Swanscombe Peninsula in north Kent, with Paramount film studios having signed an exclusive licensing agreement with the consortium

Construction is forecast to expand at an average rate of 2.9% in the South East higher than the UK average of 2.2%

behind the scheme. The completion and opening of the park is expected to be in 2018, although the scheme is under pressure from other possible projects in the area, including a new power plant that is vying for the same land.

Moderate growth of 1.9% is predicted for the industrial construction sector over the five years to 2018. Construction in the sector is closely linked to general economic improvement, as businesses increase investment in light of better trading conditions, both domestically and internationally. Manufacturing output is forecast to grow at an annual average rate of 1.7% between 2014 and 2018, a much better performance than in the five years to 2013 (-2.4%). Growth is also returning to the distribution and logistics market. Goodman Real Estate UK Ltd has obtained detailed planning permission for one of the biggest distribution facilities to be approved in recent years, a 1.225 million square foot warehouse distribution facility in Kingsnorth Commercial Park in Medway, Kent, worth an estimated £140m.



Annual average construction output growth 2014-2018 – South East

Source: CSN, Experian ref. CSN Explained, Section 3, Note 2

	Estimate		Forecast Annual & change					
	2013	2014	2014 2015 2016 2017 2018					
Public housing	546	-3%	1%	4%	4%	7%	2.5%	
Private housing	2,652	9%	6%	4%	4%	5%	5.7%	
Infrastructure	1,472	16%	12%	-6%	O %	-1%	3.9%	
Public non-housing	948	-9%	0%	3%	2%	4%	-0.1%	
Industrial	387	8%	3%	0%	O %	-1%	1.9%	
Commercial	2,775	-7%	0%	6%	6%	7%	2.5%	
New work	8,780	2%	5%	2%	3%	4%	3.4%	
Housing R&M	2,852	1%	5%	2%	3%	2%	2.9%	
Non-housing R&M	2,325	O %	1%	2%	2%	0%	1.0%	
R&M	5,177	1%	3%	2%	3%	1%	2.0%	
Total work	13,957	2%	4%	2%	3%	3%	2.9%	

Construction output 2014 2018 - South East (£ million, 2005 prices)

2.10 Beyond 2018

As the Government is under increasing pressure to accommodate an inevitable increase in air traffic over the coming years, one of the largest projects in the sector could be the construction of a new airport in the South East or expansion of an existing airport. A number of alternative schemes have been put forward, including a £80bn Thames estuary airport, which, if approved, would begin development in 2025. However, this scheme, much like the expansion of Heathrow Airport, has been met with stiff opposition given the exceptionally high cost of the plan. Another option would be the expansion of Gatwick Airport, by adding a new full-length runway to the site at an approximate cost of £4.1bn. Should that scheme be chosen, work would be expected to begin in 2019.

Source: CSN, Experian.

Ref. CSN Explained, Section 3, Note 2

It remains unclear exactly which scheme will be chosen, although expansion is inevitable, and the South East's infrastructure sector is likely to see a large boost in output, whatever scheme is chosen.

> FORECASTS FOR THE SOUTH EAST CONSTRUCTION EMPLOYMENT

SUMMARY AND KEY FINDINGS

THE OUTLOOK FOR CONSTRUCTION IN THE SOUTH EAST

In the South East growth is expected to be strongest in private housing 5.7% followed by infrastructure

3.9%

3 Construction employment forecasts for the South East

3.1 Total construction employment forecasts by occupation

The table presents actual construction employment (SICs 41-43, 71.1, and 74.9) in the South East for 2012, the estimated total employment across 28 occupational categories in 2013 and forecasts for the industry for 2014 to 2018. A full breakdown of occupational groups is provided in Section 5 of CSN Explained.

Construction employment in the South East is forecast to increase by an average of 1.6% a year over the five years to 2018. Employment is expected to return to growth in 2014 and should rise across the forecast period. This rate of employment growth is higher than the UK average of 1.2%, in line with the region's better output growth (2.9% vs. 2.2%). The largest construction-specific occupations in the South East are wood trades and interior fit-out (8.8%) on the trade side, and other construction professional and technical staff (8.1%) on the professional side. Wood trades' and interior fit-out's share of total construction employment in the South East is lower than the UK average (9.9%) but other professional and technical staff account for a higher proportion (7.3%) than in the UK as a whole.

