



Self-efficacy, Locus of Control & Life Satisfaction in Northern Ireland, 2018/19

30 October 2019

Further information and copies in alternative formats can be obtained by contacting:

TEO PfG Analytics
Castle Buildings
Stormont Estate
Belfast BT4 3SR
pfganalytics@executiveoffice-ni.gov.uk

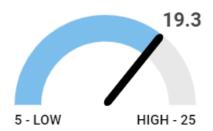
Contents

Summary of Self-efficacy, Locus of Control and Life Satisfaction estimates in Northern Ireland, 2018/19	3
Key findings	4
Background	6
Self-efficacy	7
Estimated mean score among adults (16+) in Northern Ireland8	
Estimated proportion of adults (16+) in Northern Ireland with low self-efficacy11	
Estimated proportion of adults aged 60 and over in Northern Ireland with low self-efficacy14	
Locus of control	17
Life satisfaction	20
Annex A: Technical notes	23

Summary of Self-efficacy, Locus of Control and Life Satisfaction estimates in Northern Ireland, 2018/19

Self-efficacy - a person's beliefs about their capability to produce results or effects.

Self-efficacy is used as a way of measuring the confidence of people in Northern Ireland. This report considers three estimates for selfefficacy, two of which are population indicators.



The mean self-efficacy score for individuals aged 16 and over was 19.3



19.2% of individuals aged 16 and over had low self-efficacy

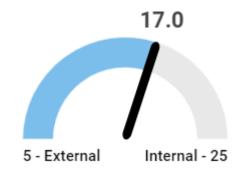
Indicator 28 – Confidence (as measured by self-efficacy)



21.5% of individuals aged 60 and over had low self-efficacy

Indicator 49 – Confidence of the population aged 60 years or older (as measured by self-efficacy)

Locus of control – the degree to which a person feels they have control over their life. A low score indicates a belief that life is determined by outside factors (external). A high score shows a belief in one's own control (internal). This report considers one estimate for locus of control.



The mean locus of control score for individuals aged 16 and over was **17.0**

Life satisfaction - a person's satisfaction with their life overall. This report considers one estimate for life satisfaction.



The **mean life satisfaction score** for individuals aged 16 and over was **7.8**

Key findings

Estimates at Northern Ireland level

Self-efficacy

- At 19.3, the 2018/19 estimate for mean score is not significantly different to previous years.
- At 19.2%, the 2018/19 estimate for proportion of population with low self-efficacy is not significantly different to 2017/18, but is significantly smaller than in 2014/15, 2015/16 and 2016/17.
- At **21.5**%, the 2018/19 estimate for proportion of individuals aged 60 and over with low self-efficacy is not significantly different to 2017/18, but is significantly smaller than in 2014/15, 2015/16 and 2016/17.

Locus of control

• At 17.0, the 2018/19 estimate for mean score represents a significant increase from 2017/18.

Life satisfaction

• At **7.8**, the 2018/19 estimate for mean score represents a significant decrease from 2017/18.

For all five metrics, statistically significant differences were found within the following seven breakdowns: age, deprivation quintile, employment status, health, disability, marital status and local government district.

Notably, the largest proportions of people with low self-efficacy (both among the population aged 16+ and among those aged 60 and over) were found among people reporting bad / very bad health and this group also had the lowest mean scores for self-efficacy, locus of control and life satisfaction.

Breakdown among various sections of the population – comparison across the mean scores

Across various population groups included in the analysis, some are among those with the **highest** mean scores across all three metrics. In contrast, other groups are among those with the **lowest** mean scores in all three metrics (Figure A).

Despite these instances of overlap, it is not possible to combine the three metrics which must be treated as separate constructs¹. There are multiple instances where they do not align, for example:

- Those whose religion is other/non-determined (as opposed to either Catholic or Protestant) have high (i.e. internal) locus of control and high self-efficacy, but have relatively low life satisfaction.
- Those aged 16-24 have high (i.e. internal) locus of control and high life satisfaction but have relatively low self-efficacy.
- Those aged 65+ have high life satisfaction but low (i.e. external) locus of control and relatively low self-efficacy.

¹ Further background detail can be found in Annex A.

