

# 2012–2016 Construction Skills Network North West

LABOUR MARKET INTELLIGENCE



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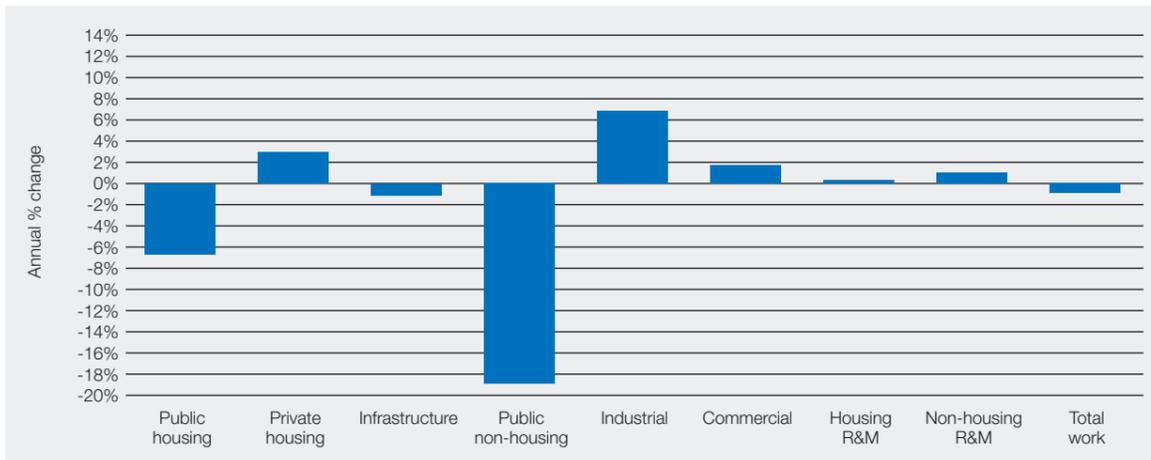
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# 1. Summary – North West

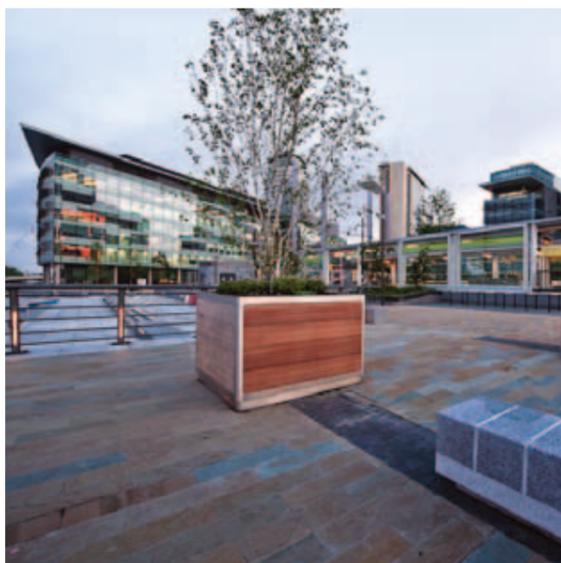
The North West is forecast to see declining activity, with an annual average growth rate of -0.9% in the five years to 2016. The public non-housing sector which accounts for the second biggest share in the new work market is expected to decline by an annual average of 18.9%. While a fall of 7% is predicted for total work in 2012, recovery is expected to begin in 2013, with growth of 3%. However, the improvement in 2013 is largely a bounce-back effect from the previous year and growth is forecast to peter out thereafter. At 255,380 total construction employment in 2016 for the region is expected to increase by a mere 1% on the 2012 level but remain 4% below the 2010 level.

Annual average construction output growth 2012-2016 - North West



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

Media City Peel Media



The North West is forecast to see declining activity, with an annual average growth rate of -0.9% in the five years to 2016.

## Key findings

The commercial sector accounts for the largest share of new work in the North West and is forecast to see a modest average annual growth rate of 1.7%, with expansion peaking at 8% in 2013.

The public non-residential sector is expected to be the worst performing sector in the North West and in the UK as a whole. Output is expected to decline by 18.9% each year on average over the coming five years in the North West.

Public housing is expected to decrease by an annual average of 6.7% over the forecast period. Approximately £188m has been allocated to the North West under the 2011-2015 Affordable Homes Programme (AHP) by the HCA. This sum is significantly lower than the allocation of £689m made for the region during the 2008-2011 AHP.

The industrial sector is projected see the greatest annual average increase of 6.8%. The sector will be supported by the manufacturing industry as the industry grows over the forecast period, albeit at a slower rate year on year. The infrastructure sector will see small falls of 1.1% on an annual average basis whilst the private housing sector is expected to see growth rates of 3% over the same period.

