

A higher skills ambition for Northern Ireland:

Skills for growth and social inclusion

January 2021

David Southgate, Corin Egglestone & Stephen Evans





This research was commissioned by Open College Network Northern Ireland (OCN NI)

Sirius House, 10 Heron Road, Belfast BT3 9LE

Company registration no. NI050863| Charity registration no. NIC100241



Published by National Learning and Work Institute

4th Floor Arnhem House, 31 Waterloo Way, Leicester LE1 6LP

Company registration no. 2603322 | Charity registration no. 1002775

www.learningandwork.org.uk

@LearnWorkUK

@LearnWorkCymru (Wales)

All rights reserved. No reproduction, copy or transmission of this publication may be made without the written permission of the publishers, save in accordance with the provisions of the Copyright, Designs and Patents Act 1988, or under the terms of any licence permitting limited copying issued by the Copyright Licensing Agency.



About Learning and Work Institute

Learning and Work Institute is an independent policy, research and development organisation dedicated to lifelong learning, full employment and inclusion.

We research what works, develop new ways of thinking and implement new approaches. Working with partners, we transform people's experiences of learning and employment. What we do benefits individuals, families, communities and the wider economy.

Stay informed. Be involved. Keep engaged. Sign up to become a Learning and Work Institute supporter: www.learningandwork.org.uk/supporters

About Open College Network Northern Ireland

The Open College Network Northern Ireland (OCN NI) is a UK recognised Awarding Organisation based in Northern Ireland. We are regulated by CCEA Regulation to develop and award regulated professional and technical (vocational) qualifications from Entry Level up to and including Level 5 across all sector areas. In addition, OCN NI are also regulated by Ofqual to award similar qualifications in England.

We are an educational charity and an Awarding Organisation that advances education by developing nationally recognised qualifications and recognising the achievements of adults and young people. We work with centres such as Further Education Colleges, Private Training Organisations, Voluntary & Community Organisations, Schools, SME's and Public Sector bodies to provide learners with opportunities to progress into further learning and/or employment.

For further information about OCN NI visit: www.ocnni.org.uk



Contents

Foreword	5
Executive summary	6
Introduction	9
1. Why learning and skills matter	11
2. Skills in 2030	20
3. A higher 2030 ambition	31



Foreword

In this ever changing world, particularly as we attempt to overcome the challenges around Covid19, the need to support the upskilling of all our people in Northern Ireland has never been greater. Developing the skills of our people to compete in a global market place, but as importantly, learning to live with each other as we continue to emerge from our past conflict and also, at the same time tackle the increasing economic and social inequality is essential if we want to ensure a better life for all in Northern Ireland. By recognising that learning remains the essential enabler to achieve all of these outcomes at the same time positions skills for growth and social inclusion at the heart of our economic and social debate. Open College Network Northern Ireland (OCN NI) therefore commissioned this research to better understand current levels of learning and skills in Northern Ireland and also to identify gaps with other UK regions and international comparators. Our hope is that Government and our social partners across Northern Ireland within the education, health and community sectors engage with and use this research and evidence to help inform their decision making and thereby ensure a prosperous future for all in Northern Ireland.

OCN NI is a leading Awarding Organisation, working with Further Education Colleges, Schools, Training Organisations, Third Sector Organisations, Health Trusts, Prisons and other education and training organisations. Our offices are based in Belfast and we are regulated to develop professional and technical qualifications from Entry Level up to and including Level 5 across all subject areas. Since OCN NI was established, we have developed economically relevant and learner engaging curricula, which have benefited the lives of over half a million people living in NI.

Our mission is to 'develop and award qualifications which engage, enrich and equip learners for life.' We are an independent, self-financing charitable organisation that has a proven track record of delivering and contributing to the NI skills agenda. As an indigenous Awarding Organisation, our priority is to develop and maintain qualifications tailored to the needs of people living and working in NI. We recognise the life changing power of learning, its contribution to increased employment opportunities, improved productivity, increased income and a reduction in health and social inequality in society. Time and again our partners across the education, health and community sectors, and our learners, have commented on how the impact of achieving OCN NI learning outcomes have overflowed into other parts of their life and helped deliver wider individual, family, social and economic outcomes. Such transformation for learners, by increasing their self-esteem, confidence, improved motivation, changed behaviour and attitudes have benefited them, their families and their community.

OCN NI supports the work of the Northern Ireland Executive, recognising that improving educational outcomes and the skills profile of Northern Ireland are important tools in enhancing the social and economic outcomes of Northern Ireland. Our vision is 'a successful, inclusive society where every learner matters.' Over the coming years OCN NI will continue to support our Government and our social partners to help tackle educational



underachievement, help create a skilled workforce that meet the needs of the NI economy and help redress income inequality. We hope that this research will find a resonance across society and contribute to the debate on how we can achieve a higher ambition for Northern Ireland.

Paul Donaghy

Vice Chair

Open College Network Northern Ireland





Executive summary

Economic growth, social inclusion and community cohesion are intrinsically linked to education and skills. Improved learning outcomes help drive development in these areas. A strong learning culture is therefore essential to modern economies. Economic growth has tended to be weaker in Northern Ireland over the last decade than in the UK as a whole. Northern Ireland has both a significant productivity gap with the UK, and a lower employment rate. Economic and educational inequality endure in Northern Ireland while relative poverty remains a significant issue. Health inequality continues to be a further concern, with life expectancy being lower for the most deprived areas of Northern Ireland.

Coronavirus and the transition to a new trading relationship with the EU will change and add to these economic and social challenges. In this context it is becoming increasingly important to look to viable long-term solutions to promote economic prosperity and social inclusion.

Essential to this is further development of learning and skills in Northern Ireland. This can have both a direct and indirect impact on economic growth while improving social inclusion. Specifically, learning can help to increase employment, improve productivity, grow incomes, support community cohesion, improve wellbeing and reduce health inequalities. These are essential outcomes for ensuring a fair and prosperous Northern Ireland.

Longer term skills development and the fostering of a lifelong learning culture for Northern Ireland should therefore be a key goal for the present decade. Skills development is also essential for Northern Ireland to meet the recommendations within its draft Programme for Government.

As this report shows, the challenge Northern Ireland faces in doing this is significant. Firstly, it has a high proportion of people with no or low qualifications. Secondly, it has a low proportion with high level qualifications such as degree or postgraduate education. This has led to Northern Ireland's present skills picture lagging behind the wider UK, Republic of Ireland and many international comparators. To compound this, job projections suggest that by 2030 there is likely to be a substantial over-supply of labour at lower qualification levels in Northern Ireland.

In 2017, 31% of the working age population had either no qualifications or low qualifications (below level 2). At the same time only 32% had qualifications at level 4 or above. This compares to the UK as a whole having 26% with no or low qualifications and 38% with level 4 or above. The higher prevalence of low or no qualifications and lower proportions with high qualifications represent significant economic and social challenges.

When projected forward to 2030 these educational inequalities with the UK as a whole continue. While Northern Ireland's qualifications profile is improving, our projections suggest that if the present trajectory continues then its 2030 qualifications profile will



remain significantly below that of the UK. By 2030 24.5% of Northern Ireland's working age population will have no or low qualifications. While an improvement from 2017, this would still fall short of the UK's 2030 figure of just 21.0% and is just one percentage point lower than the UK has today. By 2030, 36% of Northern Ireland's adult population is projected to have a level 4 or higher qualification. This is lower than the 43% projected for the UK and still two percentage points lower than the UK had in 2017.