Figure A: Groups which had either high or low mean scores on all three metrics

High self-efficacy Internal locus of control High life satisfaction	Low self-efficacy External locus of control Low life satisfaction
Reporting very good/good health	Reporting very bad/bad health Reporting fair health
Without a limiting long-standing illness	With a limiting long- standing illness
Living in the least deprived areas	Living in the most deprived areas
Employed	
	Widowed
Aged 25-34	Aged 55-64

Background

What are self-efficacy, locus of control and life satisfaction?

- Self-efficacy is a person's beliefs about their capability to produce results or effects, to complete tasks and achieve goals.
- Locus of control is a person's belief about where control over their life is located. It is about whether someone feels the events of their life are beyond their control, influenced by outside factors, or whether they feel the power to influence events in their life sits with them.
- Life satisfaction is an individual's sense of contentment with their life overall.

How is data from this report used?

This report was produced to inform two of the 49 draft Programme for Government indicators. These 49 population indicators are used to assess Northern Ireland's progress towards a framework of 12 Outcomes. The Outcomes were agreed by the former Executive and form a framework for the draft Programme for Government and the Northern Ireland Civil Service Outcomes Delivery Plan².

Where is the data from?

The data in this report are collected using responses to the Continuous Household Survey (CHS). This survey data uses a systematic random sample of Northern Ireland households. Individuals from these households are asked to respond to a variety of questions and statements. Questions on self-efficacy, locus of control and life satisfaction have been included since 2014/15.

What breakdowns are available?

As well as estimating figures at the Northern Ireland level, estimates have been made based on the following breakdowns: Gender, Age, Deprivation, Employment, Religion, Urban / Rural, Health, Disability (limiting long-standing illness), Dependants, Marital status, Local Government District, Sexual orientation, Ethnicity.

Is there uncertainty about the results? What is a 'significant' difference?

This report compares 2018/19 figures with previous years and also explores whether differences exist across various sections of society in Northern Ireland, for example between males and females. The results are estimates, based on a sample. When a difference or change is described as 'significant', this means we are 95% confident that there is an actual difference at population level. Where we cannot be confident (at the 95% level) of an actual difference or change, the result is not considered to be statistically significant.

How can I provide feedback on this report?

We are interested in understanding more about the quality of this publication and how it is used. This will help us provide a high quality service which meets users' needs. We would be grateful if you could spend a couple of minutes answering our User Feedback Survey questions. This can be accessed at the link below.

https://consultations.nidirect.gov.uk/nisra-pfg-analytics/40492ed8/

Further background detail can be found in Annex A.

² Programme for Government / Outcomes Delivery Plan: https://www.executiveoffice-ni.gov.uk/topics/making-government-utcomes-delivery-plan

Self-efficacy

What is self-efficacy?

Self-efficacy is a concept describing a person's beliefs about their capability to produce results or effects, their ability to exercise influence over events that affect their lives³.

- Those with high self-efficacy have confidence in their abilities and produce sustained efforts to achieve goals.
- Those with **low** self-efficacy often doubt their capabilities, are less ambitious and give up on their aims when challenged.

Self-efficacy affects the decisions a person makes and what they see as achievable. Low self-efficacy or a lack of belief in one's own abilities can limit the choices a person makes and limit the effort they are willing to put in. Self-efficacy has been shown to influence physical and mental health⁴, learning and achievement, career and job satisfaction⁵ and family relations⁶. Interventions to increase self-efficacy in specific groups can improve collective resilience and capacity. This can lead to positive social change in communities, and can improve social cohesion and inter-group relations⁷.

How is self-efficacy measured?

Self-efficacy is measured using responses to five statements. Individuals indicate to what extent they agree or disagree with these using a five point Likert scale. Self-efficacy is then presented as an overall score, ranging from 5 to 25, with a higher score representing higher self-efficacy. For the purposes of this report, a score from 5 to 17 has been classified as low and a score from 18 to 25 represents high self-efficacy. More information on the five self-efficacy statements is available in Annex A.

The self-efficacy scores taken from responses to these statement have used to estimate three measures of self-efficacy, two of which are used as Northern Ireland population indicators:

- Mean score for self-efficacy among adults (16+)
- Proportion of adults (16+) with low self-efficacy
 Indicator 28 Confidence (as measured by self-efficacy)
- Proportion of people aged 60 and over with low self-efficacy
 Indicator 49 Confidence of the population aged 60 years or older (as measured by self-efficacy)

³ Bandura, A. (1994). Self-efficacy. In V. S. Ramachaudran (Ed.), Encyclopedia of human behavior (Vol. 4, pp. 71-81). New York: Academic Press. (Reprinted in H. Friedman [Ed.], Encyclopedia of mental health. San Diego: Academic Press, 1998).