Employment growth is forecast to be strongest for scaffolders (7.6% a year on average), construction trades supervisors (5.7% a year) and plant mechanics/ fitters (5.3%). The majority of occupational groups (22 out of 28) should see some growth in employment levels over the next five years.

Total employment by occupation – South East

	Actual	Estimate	Fore	cast
	2012	2013	2014	2018
Senior, executive and business process managers	28,800	28,530	28,900	31,020
Construction project managers	7,180	7,140	7,310	8,090
Other construction process managers	27,410	26,000	26,680	29,580
Non-construction professional, technical, IT and other office-based staff	52,000	52,550	53,070	56,440
Construction trades supervisors	5,910	5,500	5,860	7,260
Wood trades and interior fit-out	31,260	30,730	30,800	32,400
Bricklayers	6,380	5,700	5,660	5,800
Building envelope specialists	16,380	14,630	15,230	17,320
Painters and decorators	16,550	16,370	16,340	16,830
Plasterers	5,480	5,000	4,920	4,850
Roofers	8,080	8,190	8,170	8,340
Floorers	4,960	5,420	5,320	5,280
Glaziers	4,380	3,910	3,900	4,010
Specialist building operatives nec*	6,640	6,000	6,000	6,240
Scaffolders	2,350	2,230	2,460	3,220
Plant operatives	5,290	5,770	5,850	6,260
Plant mechanics/fitters	4,020	4,390	4,590	5,680
Steel erectors/structural fabrication	2,400	2,620	2,600	2,630
Labourers nec*	19,100	20,210	19,940	19,550
Electrical trades and installation	27,450	24,530	25,020	27,290
Plumbing and HVAC Trades	19,180	20,370	20,110	20,090
Logistics	2,840	3,100	3,020	2,860
Civil engineering operatives nec*	1,960	1,780	1,810	2,000
Non-construction operatives	2,140	1,910	1,830	1,590
Civil engineers	6,250	6,140	6,250	6,820
Other construction professionals and technical staff	28,770	30,150	30,940	34,420
Architects	4,880	5,330	5,450	5,990
Surveyors	7,170	6,410	6,640	7,630
Total (SIC 41-43)	308,140	302,580	305,390	324,630
Total (SIC 41-43, 71.1, 74.9)	355,210	350,610	354,670	379,490

Source: ONS, CSN, Experian. Ref. CSN Explained, Section 3, Notes 5 and 6 *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, due to the inconsistency and coverage of supply data, these flows do not include movements into the industry from training. Therefore, 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 28 occupations within the South East's construction industry is illustrated in the table. The figure of 1,600 is indicative of the average requirements per year for the industry, 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.

In absolute terms, the largest requirement is for building envelope specialists (570), but, as a proportion of projected 2014 employment, plant mechanics/fitters will be the most required (7.2%). The region's ARR of 1,600 is equivalent to just 0.5% of base 2014 employment, substantially lower than the UK average (1.5%) CITB's 2012 Workforce Mobility and Skills report provides some useful figures on geographical migration of the construction workforce. According to the report, only 52% of the construction workforce in the South East originated there, the third lowest proportion after Greater London and the East of England. Some 10% of the South East's construction workforce originated from overseas, the second highest proportion after Greater London (16%). These large net inflows from other regions are one of the reasons for the low ARR.

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 used will be able to work in the industry without the need for significant retraining.

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 – South East

	2014-2018
Senior, executive and business process managers	-
Construction project managers	-
Other construction process managers	-
Non-construction professional, technical, IT and other office-based staff	-
Construction trades supervisors	-
Wood trades and interior fit-out	-
Bricklayers	-
Building envelope specialists	570
Painters and decorators	260
Plasterers	-
Roofers	60
Floorers	-
Glaziers	110
Specialist building operatives nec*	-
Scaffolders	<50
Plant operatives	-
Plant mechanics/fitters	330
Steel erectors/structural fabrication	-
Labourers nec*	-
Electrical trades and installation	-
Plumbing and HVAC Trades	-
Logistics	-
Civil engineering operatives nec*	<50
Non-construction operatives	-
Civil engineers	-
Other construction professionals and technical staff	-
Architects	160
Surveyors	80
Total (SIC 41-43)	1,360
Total (SIC 41-43, 71.1, 74.9)	1,600

Source: CSN, Experian. Ref. CSN Explained, Section 3, Notes 5 and 6 *Not elsewhere classified

4 Comparisons across the UK

The strongest growth in construction output is expected in the South West and Wales, as both will benefit from new nuclear build projects during the forecast period. Even though main construction works at Wylfa, Wales, are not due to start until mid-2017 at the earliest, this is a very large project in a relatively small market, making its impact on overall construction output similar to Hinkley Point in the South West, despite the latter starting three years earlier.