A similar picture emerges when comparing Northern Ireland to the Republic of Ireland and other countries: Northern Ireland has a substantial relative gap at the two ends of the skills distribution – having a lower proportion of people with high qualifications and high proportion with low qualifications.

In 2017 Northern Ireland was around the OECD average for educational attainment. It had a slightly higher proportion of people in the low qualification level (21.4% compared to 21.1%) and a slightly lower proportion in the medium and high qualification levels (41.6% compared to 42.8% and 36.1% compared to 36.5% respectively).

By 2030 however, our projections show Northern Ireland's relative qualification profile will reduce substantially compared to the OECD average. Projecting ISCED data to 2030 suggests that Northern Ireland will have a substantially higher proportion of people with a low qualification level than the OECD average (17.4% compared to 12.8%) and a lower proportion with a high qualification level (44.9% compared to 47.8%). The proportion with medium qualification levels is projected to remain broadly similar, with a figure of 38.6% for Northern Ireland compared to the OECD average of 39.8%.

This means that by 2030 Northern Ireland would have the fourth highest proportion of low qualified people of the 16 OECD countries modelled. At the same time it will be ranked as low as 14th for the proportion of people who are highly qualified. In comparative terms, the Republic of Ireland will be placed joint first for the proportion of people with high qualifications and have the joint lowest proportion with low qualifications. Only Spain, Italy and Sweden will have higher proportions of low-qualified people than Northern Ireland and Italy and Germany will be the only nations with lower proportions of highly qualified people.

Breaking down the skills levels into literacy and numeracy provided further evidence of where Northern Ireland's skill gaps were most concentrated. In 2012, Northern Ireland had (out of 17 OECD comparators) the 5th highest proportion of people with literacy at level 1 or below and 12th highest for level 4 or 5. We project that these rankings will remain unchanged into 2030, but Northern Ireland would experience a slower rate of improvement in literacy compared to the OECD average. We project that the proportion at level 1 will drop by 3.3 percentage points compared to the OECD average drop of 4.4 percentage points. The proportion at level 4 or 5 will increase by 3.0 percentage points compared to the OECD's average of 3.6.

Numeracy could prove more problematic for Northern Ireland. In absolute terms, by 2030 Northern Ireland will have a lower proportion with low literacy levels and higher proportion



with high levels than the same categories for numeracy. In 2030 Northern Ireland is projected to have 2.3 percentage points more than the OECD average at level 1 numeracy or below. At the same time, it will have 3.5 percentage points fewer at level 4 or 5. It would drop from 6th to 5th for the proportion with skills below level 1 while its ranking for level 4 and 5 would remain stable at 12th place.

A higher 2030 ambition

- Build in learning across policy areas. A stronger learning culture supports social inclusion and economic growth but also has broader policy consequences for Northern Ireland such as supporting improvements in health, wellbeing and social cohesion. Thought should be given as to how learning can be built into wider policy areas, and to how Northern Ireland can become a learning society.
- Northern Ireland should set a higher ambition. There is a clear case for a higher ambition to accelerate Northern Ireland's progress in skills development by 2030. The Programme for Government should set out measures to address Northern Ireland's relative skills gap with the UK, Republic of Ireland and OECD comparators. The focus should be on progression from low to intermediate skill levels and supporting the development of higher skills.
- There should be greater investment in learning and skills. Improvements can only be delivered if investment rises. That investment needs to come from a mix of stakeholders including government, employers and individuals, with a clear balance of responsibilities.
- Promote a partnership approach. Collaborative policy development and implementation across a range of stakeholders is crucial for delivering improvements in learning and skills. Partnership working should include government, local authorities, employers, the learning and skills sector and civil society; cross-community and cross-border partnerships are also important.
- Monitor progress. Independent reports should be regularly commissioned to keep track of progress and to monitor Northern Ireland's relative skills development when compared to the wider UK, Republic of Ireland and other international comparators.



Introduction

Along with the rest of the UK, Northern Ireland has seen relatively weak economic growth over the past decade and continued social inclusion challenges. Since the 2008 financial crisis, Northern Ireland's growth rate¹ has been consistently lower than its pre-2008 trend and most parts of the UK; in 2018 it was the only part of the UK to have a negative growth rate. While inequalities are slightly less pronounced in Northern Ireland compared to the rest of the UK, stubborn gaps in education, income, health and wealth remain. The economic consequences of the coronavirus pandemic will only exacerbate these issues, and are likely to disproportionately affect those in low skilled and low paid work. The potential impact of Brexit is not yet fully known, but it is likely to disproportionately affect Northern Ireland, not least because it is the only part of the UK with a direct land border with an EU member state.² With many crossing the border to work and study, the new trading relationship with the EU could have drastic implications for both the economy and skills.

So what should be done to build a prosperous future for Northern Ireland? While not a universal panacea, learning and skills can have both a direct and indirect impact on economic growth, helping to reduce demand for other public services and contributing to social inclusion. Learning can help to increase employment, improve productivity, increase income and reduce health inequalities. The recent OECD skills strategy for Northern Ireland outlines the importance of reducing skills imbalances, creating a culture of lifelong learning, transforming workplaces and business to make better use of skills and strengthening the governance of skills policies.³ The Northern Ireland Executive has recognised that improving educational outcomes and the skills profile of Northern Ireland are important tools in addressing strategic priorities, with a focus upon the social and economic outcomes of Northern Ireland over the coming years.⁴ In direct relevance to the skills profile of Northern Ireland is the stated goal of having more people in better jobs, with skills being recognised as essential in the drive to improve employability and work prospects.⁵

Skills also form a key part of meeting the objectives set out in Northern Ireland's draft Programme for Government. The Programme for Government has an outcomes-based approach, with 14 outcomes supported by 42 'indicators' which are intended to articulate the changes the Executive wants to make. For each indicator an appropriate 'measure'

⁵ Outcomes Delivery Plan. The Executive Office. 2018. Pg 44.



10

¹ Defined as changes to Gross Domestic Product: the total value of goods and services produced in Northern Ireland

² Mac Flynn, P., 'The Economic Implications of BREXIT for Northern Ireland', NEVIN Economic Research Institute, 2016.

³ OCED (2020), OECD Skills Strategy Northern Ireland (United Kingdom): Assessment and Recommendations OECD Skills Studies. OECD Publishing Paris

⁴ Northern Ireland Executive. (2016). Draft Programme for Government Framework 2016-21. Available at: https://www.northernireland.gov.uk/sites/default/consultations/newnigov/draft-pfg-framework-2016-21.pdf

has been selected to allow progress to be tracked. Indicators such as 'improve educational outcomes' (11), 'reduce educational inequality' (12), and 'improve the quality of education' (13) focus on the statutory education phase ('schools') in terms of how they will be measured. Indicator 14 ('improve the skills profile of the population') will be measured by proportions of the workforce qualified to various levels. Responsibility for the implementation of adult learning and skills policies lies with a number of departments. Whether pursuing outcomes such as helping to support a strong and competitive economy, creating a more equal society, helping people to enjoy long, healthy, active lives or creating a place where people want to live, work and invest, learning and skills can and should play an essential part.⁶

However, this report shows that Northern Ireland's skills base is considerably behind the wider UK and many international competitors. Although we project a gradual improvement of Northern Ireland's skills picture over the coming decade, on current trends there will by 2030 still be a substantial skills gap between Northern Ireland, the UK as a whole and other OECD countries. This shortfall is most notable at either end of the educational distribution, with Northern Ireland having a higher proportion of people with low or no qualifications and a lower proportion with the highest qualifications. If Northern Ireland's skills development continues along this present trajectory this will hold back both economic growth and social inclusion.