⁴ Bandura, A. (1997). *Self-efficacy: The exercise of control.* New York: Freeman and Company.

⁵ Bandura, A., Barbaranelli, C., Capara, G.V., & Pastorelli, C. (2001). *Self-efficacy beliefs as shapers of children's aspirations and career trajectories*. Child Development, 72, 187-206.

⁶ Bandura, A., Barbaranelli, C., Capara, G.V., Regalia, C. & Scabini, E. (2011). *Impact of family efficacy beliefs on quality of family functioning and satisfaction with family life*. Applied Psychology. 60(3), 421-448.

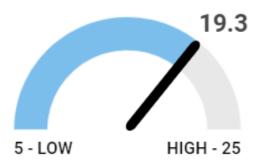
⁷ McNamara, N. Stevenson, C. & Muldoon, O.T. (2013). *Community identity as resource and context: A mixed method investigation of coping and collective action in a disadvantaged community.* European Journal of Social Psychology.

Self-efficacy

Estimated mean score among adults (16+) in Northern Ireland

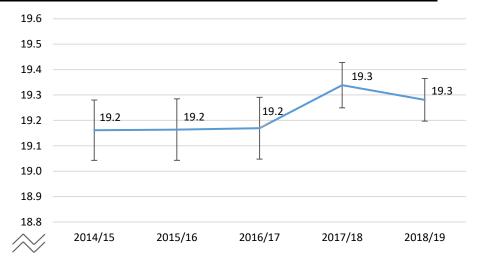
In 2018/19, the estimated mean self-efficacy score for individuals aged 16 and over in Northern Ireland was **19.3**. Based on the scale (which ranges from 5 to 25), this suggests on average people in Northern Ireland tend towards high rather than low self-efficacy (Figure 1.1).

Figure 1.1: NI mean self-efficacy score, 2018/19



At **19.3**, the 2018/19 estimated mean self-efficacy score among adults (16+) in Northern Ireland was not significantly different to previous years (Figure 1.2).

Figure 1.2: Estimated mean self-efficacy scores, 2014/15 to 2018/19



Note: Figure 1.2 includes the (unrounded) 95% confidence intervals for each estimate. These confidence intervals represent the ranges either side of the CHS proportions which are 95% certain to include the true values for the population. For example, we can be 95% certain that the true NI population mean for 2018/19 falls between 19.2 and 19.4 on the self-efficacy scale (see <u>Annex A</u> for more information).

Breakdown among various sections of Northern Ireland's population

When mean self-efficacy scores were estimated for different breakdowns of the population, for example comparing males with females, there were significant differences in 10 categories (Figure 1.3). Notably both the highest and lowest estimates across all groups were found within the breakdown for health. Those reporting very good/good health had a mean score of 20.0 while those reporting bad/very bad health had a mean score of 16.0.

Figure 1.3: Self-efficacy – differences among sections of Northern Ireland's population (16+) in 2018/198

Based on a scale from 5 to 25 (low to high belief or confidence in one's own abilities) Estimated mean self-efficacy score for -

Northern Ireland: 19.3

M	Gender	Males had a significantly higher score than females.	Males: 19.5 Females: 19.0
††	Age	There were significant differences between several age groups. 35-44 year olds and 55-64 year olds had the highest and lowest scores respectively.	16-24 year olds: 19.1 25-34 year olds: 19.6 35-44 year olds: 19.7 45-54 year olds: 19.3 55-64 year olds: 18.8 65+ year olds: 19.0
	Deprivation quintiles	People living in the least deprived areas (Q5), as well as those living in Q2, Q3 and Q4, all had significantly higher scores than those living in the most deprived areas, Q1.	Q1 (most deprived): 18.7 Q2: 19.1 Q3: 19.3 Q4: 19.6 Q5 (least deprived): 19.7
	Employment	People who were employed had a significantly higher score than those who were economically inactive.	Employed: 19.9 Inactive: 18.4
0000	Religion	Those who were other/non-determined had a significantly higher score than Protestants and Catholics.	Catholics: 19.2 Protestants: 19.3 Other: 19.7
%	Health	There were significant differences between those reporting very good/good health, fair health and bad/very bad health.	Very good/good: 20.0 Fair: 18.5 Bad/very bad: 16.0
+%	Disability (LLSI)	People who were not living with a limiting long- standing illness had a significantly higher score than those who were.	With LLSI: 17.6 Without LLSI: 19.9
•	Dependants	Individuals who were responsible for one or more dependants had a significantly higher score than those who were not responsible for a dependant.	With dependants: 19.6 Without dependants: 19.0
9	Marital status	Individuals who were married and living with their spouse had a significantly higher score than each of the other marital groups where estimates could be reported.	Single: 19.1 Married: 19.6 Separated: 18.7 Divorced: 18.4 Widowed: 18.7