Construction employment in the North West is predicted to reach 255,380 in 2016. There is expected to be a decline in employment until 2013 before a rise is seen in the latter part of the forecast period. The 3% rise in output in 2013 is the main driver of employment growth in 2014 and although growth in total workloads stalls thereafter, the more labour intensive repair and maintenance sectors continue to expand.

Construction managers will see the largest increase in employment levels of 21% between 2010 and 2016. However, focusing on 2012 to 2016 it is the civil engineers that will see the largest increase in employment of 14%.

The annual recruitment requirement (ARR) for the North West is 5,080. Of this, plasterers and dry liners have the highest ARR (23%) in the region. This occupation tends to be more prevalent in the R&M sector, which is projected to perform better than new work. The North West's ARR represents 2% of projected base 2012 employment, roughly in line with the UK average of 1.9%.

## Regional comparison 2012-2016

Region	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

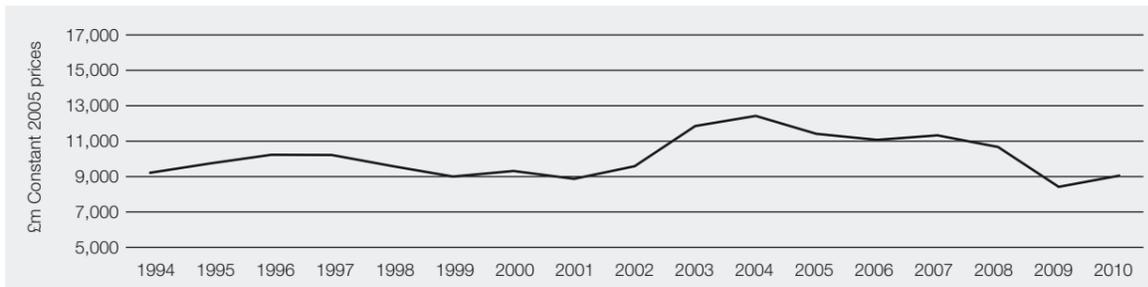
## 2. The outlook for construction in the North West

### 2.1 Construction output in the North West – overview

Total construction output in the region increased by 7% to £9.4bn (2005 prices) in 2010. Whilst the new work sector increased by 12% to £6.3bn, repair and maintenance saw a slight fall of 1%.

The only new work sector in the North West to experience a decline in output was private housing with a fall of 13%. Public housing saw the greatest increase in output, of 59% to £308m, the highest outturn since 1990, as allocations from the 2008-11 AHP and the Kickstart Delivery Programme boosted the sector. The commercial sector saw the slowest increase in output of 7% to £2.2bn

### Construction output 1994-2010 - North West



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

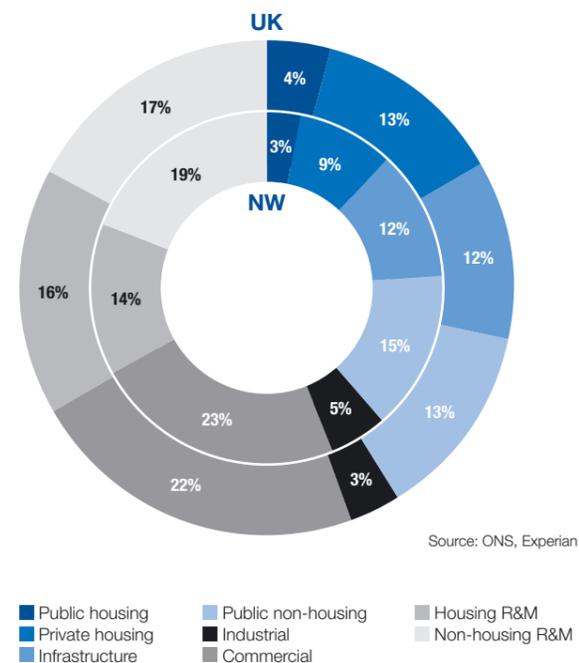
### 2.2 Industry structure

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

The structure of the North West's construction industry is very similar to the UK as a whole, according to the 2010 outturn, with new work and repair and maintenance accounting for the same shares (67% and 33% respectively).

The main sector difference is that private housing takes a proportionally smaller share of total activity in the North West compared with the UK as a whole (9% versus 12%). In contrast the public non-residential and industrial sectors took a 2% larger share in the region.