However, projections are not destiny. A higher ambition for Northern Ireland with a renewed focus on learning and skills could help to promote both prosperity and fairness, making the most of the opportunities ahead. It is time for action for Northern Ireland.

⁶ Northern Ireland Executive. (2016). Draft Programme for Government Framework 2016-21. Available at: https://www.northernireland.gov.uk/sites/default/consultations/newnigov/draft-pfg-framework-2016-21.pdf



11

Why learning and skills matter

Learning and skills play an essential role in driving economic growth and promoting social inclusion, with the need for Northern Ireland to improve its skill levels and foster a wider learning engaged outlook being a critical component of its ability to improve social and economic outcomes.⁷ This chapter explores the issues facing Northern Ireland in these areas, and how learning and skills can help to address them.

Economic growth

Economic growth is essential to improving living standards and ensuring there is adequate money for public services and provision. There are three main factors that are key in driving economic growth:

- Productivity. The amount that each worker produces;
- Employment. The number of people in work and the hours they work; and
- Population. How fast the population is growing because of natural demographic change and net migration.

The 2008 financial crisis had a profound effect on the UK's trend rate of growth. Prior to the 2008 recession, the economy grew by around 2.5% per year. Post-2008 it is estimated that this has reduced to 1.5% to 1.7% per year. Since the 2008 recession, Northern Ireland has tended to have a worse growth rate than the UK as a whole. Between 2009 and 2018, Northern Ireland had a lower rate of growth for seven out of the 10 years, and in 2018 was the only part of the UK to experience a negative growth rate.⁸ Both the drastic economic hit of the coronavirus pandemic and the potential economic effects of Brexit only underscore the importance of a focus on levelling-up the growth rate.

Productivity

As for growth, so for productivity. UK productivity dropped sharply following the 2008 financial crisis and did not recover to its pre-downturn peak until the third quarter of 2016. Due to this slowdown, output per hour at the end of 2018 was 18.3% lower than if it had continued at its pre-2008 trend.⁹ Due to issues relating to its employment structure and sectoral productivity, productivity levels in Northern Ireland have consistency lagged behind the UK for the past few decades.¹⁰ Data from the Office for National Statistics shows that in 2017 Northern Ireland had the lowest productivity per hour of any part of the UK, 17% below the overall UK average.¹¹

¹¹ Regional and sub-regional productivity in the UK: February 2019



⁷ Healthy, Wealthy and Wise: The impact of adult learning across the UK. Report of the Northern Ireland Impact Forum, 2017. Learning and Work Institute

⁸ Regional economic activity by gross domestic product, UK: 1998 to 2018, ONS

⁹ Labour productivity, UK: October to December 2018

¹⁰ Johnston & Stewart, Understanding productivity in Northern Ireland, Ulster University, 2019

There are clear and proven links between skills at all levels and productivity. Across the UK as a whole, estimates suggest that around one fifth of growth over recent decades has been due to increases in skill levels; this has largely been due to increases in the proportion of workers with high qualification levels. Evidence shows that most types and levels of skills can have a positive impact on productivity, although their interaction can vary by sector. 4

Skills-based increases in productivity require both a supply of required skills and their effective utilisation by employers. The UK government's Industrial Strategy identifies five key foundations of productivity growth, all of which are impacted by learning and skills:¹⁵

- Ideas. The ability to generate and implement new ideas, innovations, technologies and approaches is essential for productivity growth. There is a positive link between the number of high skilled workers in a country or area and both the generation of new ideas and the ability of firms to 'convert' new ideas into higher output and productivity. Minimum skills levels amongst a workforce are also required for the adoption of certain new approaches or technologies, such as digital skills for new computer technology.
- **People**. Whilst the extent to which an increased supply of skills leads to increased productivity depends on the other foundations of productivity, the productivity benefits of improvements in skills are demonstrated by the wage returns to different qualifications. Although highly dependent on the type of qualification, institution and demographics, qualifications at level 2 have been estimated to gain returns of between 1% and 14%, level 3 returns of between 10% and 20% and level 4 and above of around 20%. Temployers also benefit from increases in their worker's skill levels, whether through spill over benefits for other workers' productivity or through a combination of skills and capital investments. Temployers also
- Infrastructure. A modern economy requires a good infrastructure of transport connections, energy, housing and information technology, including broadband. A good skills base is essential for both building, maintaining and effectively utilising such infrastructure. For example, large scale construction projects require a mixture of highly skilled and specialist roles, in addition to the skills required for a wide range of supporting roles. Businesses cannot use such infrastructure unless their workforce meets minimum skill requirements, such as digital skills for information technology.

¹⁸ Human capital spillovers: the importance of training, O'Mahoney and Riley, 2012.



¹² UK skills and productivity in an international context, BIS, 2015

¹³ The relationship between graduates and economic performance across countries, Holland et al, BIS, 2013

¹⁴ UK skills and productivity in an international context, BIS, 2015.

¹⁵ Industrial strategy: the five foundations, BEIS, 2017.

¹⁶ Workforce skills at all levels boost innovation and productivity: evidence briefing, ESRC, 2018.

¹⁷ Skills and poverty: building an anti-poverty skills system, Learning and Work Institute, 2016.

- Business environment. A good skills base can help to attract foreign investment to an area, which in turn can have spill over effects on the productivity of local firms.¹⁹ Although limited, there is some evidence that enterprise skills such as creativity, innovation, flexibility, resilience and specific business-related skills (such as accounting, management and leadership) can help to increase both the number of new businesses started and their likelihood of succeeding.²⁰ These areas are particularly important for Northern Ireland, including given its current reliance on public sector employment.²¹
- Places. Disparities in learning and skills between and within regions contributes to inequalities in economic performance. Both through improving learning and skills directly, and through the resulting spill over effects of a skilled workforce, cutting inequalities in learning and skills between different parts of Northern Ireland can contribute to cutting disparities in productivity and incomes.

Employment

Prior to the impact of coronavirus, Northern Ireland's employment rate was 72.4%.²² Although a record, this rate was still below the equivalent figure of 75.4% for the UK as a whole. International comparisons (see Figure 1) show Northern Ireland to be middle ranking in relation to other OECD countries in terms of its employment rate.

If Northern Ireland had had the same employment rate as the UK in this period, more than 35,000 additional people would be in work. Matching the top rate of the Netherlands (78.3%), would have meant over 69,000 additional workers.

There is a clear link between qualification level and employment in Northern Ireland. Prior to the pandemic, only 8% of (working age) Northern Ireland residents with qualifications at level 4 or above were not employed, compared to 36% of those with qualifications below level 3.²³

The effects of the coronavirus pandemic and the potential impacts of Brexit have brought the importance of measures to increase employment into an even clearer focus. The pandemic has caused a sharp rise in the number of people claiming unemployment-related benefits in Northern Ireland,²⁴ with the long-term effects of this economic shock likely to hit those working in sectors with the lowest skill levels.²⁵ Learning and skills

²⁵ Coronavirus and the labour market: impacts and challenges, L&W, 2020



¹⁹ FDI and the labour market: a review of the evidence and policy implications, Driffield and Taylor, Oxford Review of Economic Policy, 2000.