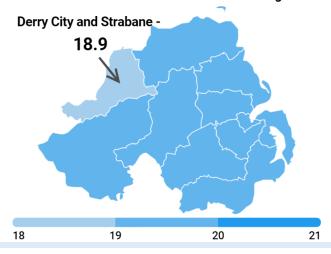
⁸ This table does not include all available estimates. Note that the Urban/Rural, Sexual orientation and Ethnicity breakdowns are omitted as there were no statistically significant differences. To compare all available estimates and confidence intervals, please refer to the tables accompanying this report. Estimates are suppressed where fewer than 100 people were sampled.



LGD

The score for Derry City and Strabane (18.9) was significantly lower than the Northern Ireland average (19.3).

Any other differences, between individual Local Government Districts and/or against Northern Ireland as a whole, were not significant.



Self-efficacy

Estimated proportion of adults (16+) in Northern Ireland with low self-efficacy

In 2018/19, an estimated **19.2**% of individuals aged 16 and over in Northern Ireland, approximately one-fifth, had low self-efficacy (Figure 2.1).

At **19.2%**, the proportion of adults (16+) with low self-efficacy in 2018/19 is significantly smaller than in 2014/15, 2015/16 and 2016/17. It is not significantly different to 2017/18 (Figure 2.2).

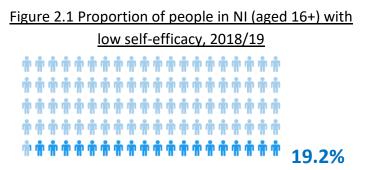
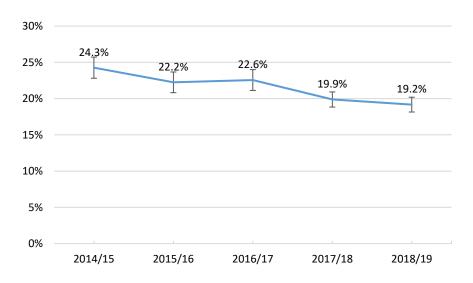


Figure 2.2: Proportion of people in NI (aged 16+) with low self-efficacy, 2014/15 to 2018/19



Note: Figure 2.2 includes the (unrounded) 95% confidence intervals for each estimate. These confidence intervals represent the ranges either side of the CHS proportions which are 95% certain to include the true values for the population. For example, we can be 95% certain that in 2018/19 the true proportion of the NI population aged 16 and over with low self-efficacy falls between 18.1% and 20.2% (see <u>Annex A</u> for more information).

Draft Programme for Government and the Outcomes Delivery Plan – Outcomes Framework

The percentage of the Northern Ireland population with low self-efficacy is used as a population indicator in the draft PfG Outcomes Framework as a way of measuring the **Confidence** of people (16+) in Northern Ireland. This indicator is used to measure progress towards two outcomes:

- Outcome 5: We are an innovative, creative society, where people can fulfil their potential
- Outcome 9: We are a shared, welcoming and confident society that respects diversity

Latest position: The estimated 19.2% of people with low self-efficacy in 2018/19 represents a significant decrease against the 2014/15 baseline figure of 24.3%.

The latest position in relation to all population indicators is available at this link.

Breakdown among various sections of Northern Ireland's population

When the proportion of adults with low self-efficacy was estimated for different breakdowns of the population, there were significant differences in 11 categories (Figure 2.3)⁹. Notably both the largest and smallest estimates across all groups were in the breakdown for health. Among those reporting bad/very bad health more than 50% had low self-efficacy, while among those reporting very good/good health the proportion with low self-efficacy was 12.2%.