### Construction industry structure 2010 - UK vs. North West



Source: ONS, Experian



### Economic structure - North West (£ billion, 2006 prices)

Selected sectors	Actual	Forecast					
	2010	Annual % change, real terms					
	2010	2011	2012	2013	2014	2015	2016
Public services	28	0.3	-0.7	-0.3	-0.3	0.1	0.3
Financial and business services	23	0.7	1.5	2.3	2.6	3.0	3.1
Transport and communications	8	1.7	1.2	2.1	2.2	2.4	2.4
Manufacturing	19	3.9	2.5	3.0	2.2	1.6	1.0
Distribution, hotels and catering	18	0.8	0.7	1.9	2.2	2.5	2.7
<b>Total Gross Value Added (GVA)</b>	<b>114</b>	<b>1.0</b>	<b>0.6</b>	<b>1.5</b>	<b>1.6</b>	<b>1.9</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 the North West's Gross Value Added (GVA) increased by 2% to £114bn (2006 prices) on a year on year basis. As a share of the UK, the North West accounted for 10% of GVA, unchanged when compared to the previous year.

Public services fell by 1% to £27.6bn in 2010, having seen growth of 3% in the previous year. Financial and business services expanded by 2% in 2010 following a 2% decline in 2009. Manufacturing and distribution, hotels and catering both saw an increase in output of 4% in 2010. Despite a fall of 2% in the transport and communications sector in 2010, the overall share of the sector in the North West remained identical to the previous year at 7% of GVA.

Public services remains the biggest sector in the North West economy, accounting for around 24% of gross value added, in line with the UK average. However, the share of manufacturing in the North West is higher than in the UK (16% compared with 12%, and the share taken by the financial & business services sector is lower (20% compared with 25%).

### 2.5 Forward looking economic indicators

Over the forecast period GVA in the North West region is expected to grow at a steady pace. The annual average rate of growth from over the five years to 2016 is 1.5%, slightly lower than the UK as a whole (1.8%). With the exception of public services, the larger sectors are expected to grow at an annual average growth rate of around 2%. The public service sector is projected to experience zero growth over the period, decreasing in its share of the North West's GVA from 24% in 2011 to 22% in 2016.

Real household disposable incomes are likely to fall by 3.5% in 2011. Consumers are expected to feel the pinch due to depressed wage growth and high inflation. Over the forecast period growth in real incomes is expected to return and by 2016 reach 2.5%. Household spending also takes on a similar trend however unemployment is projected to peak in 2012 and decline slowly thereafter.

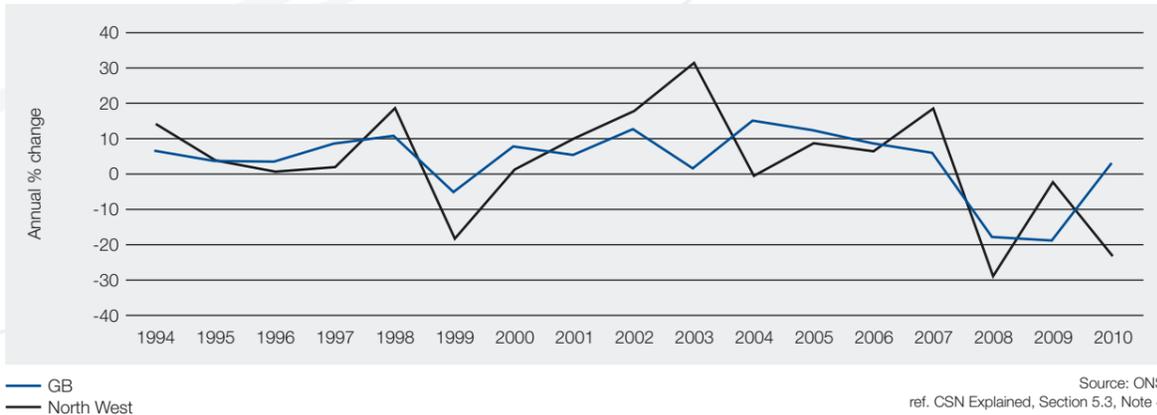
The working age population stood at 4.2m in 2010 and is predicted to increase at a steady rate over the forecast period. House prices are predicted to fall by around 3% in 2011 before starting to recover in 2012. The rate of increase in prices will pick up in 2013 and from 2014 to 2016 prices are expected to grow by 3% each year.

### Economic indicators - North West (£ billion, 2006 prices - unless otherwise stated)

	Actual	Forecast					
	2010	Annual % change, real terms					
	2010	2011	2012	2013	2014	2015	2016
Real household disposable income	98	-3.5	0.1	1.6	1.8	2.4	2.5
Household spending	91	-1.8	-0.2	1.4	1.7	2.1	2.4
Working age population (000s and as % of all)	4,178	60.2%	60.3%	60.9%	61.4%	61.9%	62.2%
House prices (£)	152,555	-2.8	0.4	2.4	2.8	2.7	2.8
LFS unemployment (millions)	0.28	0.30	0.32	0.30	0.29	0.27	0.25

Source: ONS, DCLG, Experian

### New construction orders growth 1994-2010 - North West vs. GB



### 2.6 New construction orders – overview

Following a 2% contraction in new construction orders in 2009, they fell by 23% to £4.8bn last year, their lowest level since 2002.