Once the South West and Wales are stripped away, the south east corner of England is again due to do rather better than the rest of the UK. The South East benefits disproportionally from growth in the private housing sector which takes a larger share of output in the region than the UK average (18% vs. 14%). This combined with a higher than average growth rate (5.7% vs. 4.6%) helps boost overall expansion in the South East's construction sector (with an annual average growth of 2.9% to 2018). The East of England has a slightly stronger average growth rate of 3% a year. The main reasons for the region's higher than average increase in construction output are good growth in private housing, combined with higher than average infrastructure

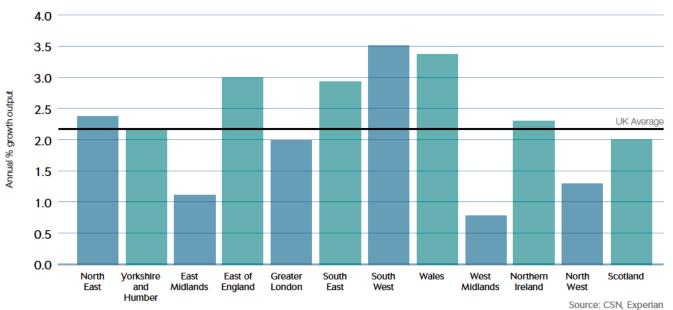
expansion when work starts on the site of the Sizewell C new nuclear project at the beginning of 2018. In addition, strong growth in industrial construction is linked to the development of distribution and logistics facilities around London Gateway Port.

Interestingly however, Greater London's projected annual average output growth rate of 2% is slightly below the UK average (2.2%). Greater London is the only region to have experienced expansion in construction output in real terms over the five years to 2012, therefore activity in some sectors may be close to peaking. For example, infrastructure activity is projected to decline by an annual average of 2.4% in the five years to 2018, as projects such as Crossrail and Thameslink wind down in the second half of the forecast period.

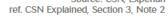
Despite the South West and Wales being the strongest areas in output terms, they do not top the employment rankings. Infrastructure work has a smaller labour requirement than other sectors and so impacts employment much less than output. The East of England has the strongest employment growth rate, of 2% a year on average over the forecast period. This is due to two factors – a strong output growth rate and the region's higher than average share of the much more labour intensive R&M sectors compared with

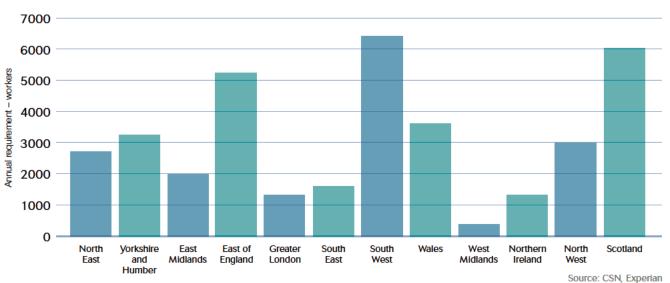
the UK as whole (45% vs. 36%). All regions are expected to see employment growth except the West Midlands, where output growth of just 0.8% a year on average is not enough to drive expansion of employment given anticipated productivity gains.

> Concerns about prospective skills shortages have been increasing in some quarters recently, which may initially seem surprising given the industry's position in the recovery cycle. Construction output in 2013 is likely still to be 15% below its 2007 peak, and employment is likely to be 13% down on its 2008 peak. This would suggest that a substantial pool of construction workers is waiting to re-enter the industry. However, many of these workers may have taken jobs in other sectors, or retired. Ouestions remain about the number of workers who will come back into the industry as growth continues and, of these, how many will have been out of the industry for such a length of time that they will require some level of retraining.



Annual average output growth by region 2014-2018





Annual recruitment requirement (ARR) by region 2014-2018

Employment is expected to rise by an annual average 1.6% to total 379,490 by 2018

CSN Explained

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

Section 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 a UK, national and regional level.