²⁰ Enterprise education impact in higher education and further education, BIS, 2013. 18

²¹ Healthy, Wealthy and Wise: The impact of adult learning across the UK. Report of the Northern Ireland Impact Forum, 2017. Learning and Work Institute

²² Labour market statistics, ONS, 2019

²³ Northern Ireland Skills Barometer Summary report, Ulster University, 2019. Pg24.

²⁴ Claimant Count, NISRA, 2020

provision can thus play a vital role in retraining people for jobs in different sectors and supporting them back into work.

While the specific effects of Brexit are not yet fully known it is likely to disproportionately affect Northern Ireland, not least because it is the only part of the UK with a direct land border with an EU member state. As a result, many of Northern Ireland's industries, such as manufacturing and the service sector, are disproportionately reliant upon trade with the EU and specifically the Republic of Ireland. This has potential implications for employment and the wider economy. For example, the retail sector employs the largest proportion of workers in Northern Ireland but is particularly reliant upon EU trade. With many crossing the border to work, the nature of the UK's new trading relationship with the EU may have significant implications for employment and the wider economy.

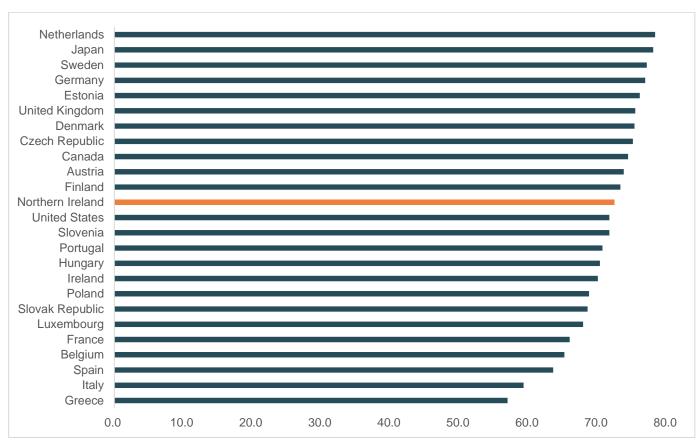


Figure 1: International employment rate comparisons

Source: OECD & ONS

Economic inactivity is also a particular issue in Northern Ireland. For over 30 years Northern Ireland has had the highest inactivity rate of any part of the UK, with figures to April 2020 showing its rate to be over six percentage points higher than the UK average

²⁸ Ibid. pg16.



²⁶ Mac Flynn, P., 'The Economic Implications of BREXIT for Northern Ireland', NEVIN Economic Research Institute, 2016.

²⁷ Ibid

(26.7% compared to 20.5%). Economic inactivity is particularly prevalent amongst 50-64-year olds, with women accounting for three-fifths of inactive individuals. Long term sickness and disability is the most common reason for inactivity in Northern Ireland, but it also has a higher incidence of inactivity due to caring for a family, studying and retirement than the UK as a whole.^{29,30} Decades of social and political conflict in Northern Ireland, and its ongoing impact on physical and mental health, may also have contributed to higher levels of economic inactivity.

There are three main ways that learning, and skills can help to improve employment:

Essential skills: There are a range of essential skills required for most jobs, including literacy, numeracy, team working and digital skills. Although low skill levels are rarely the sole reason for why people are not in work, there are significant employment gains for people who have these essential skills.³¹ Due to global economic change the minimum level and breadth of essential skills required for work continues to increase.

Specific skills: Specific skills and qualifications are required for some jobs, such as a food hygiene certificate or driving licence. Again, these will change over time because of changes in policy (for example, licensing requirements for some roles) and the economy (for example, changes in consumer preferences or the introduction of new technologies).

Technical and higher-level skills: Developing a mixture of sector or occupational specific technical skills with advanced transferable skills (such as problem solving, team working and communication) can help individuals to progress within the world of work.

Social inclusion

In addition to economic growth, learning and skills are increasingly important in addressing social inclusion issues. Social inclusion issues describe inequalities within and between groups, which are often influenced by background or demographics. This report considers social inclusion on three dimensions:

- Inequality. Differences in income and wealth across society;
- Social mobility. Differences in an individual's chances of achieving a higher income by parental background and income, as well as their chances of progressing from low income during adulthood; and
- Inclusive communities. Differences in other outcomes, such as health and wellbeing, civic participation and community engagement.

Although there is likely to be interaction between these different dimensions of social inclusion, there is not necessarily a direct relationship between each; for example, some

³¹ Skills and poverty: building an anti-poverty skills system, Learning and Work Institute, 2016.



16

²⁹ Economic inactivity in Northern Ireland, NISRA, 2019

³⁰ Labour market in the regions of the UK: June 2020

countries with lower income inequality also have lower social mobility.³² However, learning and skills can help to address each of these dimensions in various ways.

Inequality

Across the UK, income inequality rose significantly during the 1980s and has since remained relatively stable.³³ However, income inequality in Northern Ireland is lower than the UK average. The Gini coefficient (an index of income inequality where 0 indicates complete equality and 1 indicates complete inequality) consistently shows Northern Ireland to be several points lower (i.e. more equal) than the UK as a whole; in 2017/18 Northern Ireland had a coefficient of 0.26, compared to 0.34 for the UK as a whole.³⁴

Relative poverty is most commonly measured by the proportion of people with disposable income less than 60% of the UK median. On this measure, almost one in five (19%) residents of Northern Ireland live in relative poverty. This is slightly higher than the UK average, but falls around the middle of the distribution of different parts of the UK. One in ten people in Northern Ireland live in persistent poverty, defined as being in relative poverty for three out of the previous four years. Again, this is slightly higher than the UK average, but towards the middle of different areas of the UK. 35,36 The UK as a whole has lower rates of persistent poverty than most EU countries, partly due to increased income volatility. 37

One definition of absolute poverty is having income below 60% of the 2010-11 median income. Before housing costs, 16% of Northern Ireland residents are estimated to live in absolute poverty. This represents 21% of children, 12% of retired adults and 16% of those of a working age.³⁸

Across the UK, the top 10% of individuals hold 50% of total wealth.³⁹ Wealth inequality in Northern Ireland is lower than the UK as a whole, although it remains a significant issue. It is estimated that 45% of Northern Ireland households have no savings,⁴⁰ which may limit their ability to adapt to change and risk increasing insecurity.

There are three main ways that learning and skills can affect inequality:

⁴⁰ Economic inequality in Northern Ireland, Nicva, 2016.



17

³² OECD (2018), A Broken Social Elevator? How to Promote Social Mobility, OECD Publishing, Paris

³³ Living standards, inequality and poverty spreadsheet, IFS, 2018.

³⁴ Households Below Average Income: Northern Ireland 2017/18. Department for Communities. 2019. https://www.communities-ni.gov.uk/system/files/publications/communities/hbai-2017-18.pdf

³⁵ Poverty, Department for Communities, 2020.

³⁶ Poverty in the UK: statistics, House of Commons Library, 2020

³⁷ Persistent poverty in the UK and EU: 2017, ONS, 2019

³⁸ Poverty, Department for Communities, 2020.

³⁹ The challenge of measuring UK wealth inequality in the 2000s, Alvaredo, Atkinson and Morelli, Fiscal Studies, 2016.