Only the private housing and the commercial sectors saw a rise in orders in 2010 and these were marginal at 4% and 2% respectively. After a rise in orders of 62% in 2009, infrastructure saw the greatest decline as they fell by 56% to £774m in 2010, their lowest level since 2008. After rising by 18% in 2009, public housing orders fell by 29% to £194m in 2010, their lowest level since 2006. The public non-residential and industrial sectors saw a decline in orders of 20% and 19% respectively.

### 2.7 New construction orders – current situation

In the six months to June 2011 total new construction orders fell by 9% to £2.2bn (in current prices). The industrial, infrastructure and commercial sectors all saw falls in orders, of 52%, 46% and 18% respectively. In the three months to June 2011 industrial orders stood at £23m which is the lowest quarterly level of orders since records began. Infrastructure orders stood at £69m which is the lowest level of quarterly orders since the last quarter of 2000.

The public housing sector saw the greatest increase in orders as they rose by 44% year on year to £186m in the six months to June 2011. The private housing sector followed closely behind as orders increased by 42%. Rather surprisingly, the public non-residential sector also saw an increase in orders, of 5%.

### New work construction orders - North West (£ million, current prices)

	Actual	Annual % change				
	2010	2006	2007	2008	2009	2010
Public housing	194	149.7	46.1	-42.8	17.8	-29.0
Private housing	560	5.5	-11.0	-46.0	-43.3	3.6
Infrastructure	774	-54.3	80.9	58.5	61.8	-55.9
Public non-housing	1549	-19.2	18.2	21.6	31.4	-20.4
Industrial	276	1.4	-3.3	0.8	-49.6	-19.4
Commercial	1432	36.6	31.8	-54.0	-29.4	2.3
<b>Total new work</b>	<b>4,785</b>	<b>6.4</b>	<b>18.6</b>	<b>-29.2</b>	<b>-2.4</b>	<b>-23.5</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, regional ONS construction output statistics were only available for the first two quarters of 2011.

In current prices construction output in the six months to June 2011 saw no change when compared to the corresponding period of the preceding year. New work saw a 3% fall in output whilst the R&M sector saw a 7% rise.

Construction output in the North West is expected to decline by an annual average of 2.1% in the next two years. After a marginal fall in output of 1% in 2011, the decline is predicted to accelerate to 7% in 2012 before a recovery of 3% in 2013.

The commercial sector accounts for the largest share of new work and the market is expected to see no change in output levels in 2011. Output is likely to decline by around 3% in 2012 before rising by 8% in 2013. The North Liverpool City Fringe Employment and Investment Programme (NLCFEIP) has secured £25m from the Government's Regional Growth Fund. As part of this programme there will be a mixed use redevelopment of Stanley Dock's tobacco warehouse. It is anticipated that shops, bars and office development will take place.

The public non-housing sector accounts for the second largest share of new work and is expected to decline at an annual average rate of 26.9% over the next two years. The region has benefited greatly from the Building Schools for the Future (BSF) programme. Waves 1 to 4 saw ten separate programmes of which nine were successfully completed.

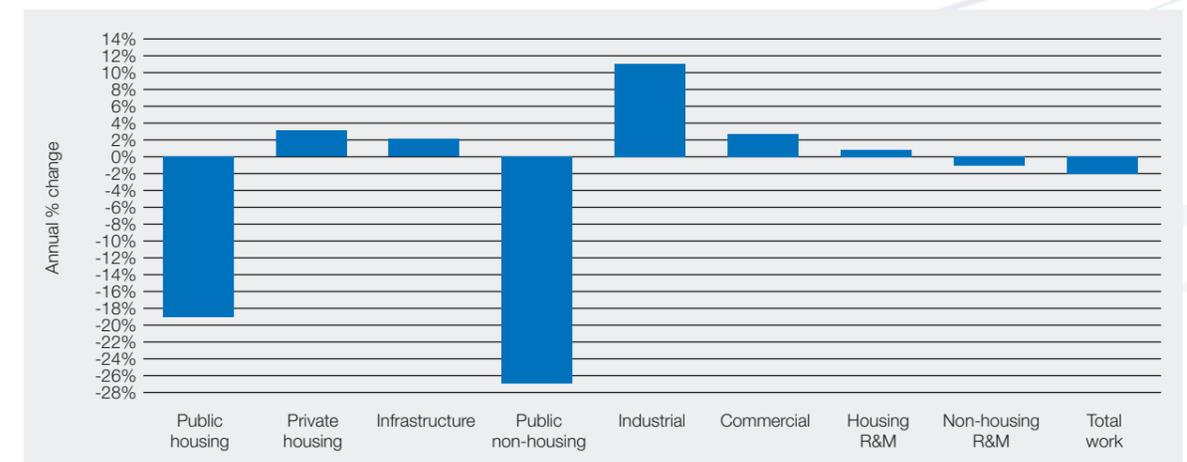
In total approximately 97 schools in the North West have benefited and once 'legacy' projects begin to complete, then substantial falls in education construction are expected.