Figure 2.3: Low self-efficacy – differences among sections of Northern Ireland's population (16+) in 2018/19

Based on estimated proportions of people scoring at the lower end (5-17) of the selfefficacy scale (i.e. those with low belief or confidence in their own abilities).

Estimated proportion with low self-efficacy for – Northern Ireland: 19.2%

22	Gender	The proportion of females with low self-efficacy was significantly larger than that for males.	Males: 16.8% Females: 21.4%
**	Age	There were significant differences between several age groups. The smallest and largest proportions of people with low self-efficacy were found amongst 35-44 year olds and 55-64 year olds respectively.	16-24 year olds: 21.6% 25-34 year olds: 17.7% 35-44 year olds: 13.4% 45-54 year olds: 20.1% 55-64 year olds: 23.0% 65+ year olds: 20.7%
	Deprivation quintiles	The proportion of people living in the most deprived areas (Q1) with low self-efficacy was significantly larger than among those living in the least deprived areas (Q5).	Q1 (most deprived): 26.1% Q2: 21.6% Q3: 17.5% Q4: 15.5% Q5 (least deprived): 15.3%
	Employment	Over a quarter of economically inactive people had low self-efficacy. This is a significantly larger proportion than that of employed people.	Employed: 13.2 % Inactive: 27.6 %
0000	Religion	The proportion of people with low self-efficacy was significantly larger among Catholics than among Protestants and those who were other/non-determined.	Catholics: 20.7 % Protestants: 18.4 % Other: 17.2 %
	Urban / Rural	The proportion of individuals with low self-efficacy was significantly larger among people in urban areas than those in rural areas.	Urban: 20.4% Rural: 17.2%
*	Health	Over half of those reporting bad/very bad health had low self-efficacy. The differences between all three health categories were significant.	Very good/good: 12.2% Fair: 27.9% Bad/very bad: 51.8%
+%	Disability (LLSI)	The proportion of individuals with low self-efficacy was significantly larger among people who were living with a limiting long-standing illness.	With LLSI: 36.8% Without LLSI: 12.6%

⁹ This table does not include all available estimates. Note that the Sexual orientation and Ethnicity breakdowns are omitted as there were no statistically significant differences. To compare all available estimates and confidence intervals, please refer to the tables accompanying this report. Estimates are suppressed where fewer than 100 people were sampled.



Dependants

There was a significantly larger proportion of people with low self-efficacy among those who were not responsible for dependants than among those who were.

With dependants: 15.5% Without dependants: 21.9%



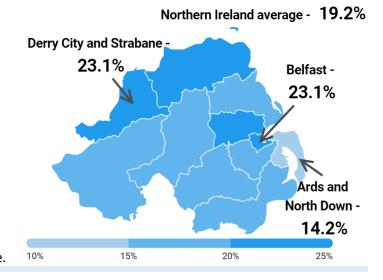
Marital status

There was a significantly smaller proportion of people with low self-efficacy among those who were married and living with their spouse than among each of the other marital groups where estimates could be reported. Single: **21.9%**Married: **14.8%**Separated: **24.5%**Divorced: **29.0%**Widowed: **26.3%**



LGD

Both Belfast (23.1%) and Derry City and Strabane (23.1%) had significantly larger proportions of people with low self-efficacy than Northern Ireland as a whole (19.2%). Only Ards and North Down (14.2%) had a significantly smaller proportion of individuals with low self-efficacy than the Northern Ireland figure.



Self-efficacy

Estimated proportion of adults aged 60 and over in Northern Ireland with low self-efficacy

In 2018/19, an estimated **21.5%** of individuals aged 60 and over in Northern Ireland had low self-efficacy (Figure 3.1).

At **21.5%**, the proportion of individuals aged 60 and over with low self-efficacy in 2018/19 is significantly smaller than in 2014/15, 2015/16 and 2016/17. It is not significantly different to 2017/18 (Figure 3.2).