- 1. **Income**. By boosting economic growth in a way that benefits those with lower incomes, enhancing their employment and earnings prospects;
- 2. **Expenditure**. By helping those with lower incomes to gain better deals, for example on utilities, so reducing their cost of living; and
- 3. **Savings**. By increasing incomes and supporting people to save, helping those with lower incomes to increase savings or reduce debt.

In addition to economic inequality, there is also substantial educational inequality in Northern Ireland. Almost one in three (30%) young people leave school without at least five GCSE qualifications at grades A*-C (including English and maths),⁴¹ with working class Protestant males the worst performing demographic group.^{42,43} These educational inequalities may be exacerbated by the fact that Northern Ireland spends less per pupil on education than any other part of the UK. In 2019, an average of £5,500 was spent per head: £300 less than Wales, £500 less than England and a full £1,100 less than Scotland.⁴⁴ Spending has also reduced at a faster rate, although this in part stems from relative increases in pupil numbers.⁴⁵ This current inequality is likely to have a knock-on impact on future skills trajectories.

More positively, in recent decades there has been a narrowing of historical differences in labour market outcomes between members of the Catholic and Protestant communities. A recent report commissioned by the Northern Ireland Executive Office⁴⁶ shows that the gap in unemployment rates between Catholics and Protestants has narrowed from 9% in 1992 (with respective rates of 18% and 9%) to zero in 2017 (with a rate of 4% for each community).⁴⁷ The proportion of economically active individuals with no qualifications is also now similar between the two communities, with a figure of 11% for Catholics and 12% for Protestants.⁴⁸

Taken together, these findings show that inequalities do exist but can be addressed. Learning and skills can play a vital role in helping to tackle both economic and educational inequality, boosting both economic growth and social inclusion. There is a risk that the coronavirus crisis could exacerbate existing inequalities still further.

⁴⁸ Ibid, pg4.



⁴¹ Northern Ireland Skills Barometer: summary report, Ulster University & Economic Policy Centre, 2019

⁴² Education inequalities in Northern Ireland: summary report, Queen's University Belfast, 2015

⁴³ Educational underachievement in Northern Ireland: evidence summary, Centre for Research in Educational Underachievement, 2020

⁴⁴ IFS, 2019 annual report on education spending in England, Institute for Fiscal Studies, 2019.

⁴⁵ Ibid.

⁴⁶ The Labour Force Survey Religion Report 2017, The Executive Office, 2017, pg9.

⁴⁷ Ibid. pa4.

Social mobility

Social mobility measures the extent to which an individual's chances in life depend on their talent and effort or their background. This can be measured through both intergenerational social mobility – the extent to which parental background affects children's life chances – and intragenerational social mobility – the extent to which an individual's income and occupation can change during their working life. It is estimated that across the UK approximately half of an individual's income can be explained by that of their parents, which is higher than many international comparators. Much of this is due to the stronger relationship between a child's educational outcomes and that of their parents than in many countries.⁴⁹ There are also concerns about intergenerational mobility in the UK as a whole, with evidence that permanently escaping low pay (rather than temporarily increasing income) is achieved by very few low paid workers.⁵⁰

Learning and skills can strongly influence each aspect of social mobility, particularly in relation to determining income. Learning and skills can help to break this link, increasing both intergenerational and intragenerational social mobility. An individual has an increased chance of increasing their income if they start their working life with higher qualifications or gain them during their life; low levels of adult learning can thus hold back improvements to social mobility.

Inclusive communities

Although life expectancy has risen substantially over previous decades, there are large inequalities between different groups. In 2019 the life expectancy of men living in Northern Ireland's most deprived areas was 74.2 years, 7.1 years less than those living in the least deprived areas (81.3 years). The equivalent gap for women is a smaller but still substantial 4.5 years (79.6 compared to 84.1 years).⁵¹ Although large, these gaps are smaller than the equivalent English figures (2016 to 2018) of 9.5 and 7.5 years respectively.⁵²

Continued increases in life expectancy are good news. However, an aging population can bring long-term public spending pressures in relation to health and social care and pensions. The Centre for Economic Empowerment and Nicva calculate that, all else remaining equal, improvements to life expectancy could increase Northern Ireland's budget deficit by 13 percentage points between 2015 and 2045. However, the authors note that much of this cost could be offset through improvements in health and wellbeing.⁵³

Longer life expectancy increases the importance of financial capability skills; across the UK as many as four in ten individuals have problems with money management and only a

⁵³ The fiscal implications of an older population in Northern Ireland, Centre for Economic Empowerment & Nicva, 2016.



⁴⁹ OECD (2016), A family affair: intergenerational mobility across OECD countries.

⁵⁰ The great escape? Low pay and progression in the UK's labour market, Social Mobility Commission, 2017.

⁵¹ Health inequalities – life expectancy decomposition 2019, Northern Ireland Executive, 2019.

⁵² Health state life expectancies by national deprivation deciles, England: 2016 to 2018, ONS, 2020.

quarter have a savings buffer of at least three months' income.⁵⁴ A lack of digital skills can also contribute to missing out on the best deals for services which are often online, and which (along with factors such as higher cost-credit and pre-payment meters) contributes to an estimated £490 'poverty premium' per year.⁵⁵

In addition, increased civic participation and social capital are key for inclusive communities; whether this be through volunteering, voting or participating in local community organisations.

Learning and skills can substantially support inclusive communities. For example, health and wellbeing can be improved through providing information on healthy living and behaviours, and through enabling people to live more healthily through increased incomes. Improved learning opportunities throughout the life cycle have been highlighted as necessary components in the fight against the economic, social and health related challenges Northern Ireland faces in the coming years. There is also a case for increased social prescribing of adult education and community activities to promote health and wellbeing. Improved financial capability skills can help people to improve their money management and increase their savings, with higher levels of financial capability associated with improved life satisfaction, higher rates of saving and higher income of around £120 per month. Improved digital skills can help individuals to access deals and services, and participating in learning and skills in general is associated with greater civic participation and increased social capital.

Summary

The evidence is clear that a focus on adult learning and skills is essential for Northern Ireland. While not a universal panacea, skills can help to increase economic growth by raising productivity and employment and thus increase living standards and the resources available for public services. They can also help to tackle issues of social inclusion by reducing inequality, helping people to adapt to the digital revolution, supporting health, wellbeing and community engagement and bringing people together across social divides.

Taken collectively, the evidence makes a clear case for investment in learning and skills to benefit society, achieve wider public policy objectives, and to reduce pressures on other public service budgets. Learning and skills can help mitigate the impact of the coronavirus crisis, build community cohesion, and ensure Northern Ireland can master future opportunities to build a prosperous and fair society.

⁵⁸ The long-term impacts of financial capability: evidence from the BHPS, CfEB, 2011.



⁵⁴ Financial capability in the UK, Money Advice Service, 2015.

⁵⁵ The poverty premium: when low income households pay more for essential goods and services, University of Bristol, 2016.

⁵⁶ Healthy, Wealthy and Wise: The impact of adult learning across the UK. Report of the Northern Ireland Impact Forum, 2017. Learning and Work Institute.

⁵⁷ Learning, work and health: the next 70 years, Learning and Work Institute, 2018.