There are a number of projects that are currently being carried out by the region's universities. Manchester Metropolitan University is currently constructing a £75m student hub and business school. Once built this structure will be the UK's largest business school. The facility is expected to open in September 2012. Down the road Manchester University is also currently undertaking implementation of its brand new School of Chemical Engineering and Analytical Science. The £30m investment is due to be completed in 2015. Lastly, the greatest investment comes from Liverpool University as £600m is put towards its university. There is ongoing improvement and revamping of the university's facilities and £250m will go towards the redevelopment of student accommodation.

The infrastructure sector accounts for the third largest share of new work. Output is predicted to increase at an annual average of 2.1% during the 2012-2013 period. One of the projects contributing towards this growth is NLCFEIP. Within this programme there will be immediate implementation of a low carbon combined heat and energy plant.

Both the private housing (3.1%) and industrial sectors (11%) are predicted to see an increase in their annual average growth rates over the next two years. However, the strong growth predicted for the industrial sector has little effect on the overall performance of the North West construction industry as it only accounts for 5% of output. The public housing sector is expected to see a decline at an annual average rate of 19% during the next two years.

### Annual average construction output growth 2012-2013 - North West



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

## Construction output - North West (£ million, 2005 prices)

	Actual	Forecast annual % change			Annual average
	2010	2011	2012	2013	2012-13
Public housing	308	-1%	-23%	-15%	-19.0%
Private housing	831	-1%	1%	5%	3.1%
Infrastructure	1,122	5%	-8%	13%	2.1%
Public non-housing	1,391	-5%	-37%	-16%	-26.9%
Industrial	506	-14%	10%	12%	11.0%
Commercial	2,161	0%	-3%	8%	2.7%
<b>New work</b>	<b>6,319</b>	<b>-1%</b>	<b>-10%</b>	<b>4%</b>	<b>-3.3%</b>
Housing R&M	1,322	-8%	-1%	-1%	-0.8%
Non-housing R&M	1,794	5%	0%	2%	1.1%
<b>Total R&amp;M</b>	<b>3,115</b>	<b>-1%</b>	<b>0%</b>	<b>1%</b>	<b>0.3%</b>
<b>Total work</b>	<b>9,434</b>	<b>-1%</b>	<b>-7%</b>	<b>3%</b>	<b>-2.1%</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 predicted to decline at an annual average rate of 0.9% over the next five years. Both the North West and the West Midlands are the only two regions to have projected declines in output levels over the 2012 to 2016 forecast period.

Public non-residential is expected to be the worst performing sector in the North West with an annual average rate of output decline of 18.9% over the coming five years. The majority of this fall in output occurs between 2012 and 2014. After this period output is still expected to decline, but at relatively lower rates.

The region was initially expected to benefit from eight separate programmes under the Building Schools for the Future programme during waves 5 and 6 and the legacy programme will continue to deliver schools that have been funded. For the North West this means that only eight schools and academies will continue, whilst a further 60 have been cancelled.

Public housing output is also expected to fall, by an annual average of 6.7% over the five-year forecast period. The greatest decline in output is expected to arise in 2012 before modest growth levels are seen in 2015 and 2016. Current data on the 2011-2015 Affordable Homes Programme show approximately £188m allocated to the North West by the HCA. This sum is significantly lower than the allocation of £689m made during the 2008-2011 period. Between 2011 and 2015 approximately 9,300 new affordable homes are planned to be constructed in the North West, around 12% of the total. In 2010, the stock of public housing in the North West stood at 14% of the English total indicating that the share of new homes allocated through the affordable homes programme is below average for the region.

The infrastructure sector will see small falls of 1.1% on an annual average basis. Cheshire East Council has awarded Ringway Jacobs with a £147m contract to repair, maintain and design new motorways for the next five years. On a

much larger scale, the Mersey Gateway Bridge will see work commence within the next two years and it is anticipated that the project will take approximately three years to complete. The construction cost is around £589m including land purchase and remediation.