Section 2 provides a glossary to clarify some of the terms that are used in the reports.

Section 3 has some further notes relating to the data sources used for the various charts and tables. This section also outlines what is meant by the term 'footprint', when talking about the areas of responsibility that lie with a Sector Skills Council.

Section 4 explains the sector definitions used within the report and provides examples of what is covered in each.

Section 5 gives a detailed breakdown of the 28 occupational groups into the individual standard occupational classification (SOC) codes that are aggregated to provide the employment and recruitment requirement.

Section 6 concludes this appendix by giving details about the range of LMI reports, the advantages of being a CSN member and details of who to contact if readers are interested in joining.



1 CSN methodology

Background

The **Construction Skills Network** has been evolving since its conception in 2005, acting as vehicle for ConstructionSkills to collect and produce information on the future employment and training needs of the industry. CITB, CIC and CITB-ConstructionSkills Northern Ireland are working as ConstructionSkills, the Sector Skills Council for Construction, to produce robust labour market intelligence which provides 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 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 twice a year and consist of key regional stakeholders invited from industry, Government, education and other SSCs, all of whom contribute their 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 twice a year and sets the national scene, effectively forming a backdrop for the Observatories.

At the heart of the CSN are several 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, which is comprised of statisticians and modelling experts.

The models have evolved over time and will continue to do so, to ensure that they account for new research as it is published as well as new and improved modelling techniques. 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 interrelated 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 CITB 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.

Estimates of demand are based upon the results of discussion groups comprising industry experts, a view of construction output and 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 use a set of specific statistics for each major type of work to 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 year's 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:

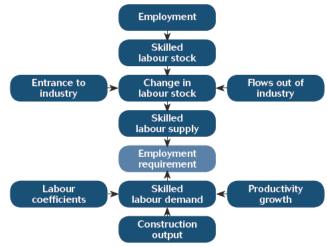
- · Transfers to other industries
- International/domestic OUT migration
- · Permanent retirements (including permanent sickness)
- · Outflow to temporary sickness and home duties.

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

Flows into the labour market include:

- · Transfers from other industries
- International/domestic immigration
- · Inflow from temporary sickness 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.



2 Glossary of terms

Building envelope specialists – any trade involved with the external cladding of a building other than bricklaying, e.g. curtain walling.

Demand – this 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 Employer Skills Survey, produced by the Department for Education and Skills. These data sets are translated into labour requirements by trade using a series of coefficients to produce figures for labour demand that relate to forecast 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 year's supply. In essence, this is the number of workers of each occupation or trade needed 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. Information is collected from around 53,000 households each quarter (the sample totals more than 100,000 people). **LMI** (labour market intelligence) – data that is quantitative (numerical) or qualitative (insights and perceptions) on workers, employers, wages, conditions of work, etc.

Macroeconomics – the study of an economy at a national level, including total employment, investment, imports, exports, production and consumption.

 $\ensuremath{\text{Nec}}$ – not elsewhere classified, used as a reference in LFS data.

ONS (Office for National Statistics) – organisation producing official statistics on the economy, population and society at both a national 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 United Kingdom Standard Industrial Classification of Economic Activities produced by the ONS.

SOC codes (Standard Occupational Classification codes) – from the United Kingdom Standard Occupational Classification produced by the ONS.

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.



3 Notes and footprints

Notes

- 1 Except for Northern Ireland, output data for the English regions, Scotland and Wales is 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 prices to a 2005 constant price basis, so that 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 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 43, 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 43.2.
- 7 A reporting minimum of 50 is used for the annual recruitment requirement (ARR). As a result some region and devolved nation ARR forecasts do not sum to the total UK requirement.
- 8 The Employment and ARR tables show separate totals for SIC 41-43 and SIC 41-43, 71.1 and 74.9. The total for SIC 41-43 covers the first 24 occupational groups on the relevant tables and excludes civil engineers, other construction professionals and technical staff, architects and surveyors. The total for SIC 41-43, 71.1 and 74.9 includes all occupations.

Footprints for Built Environment SSCs

ConstructionSkills is responsible for SIC 41 Construction of buildings, SIC 42 Civil engineering, SIC 43

Specialised construction activities and SIC 71.1 Architectural and engineering activities and related technical consultancy.