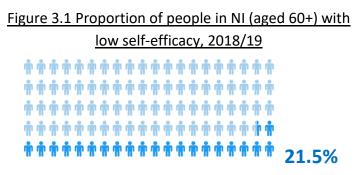
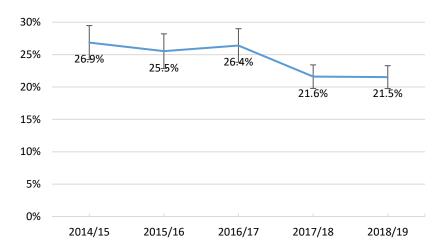


Figure 3.2: Proportion of people in NI (aged 60+) with low self-efficacy, 2014/15 to 2018/19



Note: Figure 3.2 includes the (unrounded) 95% confidence intervals for each estimate. These confidence intervals represent the ranges either side of the CHS proportions which are 95% certain to include the true values for the population. For example, we can be 95% certain that in 2018/19 the true proportion of the NI population aged 60 and over with low self-efficacy falls between 19.8% and 23.3% (see Annex A for more information).

Draft Programme for Government and the Outcomes Delivery Plan – Outcomes Framework

The percentage of individuals aged 60 and over in Northern Ireland with low self-efficacy is used as a population indicator in the draft PfG Outcomes Framework: **Confidence of the population aged 60 years or older.** This indicator is used to measure progress towards two outcomes:

- Outcome 4: We enjoy long, healthy, active lives
- Outcome 8: We care for others and we help those in need

Latest position: The estimated 21.5% of individuals aged 60 and over with low self-efficacy in 2018/19 represents a significant decrease against the 2014/15 baseline figure of 26.9%.

The latest position in relation to all population indicators is available at this link.

Breakdown among various sections of Northern Ireland's population

When the proportion of adults (60+) with low self-efficacy was estimated for different breakdowns of the population, there were significant differences in 8 categories (Figure 3.3). Similarly to figures for all adults, both the largest and smallest proportions of low self-efficacy in any subcategory were found when the population (aged 60+) was broken down by health. Among those reporting bad/very bad health the proportion with low self-efficacy was 46.3%, while among those reporting very good/good health 11.6% had low self-efficacy.

<u>Figure 3.3: Low self-efficacy among those aged 60 and over – differences among sections of Northern Ireland's population (60+) in 2018/19¹⁰</u>

Based on estimated proportions of people scoring at the lower end (5-17) of the self-efficacy scale (i.e. those with low belief or confidence in their own abilities).

Estimated proportion with low self-efficacy (aged 60+) for – Northern Ireland: **21.5%**

2.2	Gender	The proportion of females (60+) with low self-efficacy was significantly larger than that for males.	Males: 18.9% Females: 24.0%
**	Age	There were significant differences between several age groups. The smallest and largest proportions of people (60+) with low self-efficacy were found amongst 70-74 year olds and those aged 80 and over respectively.	60-64 year olds: 23.7 % 65-69 year olds: 20.1 % 70-74 year olds: 17.7 % 75-79 year olds: 21.4 % 80+ year olds: 24.7 %
	Deprivation quintiles	The proportion of people (60+) with low self-efficacy in the most deprived areas (Q1) was significantly larger than the proportion with low self-efficacy in the least deprived quintiles.	Q1 (most deprived): 28.4%
	Employment	The proportion of economically inactive people (60+) with low self-efficacy was significantly larger than for employed people ¹¹ .	Employed: 14.4 % Inactive: 23.3 %
*	Health	Almost half of those reporting bad/very bad health had low self-efficacy. The differences between all three health categories were significant.	Very good/good: 11.6% Fair: 26.1% Bad/very bad: 46.3%
+%	Disability (LLSI)	The proportion of people (60+) with low self- efficacy was significantly larger among those with a limiting long-standing illness than those without.	With LLSI: 31.9% Without LLSI: 13.5%
0	Marital status	There was a significantly smaller proportion of people with low self-efficacy among people (60+) who were married and living with their spouse than for each of the other marital groups where estimates could be reported.	Single: 25.7 % Married: 17.7 % Divorced: 26.3 % Widowed: 25.7 %

15

¹⁰ This table does not include all available estimates. Note that the Religion, Dependants and Urban / Rural breakdowns are omitted as there were no statistically significant differences. To compare all available estimates and confidence intervals, please refer to the tables accompanying this report. Estimates are suppressed where fewer than 100 people were sampled.

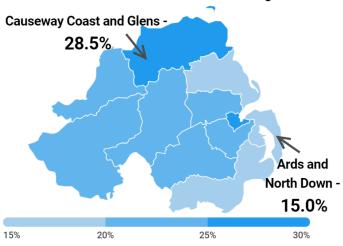
¹¹ Note that the breakdown for 'economically inactive' includes retired people.

