

# Research Bulletin 18/2 | The Direct Impact of the National Living Wage in Northern Ireland 2016-2020

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## Summary

The Chancellor announced in July 2015 that a new National Living Wage (NLW) for employees aged 25 and over from April 2016 would be introduced. The April 2018 £7.83 per hour NLW in Northern Ireland is estimated to cover 108,000 employees aged 25 and over with an annual direct increase of £47.5 million. The wholesale and retail trade sector will account for the single largest number of employees directly impacted followed by manufacturing businesses and the human health and social work sector. Meeting the Government's aspiration for the NLW by 2020 of around £9.00 per hour will require the NLW to be raised by around 55 pence per hour in both 2019 and 2020. Whilst the implementation of the first two years of the National Living Wage has, to date, not proven to be hugely controversial, the impacts of the NLW to 2020 and beyond will vary by business type and be subject to decisions made and implemented within an uncertain future economic context.

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*"The most that can be expected from any model is that it can supply a useful approximation to reality: All models are wrong; some models are useful". Box, G. E. P.; Hunter, J. S.; Hunter, W. G. (2005)*

## Introduction

The then Chancellor announced in the July 2015 Budget that the UK would introduce a National Living Wage (NLW) for all employees aged 25 and over to be implemented on 1<sup>st</sup> April 2016. On implementation, the NLW for those affected employees aged 25 or over and who were not in their first year of an apprenticeship, was set at the rate of £7.20 per hour. At the time of implementation, the NLW was equivalent to a 50p hourly premium on the, then, existing National Minimum Wage (NMW) for those aged 21 and over which had been set at £6.70 per hour in October 2015. Subsequent increases to the NLW as advised by the Low Pay Commission were £7.50 in April 2017 and £7.83 for April 2018. The annual incremental changes to the NLW over time are intended to reach the Government's target of 60% of the national median full-time hourly wage by 2020. Whilst forecasting future wages and earnings is not without difficulty, this aspiration for the value of the NLW would imply a value by 2020 of around £9.00 per hour.

The NLW represents a national initiative with the possibility that both the scale and characteristics of impact could differ regionally on the basis of differences in the characteristics of regional economies. Initial investigation utilising

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published Annual Survey of Hours and Earnings (ASHE) earnings data for Northern Ireland for 2014<sup>i</sup> indicated that, whilst the potential pattern of impact of the NLW in terms of occupational groups and industrial sectors appeared consistent with that published elsewhere for the UK as a whole by the Resolution foundation<sup>ii iii iv</sup> and the Office for National Statistics<sup>v vi</sup>, the scale of coverage of affected employees and employers in Northern Ireland appeared somewhat higher compared to the UK average impact. Further research work published by the Low Pay Commission in March 2016 indicated that the impact of the National Living Wage was likely to vary substantially across age groups, regions, industry, occupation and firm size and was likely to have a greater impact on: those who are aged 25-30 or over 60; those working in Wales, Northern Ireland and outside the South East of England; those working in low-paying occupations and sectors; and those working in small firms<sup>vii</sup>.

On that basis, analytical work was developed and taken forward by Analytical Services Division to attempt to more precisely quantify and describe the potential impact of the NLW in Northern Ireland on implementation and over time to 2020. Published in October 2016<sup>viii</sup> and detailing the methodology and results in full, that research indicated that the main direct beneficiaries of the NLW would indeed be those employees that were intended to benefit, that is, employees working in lower waged, lower skilled occupations and industrial sectors and younger employees. An increasing number of employees, from around 56,000 in 2016 to potentially 158,000 by 2020 would be impacted directly by the NLW.

The potential direct annual impact of the NLW on the earnings of all employees aged 25 and over was estimated to be annual increases of around 0.5% or less on the respective paybill although businesses within the accommodation and food (increase of around 2.5%), administrative and support services (increase of around 1.2%) and wholesale and retail sectors (increase of around 1.2%) would see higher annual percentage increases in their paybill for all employees aged 25 and over. The NLW was projected to result in annual earnings increases of around 5% for those eligible employees compared to, the then, forecast annual increases in earnings of all employees aged 25 and over of around 3%.

Overall, the Northern Ireland analyses reported in 2016 was consistent with the UK-wide pattern of impact as described in other analytical and research work reported variously by the Office for National Statistics, the Resolution Foundation and the Low Pay Commission. For a range of factors including regional business composition, regional occupational structures and regional wage levels, the scale of impact of the NLW in Northern Ireland was projected to be relatively greater than that seen at an overall UK level.