Skills in 2030

There are many ways to gain learning, skills and capabilities. Qualifications are a common measure, though (like all measures) imperfect and incomplete. This report focuses primarily upon qualifications and measures of literacy and numeracy as these are the most widely available and comparable. However, this is not to the exclusion of other forms of learning.

Learning and skill levels differ across the UK. While regional variations are common, there are clear differences between the wider UK and Northern Ireland. This section explores current differences in qualification levels between these two areas and projects how their skills profiles will change by 2030. International comparisons are provided to further this analysis and to give wider context to the skills development of Northern Ireland over the current decade.

2030 skills projections methodology

NI and UK projections. Projections for Northern Ireland and the UK's qualifications profiles were based on Labour Force Survey (LFS) data on highest qualification by age. Data for 2017 were used as a baseline. Those who would be over state pension age in 2030 were removed. Young people entering the labour force were assumed to have the same qualification levels as young people today; a reasonable assumption given the stability in their qualification attainment by in recent years. Estimates of upskilling among adults were based on differences seen in qualification profiles of each age group over time (i.e. 25-29 year olds in 2008 compared to 35-39 year olds in 2018). These qualification profiles for each age group were then applied to the ONS's midyear population projections for the size of each age group in 2030.

International qualification projections. International Standard Classification of Education (ISCED) data for 25-64 year olds were used. These classify qualifications by level by country, though differences in education systems by country make this challenging. It was assumed that rates of change for 2007-17 for low, intermediate and high qualifications for each country would continue until 2030. A ceiling of 60% with high qualifications and floor of 5% with low qualifications was set for each country to reflect potential natural limits to improvements in qualification attainment. The same process was followed using rates of change during 2012-17 as sensitivity analysis, but made little difference. This gives an indicative picture but does not take account of potential policy and demographic change by country. For the UK, ISCED data was used as a baseline and the rates of change calculated for each relevant age group in the UK projections applied to these. As ISCED data is not available for Northern Ireland, UK ISCED data was used to approximate Northern Ireland data based on the difference between their LFS skills profiles.

Literacy, numeracy and problem solving. Data from the 2012 Programme for the International Assessment of Adult Competencies (PIAAC) survey were applied forward to 2030, based on UN projections for population change by country by age group.



Caution needs to be applied to these results due to differences in methodology between surveys, but they give indicative results and a picture of trends.

Northern Ireland and UK skills profiles

Figure 2 shows Northern Ireland's current skills profile and its projected 2030 profile. In 2017, 16% of the working age population in Northern Ireland had no qualifications and 14% had qualifications below level 2. Only 32% had qualifications at level 4 or above.

Our projections indicate that the trajectory of qualification levels from now until 2030 is varied. Northern Ireland's skills picture is projected to improve by 2030, with a higher proportion of people in the highest educational levels and a lower proportion in the lowest. However, we project that by 2030 a quarter of the population (25%) will still have low (below level 2) or no qualifications, and only 36% will have qualifications at level 4 or above.

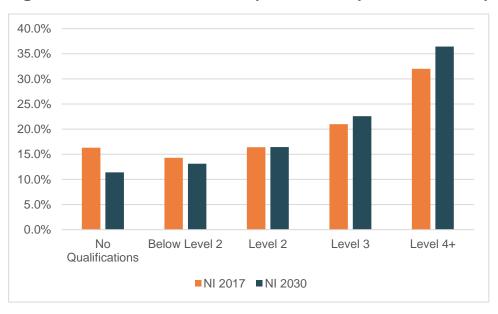


Figure 2: Northern Ireland 2017 qualifications profile and 2030 projections

Figure 3 compares the current qualification profiles of Northern Ireland and the UK and their projected 2030 profiles. Whilst mid-range qualification levels are similar, it is at either end of the distribution that the real story of Northern Ireland's skills deficit is revealed.

In 2017, if you took an average group of 100 people from Northern Ireland then 16 of them would have no qualifications; in contrast, the figure for the wider UK would be just eight. This means that from the baseline of 2017 Northern Ireland already has a significant skills gap at lower levels, with double the proportion of people with no qualifications. A similar issue is found at the other end of the scale; 32% of Northern Ireland's working age population had qualifications at level 4 and above in 2017, compared to 38% of the UK population.



While our projections suggest that the qualification profile of Northern Ireland will improve by 2030, these skills gaps at both lower and higher levels continue. Although our projections show a 4.9 percentage point reduction in the proportion of the working age population with no qualifications and a 4.4 percentage point increase in the proportion with qualifications at level 4 and above, there remains a substantial difference between the UK and Northern Ireland. Indeed, we project that by 2030 Northern Ireland will still have a higher proportion of its working age population with no qualifications and a lower proportion with qualifications at level 4 and above than the UK did back in 2017. Although when no and low qualifications are combined together (no qualifications and below level 2) Northern Ireland's 2030 profile is 1 percentage point lower than the UK's 2017 levels, due largely to the UK's high prevalence of below level 2 qualifications. Overall, this means that, based upon present projections, Northern Ireland's qualification profile in 2030 will in a number of ways remain behind that of the UK today.

Since the UK's skills profile is also projected to improve by 2030, the gap between the proportion of people in Northern Ireland and the UK with the highest qualification levels (level 4 and above) is projected to remain almost identical (6.4 percentage points in 2017 compared to 6.3 percentage points in 2030). At the lower end of the qualification profile the gap does however narrow slightly. In 2017 the UK's combined low and no qualification level was a full 5.1 percentage points lower than Northern Ireland's equivalent figure, but by 2030 this gap is projected to narrow with the UK being just 3.5 percentage points lower.

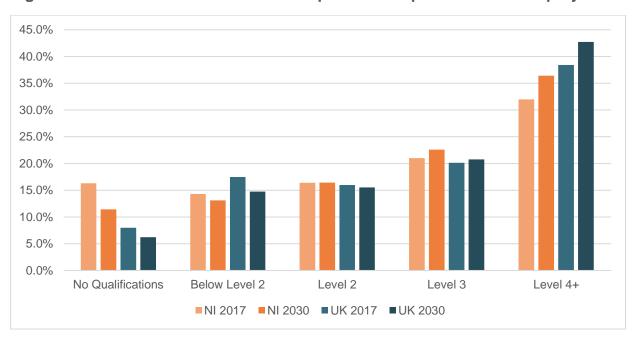


Figure 3: Northern Ireland and UK 2017 qualification profiles and 2030 projections



International comparisons

The previous section described Northern Ireland's lower average qualification levels compared to the UK. This section compares Northern Ireland to a range of OECD countries, with similar results. Both the issues of higher levels of low qualifications and lower levels of high qualifications are also present in relation to international comparators.

Two data sources were used for these comparisons. Firstly, International Standard Classification of Education (ISCED) data provided the broader comparison of overall indicative international skills profiles. Secondly, the Survey of Adult Skills (PIAAC) was used to explore learning attainment at a more specific level in relation to numeracy and literacy.

Indicative international skills profiles

Figures 4 and 5 show indicative international qualification profiles for Northern Ireland and a selection of comparator countries based on the ISCED data. Figure 4 shows current profiles (based on 2017 data) and Figure 5 shows 2030 projections for each.

The 2017 data shows Northern Ireland to be broadly in line with the OECD average for educational attainment, with a slightly higher proportion of people having low qualifications (21.4% compared to 21.1%) and a slightly lower proportion in the medium and high qualification levels (41.6% compared to 42.8% and 36.1% compared to 36.5% respectively).