The table below summarises the SIC codes (2007) covered by ConstructionSkills:

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 43.21 Electrical installation and SIC 43.22 Plumbing, heat and air-conditioning installation. ConstructionSkills recognises the responsibility of SummitSkills across Standard Industrial Classifications (SIC) 43.21 and 43.22; 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, domestics, facilities managers.

AssetSkills has a peripheral interest in SIC 71.1 Architectural and engineering activities and related technical consultancy.

Energy and Utility Skills

 $\label{eq:product} \begin{array}{l} \textbf{Footprint} - \text{electricity, gas (including gas installers),} \\ \text{water and waste management.} \end{array}$

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.

Construction	ConstructionSkills					
SIC Code	Description					
41.1	Development of building projects					
41.2	Construction of residential and non-residential buildings					
42.1	Construction of roads and railways					
42.2	Construction of utility projects					
42.9	Construction of other civil engineering projects					
43.1	Demolition and site preparation					
43.3	Building completion and finishing					
43.9	Other specialised construction activities nec					
71.1*	Architectural and engineering activities and related technical consultancy					

AssetSkills has a peripheral interest in SIC 71.1

4 Definitions: types and examples of construction work

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

Housing schemes, care homes for the elderly 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, onshore wind farms and decommissioning of nuclear power stations.

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 construction¹

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 and 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 work¹

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.²

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.³

¹ 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'.

² 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.

³ Except where stated, mixed development schemes are classified to whichever sector provides the largest share of finance.

5 Occupational groups

Occupational group Description, SOC (2010) reference.

Senior, executive, and business process managers

Indudgers	
Chief executives and senior officials	1115
Financial managers and directors	1131
Marketing and sales directors	1132
Purchasing managers and directors	1133
Human resource managers and directors	1135
Property, housing and estate managers	1251
Information technology and telecommunications directors	1136
Research and development managers	2150
Managers and directors in storage and warehousing	1162
Managers and proprietors in other services nec*	1259
Functional managers and directors nec*	1139
IT specialist managers	2133
IT project and programme managers	2134
Financial accounts managers	3538
Sales accounts and business development managers	3545
Construction project managers Construction project managers and related	
professionals	2436
Other construction process managers	5
Production managers and directors in manufacturing	1121
Production managers and directors in	

1121
1121
1122
1161
1255
3567
3550

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

IT operations technicians	3131
IT user support technicians	3132
Finance and investment analysts and 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 standards and regulations	3565

Programmers and software development	2136
professionals	2130
Information technology and telecommunications professionals nec*	2139
Estate agents and auctioneers	3544
Solicitors	2413
Legal professionals nec*	2419
Chartered and certified accountants	2421
Business and financial project management	
professionals	2424
Management consultants and business analysts	2423
Receptionists	4216
Typists and related keyboard occupations	4217
Business sales executives	3542
Book-keepers, payroll managers and	
wages clerks	4122
Records clerks and assistants	4131
Stock control clerks and assistants	4133
Telephonists	7213
Communication operators	7214
Personal assistants and other secretaries	4215
Sales and retail assistants	7111
Telephone salespersons	7113
Buyers and procurement officers	3541
Human resources and industrial relations officers	3562
Credit controllers	4121
Company secretaries	4214
Sales related occupations nec*	7129
Call and contact centre occupations	7211
Customer service occupations nec*	7219
Elementary administration occupations nec*	9219
Chemical scientists	2111
Biological scientists and biochemists	2112
Physical scientists	2113
Laboratory technicians	3111
Graphic designers	3421
Environmental health professionals	2463
IT business analysts, architects and	
systems designers	2135
Conservation professionals	2141
Environment professionals	2142
Actuaries, economists and statisticians	2425
Business and related research professionals	2426
Finance officers	4124
Financial administrative occupations nec*	4129
Human resources administrative occupations	4138
Sales administrators	4151
Other administrative occupations nec*	4159
Office supervisors	4162