## Updating

Following on from the publication of the initial research in October 2016, subsequent analytical work was conducted utilising both the 2016 and 2017 Annual Survey of Hours and Earnings data for Northern Ireland to estimate impacts of changes to the NLW in April 2017 and 2018 respectively (Table 1).

**Table 1: Headline Estimates for the Impact of the National Living Wage in Northern Ireland**

	Value of the NLW at 1 <sup>st</sup> April	Number of employees aged 25+ impacted by the NLW	Percentage of employees aged 25+ impacted by the NLW	Direct additional financial impact of the NLW	Percentage impact of the NLW on the paybill of all employees aged 25+
<b>2016</b>	£7.20	55,700	8.1%	£56.0m	0.34%
<b>2017</b>	£7.50	104,731	13.6%	£42.6m	0.23%
<b>2018</b>	£7.83	108,427	14.4%	£47.5m	0.25%

The number of employees aged 25 and over to be directly impacted by the NLW is estimated to rise to around 108,000 on 1<sup>st</sup> April 2018 representing around 14% of all employees aged 25 and over. Whilst forecasting future impacts of the NLW to 2020 is difficult, it is possible that by 2020 the NLW could impact around 158,000 employees aged 25 and over representing around 23% of all those employees aged 25 and over.

The direct financial impact each year to bring all those paid below the NLW to at least the level of the new NLW was estimated to be around £56 million in April 2016, £43 million in April 2017 and £48 million in April 2018. For each year, the direct contribution of the NLW to the annual wage increase of all employees aged 25 and over was estimated to be between a quarter and a third of one percent.

In broad terms, with each annual increase in the NLW, the number of employees in Northern Ireland directly impacted increases as does the proportion of employees aged 25 and over. The direct impact of the NLW each year represents a fraction of the overall annual earnings increases both forecast and experienced. Whilst at face value the scale of the impact of the NLW on the Northern Ireland paybill might seem 'marginal' the impact is not evenly distributed throughout the economy with some sectors more impacted than others.

For the NLW increase in April 2018, the wholesale and retail trade (30,800) will account for the single largest number of employees impacted followed by manufacturing businesses (18,300) and human health and social work (18,200). In terms of the share of employees within each sector impacted directly by the NLW, businesses in accommodation and food services (47%) had the greatest proportion of its employees aged 25 and over impacted by the NLW followed by administrative and support service activities (37%), and wholesale and retail (31%). In terms of the distribution of the direct financial impact of the NLW, the wholesale and retail trade (£11.8 million), manufacturing (£9.3 million) and human health and social work activities (£7.3 million) account for some 60% of the total direct financial impact of £47.5 million at April 2018 (Table 2).

**Table 2: Industrial Sector Impacts of the 2018 National Living Wage in Northern Ireland**

	Number of employees directly impacted by the 2018 NLW	Percentage of employees directly impacted by the 2018 NLW	Additional direct annual earnings due to the 2018 NLW	Percentage increase in sector annual paybill due to 2018 NLW
<b>Manufacturing</b>	18,300	17%	£9,300,000	0.33%
<b>Wholesale and retail trade, repair of motor vehicles and motorcycles</b>	30,800	31%	£11,800,000	0.61%
<b>Accommodation and food service activities</b>	12,700	47%	£5,900,000	1.36%
<b>Administrative and support service activities</b>	12,900	37%	£6,100,000	0.94%
<b>Education</b>	1,600	2%	£900,000	0.04%
<b>Human health and social work activities</b>	18,200	12%	£7,300,000	0.20%
<b>All other activities</b>	14,000	6%	£6,200,000	0.09%

In relation to the characteristics of those employees directly benefiting from the NLW in April 2018, two perspectives are possible, one looking at the share of all employees aged 25 and over who benefit from the NLW and, secondly, the composition of those benefiting from the NLW (Table 3).

In terms of all employees aged 25 and over, more female (17%) than male (12%) employees and more part time (28%) than full time (9%) employees are impacted by the NLW. Combining sex and work patterns indicate that the single group with the highest level of impact of the NLW are male part time employees (34%). The youngest employee age group of between 25 and 34 (18%) and the eldest comprising employees aged 65 and over (22%) have the highest levels of impact. Higher shares of employees impacted by the NLW in April 2018 also occur amongst private sector employees (22%) and employees working in customer sales and service occupations (45%) and elementary occupations (40%).