However, our 2030 projections predict that Northern Ireland's relative qualification profile will worsen when compared to the OECD average. Northern Ireland is projected to have a substantially higher proportion of people with a low qualification level than the OECD average by 2030 (17.4% compared to 12.8%) and a lower proportion with a high skill level (44.9% compared to 47.8%). The proportion with medium qualification levels is projected to remain broadly similar, with a figure of 38.6% for Northern Ireland compared to the OECD average of 39.8%.

Northern Ireland will therefore have a comparatively higher proportion of low skilled workers by 2030 and a lower proportion of highly skilled workers than many OECD comparators.



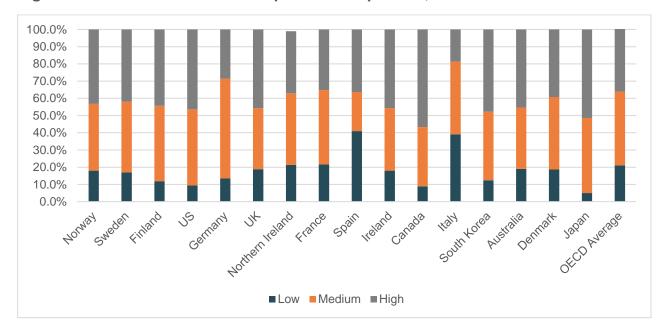
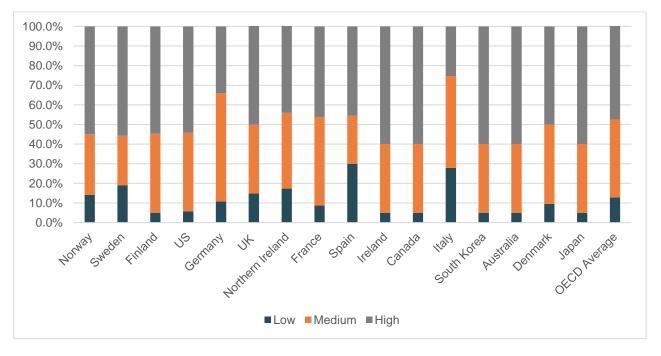


Figure 4: Indicative international qualification profiles, 2017



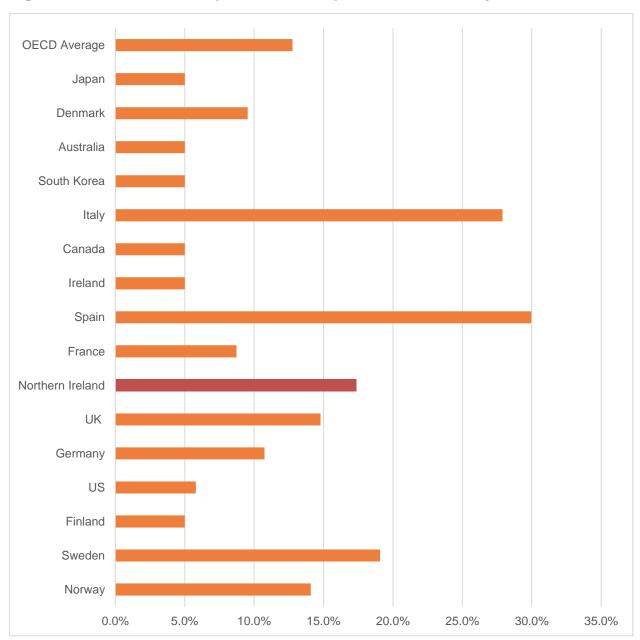


To illustrate this difference more clearly, Figures 6 and 7 separately isolate the projected 2030 results for low qualification and high qualification levels respectively. Out of the 16 comparators, we project Northern Ireland to rank 14th for the proportion of its population who will be highly qualified in 2030, having been ranked 13th in 2017. At the same time, its increased prevalence of low qualifications means it would have the fourth highest proportion of people qualified to this level, the same position it held in 2017. This two-pronged combination of both low qualifications and the lack of high-end qualifications



demonstrates the lingering effects of the relative skills gap which Northern Ireland currently exhibits.

Figure 6: International comparison of low qualification levels by 2030





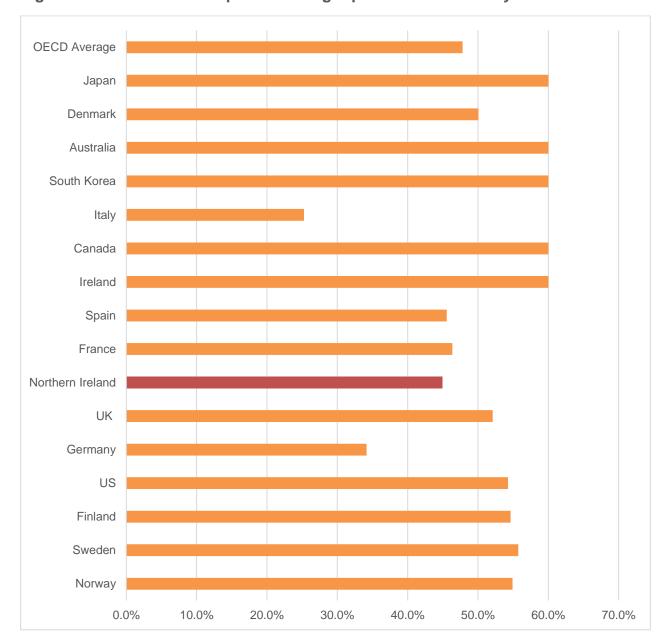


Figure 7: International comparison of high qualification levels by 2030

Literacy and numeracy profiles

To further explore Northern Ireland's skills profile against international comparators, it is useful to examine how the skills projections apply in terms of specific learning areas. This report therefore breaks down the skills picture into numeracy and literacy within the OECD's survey of adult skills (PIAAC), which includes adults aged 25 to 64. Given differences in the survey over time, this data should be taken as supplementary and indicative as the main international focus is upon the broader ISCED data (described in the previous section), but it still provides useful supplementary nuance to the projections.

Figures 8 and 9 outline the literacy results for Northern Ireland and OECD comparators. Results show Northern Ireland's current literacy profile (based on 2012 data) to be similar



to the OECD average overall, albeit with slightly lower proportions at higher literacy levels (34.8% compared to 35.8% at level 3 and 9.9% compared to 10.9% at level 4 or 5). However, projections to 2030 suggest a slower rate of improvement for Northern Ireland compared to the OECD average. We project that the proportion at level 1 or below will drop by 3.3 percentage points compared to the OECD average of 4.4, and the proportion at level 4 or 5 will increase by 3.0 percentage points compared to 3.6. This suggests that literacy levels in Northern Ireland will continue to improve by 2030 but will be in a relatively worse position against international comparators in percentage terms. However, we don't project any change in Northern Ireland's literacy rankings. In 2012, Northern Ireland ranked (out of 17 OECD comparators) 5th for the proportion of people with literacy at level 1 or below and 12th for level 4 or 5; we project this to be unchanged by 2030.