The strongest sector in the North West over the forecast period is predicted to be the industrial construction one, with annual average growth of 6.8%. However, it will be coming back from a very low base, and even in 2016 output in the sector is likely to be 30% below its previous peak in 2003 in real terms. The greatest level of growth is expected to take place between 2012 and 2013.

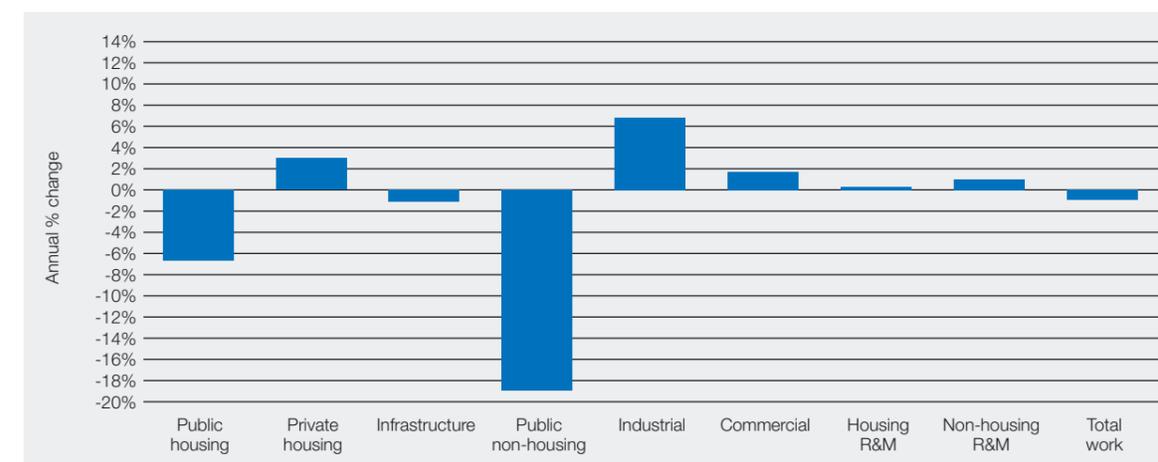
The private housing and commercial sectors are expected to see annual average growth rates of 3% and 1.7% respectively. For the former growth is expected to reach peak levels (5%) during 2012 and 2013. For the latter output is expected to decline by 3% in 2012 before bouncing back by 8% in 2013.

The £4.5bn Wirral Waters regeneration scheme which is planned by Peel Holdings now has additional investment added to the scheme. Plans for a £200m International Trade Centre (ITC) have been speedily approved by councillors. The ITC will consist of four multi-level buildings and there is hope that this will allow more than 1,000 companies from emerging Asian markets in China, India and South Korea to distribute their goods throughout Europe.

Chester city centre has secured a major regeneration scheme for a Central Business District worth around £115m. Implementation is due to commence in 2013 and it is estimated that it will take around 10 years to complete. Once finished the project will have over 500,000 square feet of Grade 'A' office Space.

The housing R&M sector will see average annual output grow at 0.3%, the weakest performing region in the UK. Non-housing R&M slightly out performs the former sector as average annual growth of 1% is predicted.

## Annual average construction output growth 2012-2016 - North West



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

## Construction output - North West (£ million, 2005 prices)

	Estimate	Forecast annual % change					Annual average
	2011	2012	2013	2014	2015	2016	2012-16
Public housing	306	-23%	-15%	0%	6%	2%	-6.7%
Private housing	825	1%	5%	5%	3%	1%	3.0%
Infrastructure	1,183	-8%	13%	5%	-6%	-8%	-1.1%
Public non-housing	1,322	-37%	-16%	-25%	-7%	-6%	-18.9%
Industrial	437	10%	12%	5%	5%	2%	6.8%
Commercial	2,153	-3%	8%	1%	1%	1%	1.7%
<b>New work</b>	<b>6,226</b>	<b>-10%</b>	<b>4%</b>	<b>0%</b>	<b>-1%</b>	<b>-1%</b>	<b>-1.7%</b>
Housing R&M	1,218	-1%	-1%	1%	2%	0%	0.3%
Non-housing R&M	1,879	0%	2%	1%	1%	1%	1.0%
<b>R&amp;M</b>	<b>3,097</b>	<b>0%</b>	<b>1%</b>	<b>1%</b>	<b>1%</b>	<b>1%</b>	<b>0.7%</b>
<b>Total work</b>	<b>9,323</b>	<b>-7%</b>	<b>3%</b>	<b>0%</b>	<b>0%</b>	<b>-1%</b>	<b>-0.9%</b>

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

### 2.10 Beyond 2016

As part of NuGeneration Ltd's multi-billion pound investment for West Cumbria a new power station has been planned for Sellafield. The project is expected to create 5,000 jobs and is due to open in 2023.