In terms of the characteristics of the 108,000 employees estimated to be impacted by the April 2018 NLW, they are comprised of more female (58%) and slightly more part time workers (52%). Combining sex and working patterns, female part time workers (38%) and male full time workers (28%) together comprise two thirds off all those impacted by the NLW. Younger employees aged 25 to 34 comprise just over one third (34%) of those employees impacted by the NLW and the majority of those employees impacted by the NLW work in the private sector (91%). Around half of all those impacted by the NLW work in elementary occupations (26%) and sales and customer service (22%).

**Table 3: Characteristics of Employees Impacted by the April 2018 National Living Wage in Northern Ireland**

Characteristics		Share of employees aged 25+ benefiting from the April 2018 NLW	Composition of employees aged 25+ benefiting from the April 2018 NLW
<b>Sex</b>	Male	12%	42%
	Female	17%	58%
<b>Work pattern</b>	Full time	9%	48%
	Part time	28%	52%
<b>Sex and work pattern</b>	Male full-time	9%	28%
	Male part-time	34%	14%
	Female full-time	10%	21%
	Female part-time	26%	38%
<b>Age group</b>	25-34	18%	35%
	35-44	13%	25%
	45-54	11%	21%
	55-64	14%	15%
	65+	22%	4%
<b>Public/Private</b>	Public	1%	3%
	Private	22%	91%
	Non-profit body / mutual association	12%	5%
<b>Occupational groups</b>	Associate professional, professional, managers, directors and senior officials	1%	4%
	Administrative and secretarial	8%	7%
	Skilled trades	11%	8%
	Caring, leisure & other service	27%	16%
	Sales and customer service	45%	22%
	Process, plant and machine operatives	24%	17%
	Elementary occupations	40%	26%

## Investigating

The most recent Northern Ireland Annual Survey of Hours and Earnings 2017 report<sup>ix</sup> indicated that average weekly earnings for full-time employees increased by 1.5% from 2016 compared to a 2.2% increase for the UK as a whole. On that basis, and on the assumption that the Office for Budget Responsibility (OBR) UK-wide forecasts as used in these projections may be overly optimistic at a regional (Northern Ireland) level, the 2018 analyses were re-run applying a 1.5% average earnings inflation rate in contrast to the 2.3% OBR-based forecast used. On that basis, the

NLW still accounted for a direct rise of 0.25% (or £47.5m) in the total earnings for employees aged 25 and over, however, average earnings inflation accounted for an increase of 1.4% (or £262 million).

In practice, the lower the level of overall average earnings inflation, the greater (all other things being equal) the relative contribution of the NLW. Under the assumption that average earnings increase by 2.3%, the direct additional financial impact of the NLW will represent around 11% of the total average earnings increase for those aged 25 and over. However, if overall average earnings increase are lower at 1.5%, then the direct additional financial impact of the NLW will represent around 15% of the total average annual earnings increase for those employees aged 25 and over.

With two established years of data and projections of potential impacts, it was possible to begin to sense check estimates of the potential impact of the NLW against the outturn. The 2017 projections based on ASHE 2016 data estimated that in the region of 104,000 people would be impacted by the NLW in April 2017 and estimated the financial impact of that to be in the region of £42.6 million. Examination of the ASHE 2017 data indicated that there were 70,000 people aged 25 and over who were being paid at, or just below, the NLW of £7.50. At face value, this could mean that the previous projection based on the 2016 data had over-estimated the number impacted and this was examined further.

Each year (Table 4) there were around 38,000 people who were paid above the current NLW but below the future projected NLW. In projecting forward, the assumption made was to set and constrain their future hourly earnings rate at the level of the future NLW. However, this group appear from the 2016 analyses to represent a 'bow wave' ahead of the NLW and, rather than their earnings being at the new NLW, push on ahead beyond the new NLW.

**Table 4: Unpacking the Characteristics of Employees Impacted by the 2017 and 2018 National Living Wages in Northern Ireland**

	2016 ASHE data Current NLW of £7.20 future 2017 NLW of £7.50	2017 ASHE data Current NLW of £7.50 future 2018 NLW of £7.83
<b>Number of employees aged 25 and over at current NLW</b>	59,000	64,000
<b>Number of employees aged 25 and over below current NLW</b>	7,000	6,000
<b>Number of employees aged 25 and over above the current NLW but below the future NLW</b>	38,000	38,000
<b>Total number of employees aged 25 and over impacted by the future NLW</b>	104,000	108,000

Some additional exploratory work with the ASHE 2016 and 2017 data was undertaken to see if an additional financial estimate for these employees who push on past the level of the new NLW could be estimated and

the broad approach taken was to treat the 2016 and 2017 ASHE data as though they were panel data with matched cases.