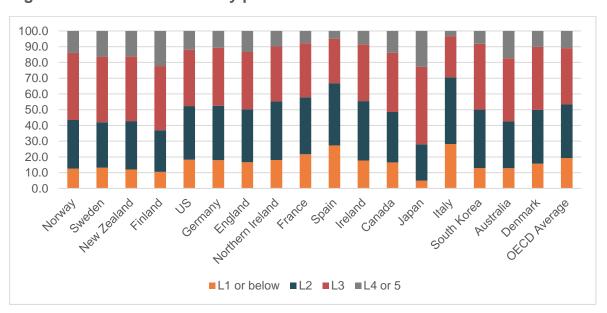


Figure 8: International literacy profile 2012



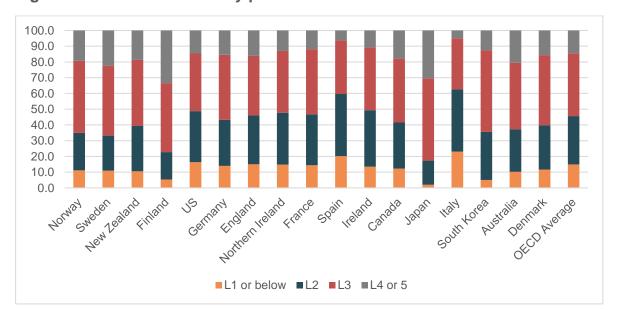


Figure 9: International literacy profile 2030

Figures 10 and 11 show the equivalent results for numeracy. These results show a substantial gap in Northern Ireland's numeracy levels relative to international comparators. The current profile (based on 2012 data) shows the proportion of people with qualifications at level 1 or below is 2.2 percentage points higher in Northern Ireland than the OECD average (25.3% compared to 23.1%) and the proportion with level 4 or 5 skills to be 2.8 percentage points lower (8.6% compared to 11.4%).

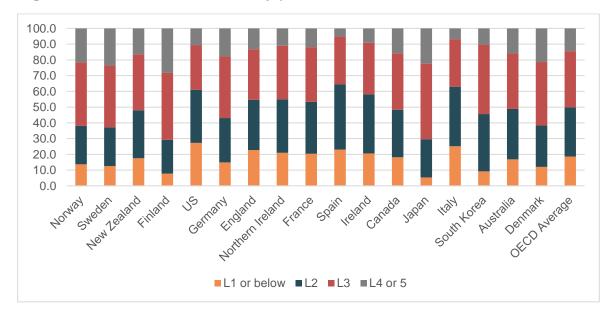
As with literacy, projections to 2030 suggest a slightly slower rate of improvement for Northern Ireland compared to the OECD average. Although the proportion at level 1 or below is projected to fall by a similar amount (4.3 percentage points compared to 4.4 percentage points respectively), the proportion at levels 4 and 5 is projected to increase by 2.3 percentage points compared to 3.0 percentage points. In 2030 Northern Ireland is projected to be 2.3 percentage points higher than the OECD average for level 1 or below but be 3.5 percentage points lower for level 4 or 5. This would mean Northern Ireland worsening from the 6th highest (out of 17 countries modelled) proportion of people with numeracy skills below level one to the 5th highest, and remaining 12th for the proportion of people with level 4 and 5 skills. This highlights the importance of investment in specific skills, namely numeracy, in order to improve Northern Ireland's skills shortfall.



100.0 90.0 80.0 70.0 60.0 50.0 40.0 30.0 20.0 10.0 0.0 **Hofflern Heldrid** OKCO WASCOS Hewledand south tored Germany Dennant Canada AUSTROLIO sheder *finland* FICTICE Weldind JOPOR SPOIN ■L1 or below ■L2 ■L3 ■L4 or 5

Figure 10: International numeracy profile 2012





Skills barometer

Northern Ireland's Department for the Economy produces its own projections through a partnership with Ulster University. These projections were last conducted in 2019 and project forward to 2028.⁵⁹ The projections focus upon the growth in job sectors and use a high growth scenario to assess the required skills by 2028 and the gap between projected skills required for industry and the real time skills development of Northern Ireland. The major identified gap in Northern Ireland's future requirements is in terms of degree level



⁵⁹ Northern Ireland Skills Barometer Summary report, Ulster University, 2019.

education. While at present around 23% of employees have a degree level qualification, the barometer assessed that by 2028 33% of available jobs would require one.⁶⁰ Concordantly, those with qualifications at level 2 or below⁶¹ would face increasingly restricted labour market access, with only 10% of positions open to their skill level.

While the metrics used in the skills barometer differ slightly from our own projections, they reinforce the issues highlighted in our own analysis. Taken as a whole our own projections suggest that by 2030 40.9% of Northern Ireland's population will have qualifications at level 2 or below. While not directly comparable, these figures indicate that by 2030 there are likely to be far more people looking for jobs requiring low qualification levels than there would be jobs available under this scenario, meaning the economy would have to adjust in other ways.

Analysis summary

Northern Ireland's qualification profile starts behind the UK as a whole and many international comparators. It is projected to improve over the next decade. However, other countries are improving too and from a higher base. The result is that Northern Ireland is on track to remain far behind the qualification profiles of many other countries. This shortfall is most notable at either end of the educational distribution, with Northern Ireland having a higher proportion of people with low or no qualifications and a lower proportion of those with the highest. By 2030 we project Northern Ireland to remain with the fourth highest proportion of people with low qualification levels (out of 16 OECD comparators), and to drop from 13th to 14th position for high skill levels. A comparison with job projections also suggests that by 2030 there is likely to be a substantial over-supply of labour at lower qualification levels.

The case for a higher ambition is clear: it is essential for improving economic growth, promoting social inclusion, and ensuring a prosperous and fair future.

⁶¹ Based on National Qualification Framework levels.



31

⁶⁰ Northern Ireland Skills Barometer Summary report, Ulster University, 2019. Pg11.

A higher 2030 ambition

- 1. **Build in learning across policy areas**. Evidence is clear that learning and skills can bring benefits to a wide range of public policy goals. In addition to economic growth and improving social inclusion, learning can have a positive impact on areas such as health and wellbeing and social cohesion. This is particularly important given the need to recover from the impact of the coronavirus pandemic, and to manage the transition to a new trading relationship with the EU and make the most of future economic, demographic and social changes. Greater access to learning can help Northern Ireland to promote greater equality and improve health and wellbeing. Thought should be given as to how learning can be built into these wider policy areas, and to how Northern Ireland can become a learning society⁶².
- 2. Northern Ireland should set a higher ambition. There is a clear case for a higher ambition to accelerate Northern Ireland's progress in skills development by 2030. A higher ambition should be an integral part of the Programme for Government and could include an aim to narrow its existing gap with the UK and increase its position on the international rankings. A focus on low and medium level qualifications is particularly important, and can act as a pathway to higher level qualifications.
- There should be greater investment in learning and skills. Improvements can
 only be delivered if investment rises. That investment needs to come from a mix of
 stakeholders including government, employers and individuals, with a clear balance
 of responsibilities.
- 4. Promote a partnership approach. Improvements in learning and skills can only be delivered through a partnership between government, local authorities, employers, the learning and skills sector and civic society; cross-community and cross-border partnerships are also important. A collaborative and partnership approach to policy design, investment strategies and delivery is therefore crucial.
- 5. **Monitor progress**. To keep track of progress, regular or annual reports should be produced to monitor how Northern Ireland's qualification and skills profile compares with the UK as a whole, the Republic of Ireland and other international comparators. Ideally, such reports should be independently commissioned and published.

⁶² Healthy, Wealthy and Wise: The impact of adult learning across the UK. Report of the Northern Ireland Impact Forum, 2017. Learning and Work Institute



32