Customer service managers and supervisors	7220
Office managers	4161
Construction trades supervisors	
Skilled metal, electrical and electronic trades supervisors	5250
Construction and building trades supervisors	5330
u .	
Wood trades and interior fit-out Carpenters and joiners	5315
Paper and wood machine operatives	8121
Furniture makers and other craft woodworkers	5442
Construction and building trades nec* (25%)	5319
-	
Bricklayers Bricklayers and masons	5312
-	5512
Building envelope specialists	
Construction and building trades nec* (50%)	5319
Painters and decorators	
Painters and decorators	5323
Construction and building trades nec* (5%)	5319
Plasterers	
Plasterers	5321
Roofers	
Roofers, roof tilers and slaters	5313
	0010
Floorers	5000
Floorers and wall tilers	5322
Glaziers	
Glaziers, window fabricators and fitters	5316
Construction and building trades nec* (5%)	5319
Specialist building operatives nec*	
Construction operatives nec* (100%)	8149
Construction and building trades nec* (5%)	5319
Industrial cleaning process occupations	9132
Other skilled trades nec*	5449
Scaffolders	
Scaffolders, stagers and riggers	8141
Plant operatives	
Crane drivers	8221
Plant and machine operatives nec*	8129
Fork-lift truck drivers	8222
Mobile machine drivers and operatives nec*	8229
Plant mechanics/fitters	
Metal working production and maintenance	
fitters	5223
Precision instrument makers and repairers	5224
Vehicle technicians, mechanics and electricians	5231
Elementary process plant occupations nec*	9139

7130

Sales supervisors

Tool makers, tool fitters and markers-out	5222
Vehicle body builders and repairers	5232
Steel erectors/structural fabrication	
Steel erectors	5311
Welding trades	5215
Metal plate workers and riveters	5214
Construction and building trades nec* (5%)	5319
Smiths and forge workers	5211
Metal machining setters and setter-operators	5221
Labourers nec*	
Elementary construction occupations (100%)	9120
Electrical trades and installation	
Electricians and electrical fitters	5241
Electrical and electronic trades nec*	5249
Telecommunications engineers	5242
-	5242
Plumbing and heating, ventilation	
and air conditioning trades	
Plumbers and heating and ventilating engineers	5314
Pipe fitters	5216
Construction and building trades nec* (5%)	5319
Air-conditioning and refrigeration engineers	5225
Logistics	
Large goods vehicle drivers	8211
Van drivers	8212
Elementary storage occupations	9260
Buyers and purchasing officers (50%)	3541
Transport and distribution clerks and assistants	4134
Civil engineering operatives nec*	
Road construction operatives	8142
Rail construction and maintenance operatives	8143
Quarry workers and related operatives	8123
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 (vehicles and metal goods)	8132
Routine inspectors and testers	8133
Assemblers and routine operatives nec*	8139
Elementary security occupations nec*	9249
Cleaners and domestics	9233
Street cleaners	9232
Gardeners and landscape gardeners	5113
Caretakers	6232
Security guards and related occupations	9241
Protective service associate professionals nec*	3319
Civil engineers	2121
Civil engineers	Z Z

*Not elsewhere classified

Other construction professionals and technical staff

Mechanical engineers	2122
Electrical engineers	2123
Design and development engineers	2126
Production and process engineers	2127
Quality control and planning engineers	2461
Engineering professionals nec*	2129
Electrical and electronics technicians	3112
Engineering technicians	3113
Building and civil engineering technicians	3114
Science, engineering and production	
technicians nec*	3119
Architectural and town planning technicians	3121
Draughtspersons	3122
Quality assurance technicians	3115
Town planning officers	2432
Electronics engineers	2124
Chartered architectural technologists	2435
Estimators, valuers and assessors	3531
Planning, process and production technicians	3116
Architects	
Architects	2431
Surveyors	
Quantity surveyors	2433
Chartered surveyors	2434
	2.01

*Not elsewhere classified



6 CSN website and contact details

The CSN website

citb.co.uk/research/construction-skills-network 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 other CITB research reports are also freely available on the CITB website. 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 to enter the workforce.

The website also contains 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 CITB research
- Details for those interested in becoming members of the network.

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 that play a vital role in feeding back observations, knowledge and insight into 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 issues
- 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 contact with the CITB research team CSN members can:

- Access observatory-related material such as meeting dates, agendas, presentations and notes
- · Access additional research material
- · Comment/feedback on the CSN process.

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 becoming a member of the CSN, please contact us at: csn@citb.co.uk For more information about the Construction Skills Network, contact:

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CITB, CIC and CITB-ConstructionSkills Northern Ireland are working as ConstructionSkills, the Sector Skills Council for Construction.