The 2016 annual earnings of the 104,000 people to be affected by the new 2017 NLW was around £1.1 billion. With the 2017 data, the annual earnings of a synthetically matched 104,000 people with the 'new' NLW was £1.16 billion, a difference of £63 million. We know that £42.5 million was calculated as a 'direct' consequence of the uplift to the level of the new NLW to at least meet the statutory requirement, therefore around £20 million of the total difference represents an additional 'hidden' cost.

The financial estimates of direct impact produced with the 2016 data (for the 2017 NLW) and the current 2017 data (for the 2018 NLW) are, on the basis of the above methodology and outcomes, likely to be somewhat of an underestimate of the actual cost. Whilst an additional estimate of 'hidden' impacts of the 2017 NLW are provided here (£20 million), a more nuanced and complete estimate of the financial impact of the NLW would require some significant and additional assumptions to be placed on the data. For example, elsewhere in the pay distribution, it is possible that the statutory requirement to meet the NLW hourly pay rates at the lower end of the pay distribution works to constrain hourly pay increases at higher levels of the pay distribution, could in contrast facilitate pay increases, or could be a composite of both. In addition, future pay growth or pay stagnation will impact on the financial levels of the NLW to be set for 2019 and 2020.

## Conclusions

Meeting the Government's aspiration for the NLW by 2020 of around £9.00 per hour will require the NLW to be raised by around 55 pence per hour in both 2019 and 2020. Whilst the implementation of the first two years of the National Living Wage has, to date, not proven to be hugely controversial, the impacts, both direct and indirect, of the NLW to 2020 and beyond will vary by business type and be subject to decisions made and implemented within an uncertain future economic context. Within this uncertain context, the specific characteristics of both the businesses and employees impacted to date and forecast to be impacted in the future have been well established. A more nuanced and complete estimate of both the direct and indirect impacts of the NLW on the local economy to 2020 and beyond, requiring some significant and additional assumptions, will be completed by the Economic Policy Centre at Ulster University. Irrespective, what is clear to date is the pattern, if not the exact quantum, of the impact of the National Living Wage going forward to 2020.

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*Erratum: The estimate of percentage impact of the NLW on total average annual earnings on page 6 as originally reported (17%) was incorrect and has been corrected to 15% (June 2018).*

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<sup>i</sup> [https://www.economy-ni.gov.uk/sites/default/files/publications/deti/ni\\_ashe\\_2014\\_bulletin-2.pdf](https://www.economy-ni.gov.uk/sites/default/files/publications/deti/ni_ashe_2014_bulletin-2.pdf)

<sup>ii</sup> <http://www.resolutionfoundation.org/wp-content/uploads/2015/07/RF-National-Living-Wage-briefing.pdf>

<sup>iii</sup> <http://resolutionfoundation.org/publications/higher-ground-who-gains-from-the-national-living-wage/>

<sup>iv</sup> <http://www.resolutionfoundation.org/publications/taking-up-the-floor-exploring-the-impact-of-the-national-living-wage-on-employers/>

<sup>v</sup> <http://webarchive.nationalarchives.gov.uk/20160105160709/http://www.ons.gov.uk/ons/rel/regional-trends/london-analysis/estimates-of-employee-jobs-paid-less-than-the-living-wage-in-london-and-other-parts-of-the-uk/index.html>

<sup>vi</sup> <http://visual.ons.gov.uk/how-will-the-national-living-wage-affect-employees-and-businesses-in-the-uk/>

<sup>vii</sup> [https://www.gov.uk/government/uploads/system/uploads/attachment\\_data/file/519773/National\\_Minimum\\_Wage\\_Low\\_Pay\\_Commission\\_Spring\\_2016.pdf](https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/519773/National_Minimum_Wage_Low_Pay_Commission_Spring_2016.pdf)

<sup>viii</sup> <https://www.economy-ni.gov.uk/publications/potential-direct-impact-national-living-wage-northern-ireland-2016-2020>

<sup>ix</sup> <https://www.nisra.gov.uk/statistics/labour-market-and-social-welfare/annual-survey-hours-and-earnings>