Under the Greater Manchester Transport Fund approximately £1.5bn will be invested in various forms of transport projects ready for delivery by 2020.

Finally, one of the biggest projects in the region is a £50bn project that brings together a group of social landlords and four local authorities in Liverpool in order to retrofit 100,000 homes. During project Viridis' first phase there will be focus on the installation of photovoltaic panels so partner organisations can capitalise on the Feed-in Tariff scheme. Phase two will then address retrofit options. It is anticipated that work will commence in 2012 and will end in 2019.

# 3. Construction employment forecasts for the North West

## 3.1 Total construction employment forecasts by occupation

The table presents actual construction employment (SICs 41-43, 71.1, and 74.9) in the North West 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 the North West is forecast to reach 255,380 in 2016. This is 4% lower than in 2010 but 1% more than the 2012 figure. The expectation is that employment will continue to fall until 2013 before picking up during the latter part of the forecast period. The 3% rise in output in 2013 is the main driver of employment growth in 2014 and although growth in total workloads stalls thereafter, the more labour intensive repair and maintenance sectors continue to expand.

### Total employment by occupation - North West

	Actual	Forecast	
	2010	2012	2016
Senior, executive, and business process managers	12,660	10,770	10,110
Construction managers	25,510	27,630	30,850
Non-construction professional, technical, IT, and other office-based staff	37,220	31,990	29,920
Wood trades and interior fit-out	26,200	26,650	26,600
Bricklayers	6,430	6,620	6,220
Building envelope specialists	8,180	7,330	7,780
Painters and decorators	12,150	10,480	9,880
Plasterers and dry liners	7,980	7,480	7,870
Roofers	5,600	4,710	4,930
Floorers	3,680	3,900	3,890
Glaziers	2,480	2,590	2,430
Specialist building operatives nec*	3,480	3,590	3,800
Scaffolders	1,320	1,410	1,510
Plant operatives	5,120	5,650	5,930
Plant mechanics/fitters	5,060	5,000	3,990
Steel erectors/structural	3,700	3,260	3,340
Labourers nec*	10,600	9,990	10,480
Electrical trades and installation	21,750	19,480	20,700
Plumbing and HVAC trades	19,290	18,370	19,400
Logistics	3,870	3,550	3,490
Civil engineering operatives nec*	3,110	2,550	2,230
Non-construction operatives	4,140	4,250	3,740
Civil engineers	5,270	4,680	5,320
Other construction professionals and technical staff	21,840	19,720	20,580
Architects	1,630	1,920	1,730
Surveyors	7,980	8,280	8,660
<b>Total (SIC 41-43)</b>	<b>229,530</b>	<b>217,250</b>	<b>219,090</b>
<b>Total (SIC 41-43, 71.1, 74.9)</b>	<b>266,250</b>	<b>251,850</b>	<b>255,380</b>

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

The largest trade occupation in the North West in 2010 was wood trades and interior fit out, accounting for 10% of the total workforce. The occupation is expected to maintain this share over the forecast period, with 2% growth between 2010 and 2016.

Construction managers are projected to see the largest increase in employment levels of 21% between 2010 and 2016. However, focusing on the forecast period it is the civil engineers that will see the largest increase in employment, of 14%. The skills that are possessed by these workers tend to be applied right across the construction sector.

## 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 the North West's construction industry is illustrated in the table. The figure of 5,080 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 1,170 and accounting for 23% of the North West's total ARR (5,080) plasterers and dry liners have the highest ARR in the region. This occupation tends to be more prevalent in the R&M sector, which is projected to perform better than new

work. The North West's ARR represents 2% of projected base 2012 employment, roughly in line with the UK average of 1.9%.

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, 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 - North West

	2012-2016
Senior, executive, and business process managers	-
Construction managers	-
Non-construction professional, technical, IT, and other office-based staff	-
Wood trades and interior fit-out	-
Bricklayers	750
Building envelope specialists	-
Painters and decorators	1,060
Plasterers and dry liners	1,170
Roofers	70
Floorers	300
Glaziers	330
Specialist building operatives nec*	-
Scaffolders	<50
Plant operatives	-
Plant mechanics/fitters	420
Steel erectors/structural	-
Labourers nec*	-
Electrical trades and installation	-
Plumbing and HVAC trades	-
Logistics	210
Civil engineering operatives nec*	510
Non-construction operatives	-
Civil engineers	-
Other construction professionals and technical staff	-
Architects	230
Surveyors	-
<b>Total (SIC 41-43)</b>	<b>230</b>
<b>Total (SIC 41-43, 71.1, 74.9)</b>	<b>5,080</b>

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

## 4. Comparisons across the UK

The North West (-0.9%) along with the West Midlands (-1.1%) are the only regions projected to see a decline in their annual average growth rate over the next five years. 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, 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. The North West was a major beneficiary under the early waves of BSF thus, unfortunately has further to fall once the remaining 'legacy' projects start to complete.

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 by 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 North West has the new Mersey Crossing to commence, hence a good level of growth in the early part of the forecast period. However activity is likely to tail-off with work on the new nuclear build projects unlikely to start before 2017.

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. The North West has the prospect of substantial new development in the Wirral and Liverpool dockyards, but these will be long-term programmes spread over 30 to 40 years.

Not surprisingly, given its weak output performance, the North West is projected to experience an annual average decline in employment of 0.5% over the five years to 2016, compared with growth of 0.6% across the UK as a whole. Wales is predicted to have the strongest growth in employment, despite having only moderate growth in output. That is because most of its growth is focussed in the more labour intensive R&M sectors. Employment growth is also stronger than the UK average in the South East, Greater London and the South West.

The North West's ARR as a percentage of 2012 employment, at 2% is in line with the UK average. However as the region is expected to perform worse in terms of output and employment than the UK as a whole, this would indicate a stronger level of net employment outflows in the North West when compared to the UK.

The North West (-0.9%) along with the West Midlands (-1.1%) are the only regions projected to see a decline in their annual average growth rate over the next five years.

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

Media City  
Peel Media



Not surprisingly, given its weak output performance, the North West is projected to experience an annual average decline in employment of 0.5% over the five years to 2016, compared with growth of 0.6% across the UK as a whole.

## 5. CSN explained

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

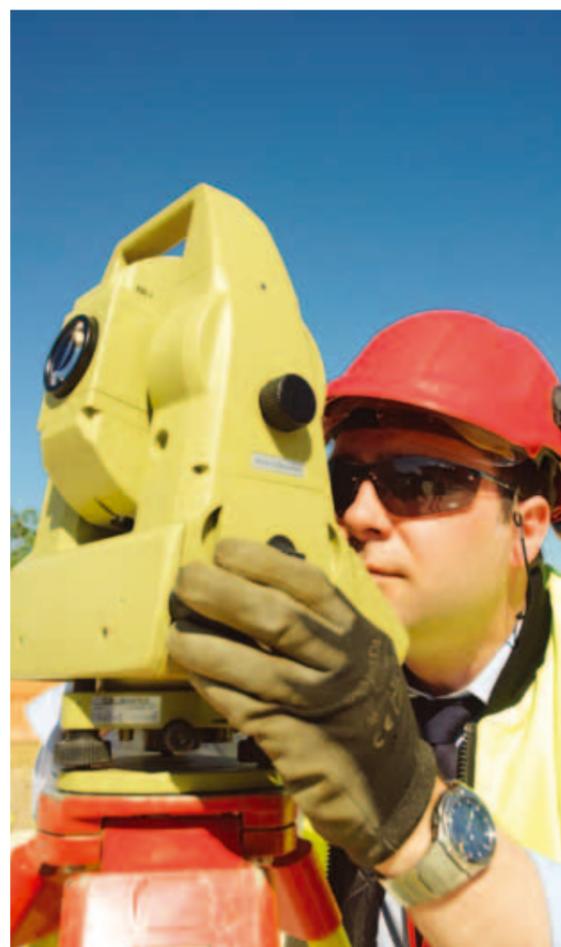
Section 5.1 gives an overview of the underpinning methods that are used by the CSN, working in partnership with Experian, to produce the suite of reports at both a UK, national and regional level.

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:

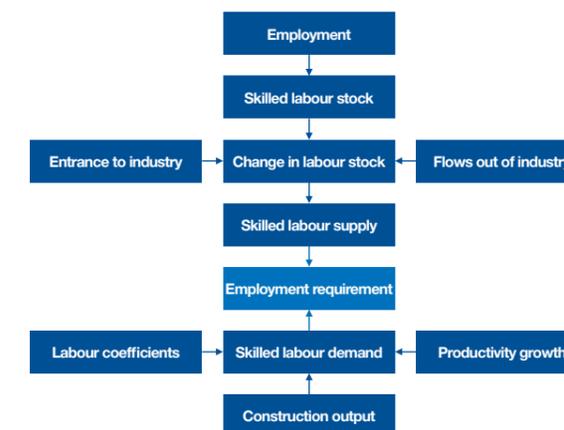
- transfers to other industries
- international/domestic OUT migration
- permanent retirements (including permanently sick)
- outflow to temporarily sick and home duties.

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

### 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



## 5.6 CSN website and contact details

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

**Cskills website**

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

**CSN webpage**

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