Northern Ireland average - 21.5%



LGD

The largest proportion of people with low self-efficacy (60+) was found in Causeway Coast and Glens (28.5%) and the smallest in Ards and North Down (15.0%). Only these two Local Government Districts were significantly different to the proportion for Northern Ireland (21.5%).



Locus of control

What is locus of control?

Locus of control is a construct which explains the degree to which a person feels they have control over their life¹². It refers to where someone feels the control over their life is located and ranges from 'external' to 'internal'.

- Those with external locus of control feel events are influenced by outside factors, making it beyond an individual's control to shape the events of their life.
- Those with internal locus of control believe in their own influence over life events and are confident that their actions can have direct effects on their life outcomes. They tend to tackle problems confidently, persevere and improve on their tasks¹³.

How is locus of control measured?

Locus of control is measured using responses to five statements. Individuals indicate to what extent they agree or disagree with these statements using a five point Likert scale.

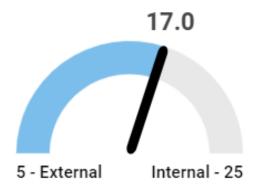
It is important to note that while locus of control is scored from 5 to 25, it is unlike self-efficacy in that the scores are not seen as high or low, but are on a continuum where 5 indicates external locus of control and 25 indicates internal locus of control. More information on the five locus of control statements is available in Annex A.

Estimated mean score for locus of control among adults (16+) in Northern Ireland

The estimated mean locus of control score for those aged 16 and over in Northern Ireland was **17.0** out of a possible 25 in 2018/19. This suggests on average people in Northern Ireland tend towards a more internal than external locus of control.

At **17.0**, the estimated mean locus of control score for 2018/19 represents a significant increase compared with 2015/16, 2016/17 and 2017/18 (all 16.9) (Figure 4.2).

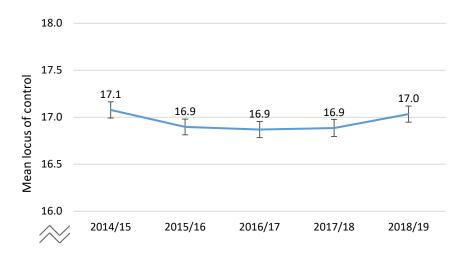
Figure 4.1: NI mean locus of control score, 2018/19



¹² Rotter, J. B. (1954). Social learning and clinical psychology, Englewood Cliffs, NJ: Prentice Hall.

¹³Rotter, J. B. (1990). *Internal versus external control of reinforcement: A case history of a variable.* American psychologist, 45(4), 489.

Figure 4.2: Mean locus of control scores for the NI population (aged 16 and over), 2014/15 to 2018/19



Note: Figure 4.2 includes the (unrounded) 95% confidence intervals for each estimate. These confidence intervals represent the ranges either side of the CHS means which are 95% certain to include the true values for the population. For example, we can be 95% certain that the true mean locus of control score of the NI population in 2018/19 falls between 16.9 and 17.1 (see Annex A for more information).

Breakdown among various sections of Northern Ireland's population

Based on a scale from 5 (external LOC i.e. feeling

When the mean score for locus of control among adults (16+) was estimated for different breakdowns of the population, there were significant differences in 10 categories (Figure 4.3). The lowest score, indicative of the most external locus of control, was found among people reporting bad/very bad health (15.5). While those with very good/good health did have a higher (more internal) score, the highest (or most internal) score for locus of control was found among those living in the areas of least deprivation (17.6), and among those whose religion was other/non-determined (rather than either Catholic or Protestant)(17.6).

Figure 4.3: Locus of control – differences among sections of Northern Ireland's population (16+) in 2018/19¹⁴

Estimated mean locus of control score for -

	•	life) to 25 (internal	Northern Ireland: 17.0
	Gender	Males scored significantly higher than females, indicating a more internal locus of control.	Males: 17.2 Females: 16.7
**	Age	The higher scores, indicating a more internal locus of control, were found among younger age groups. 16-24, 25-34 and 35-44 year olds all scored significantly higher than those aged 55-64 and 65 and above.	16-24 year olds: 17.3 25-34 year olds: 17.3 35-44 year olds: 17.4 45-54 year olds: 17.0 55-64 year olds: 16.6 65 and over: 16.6
Ö	Deprivation quintiles	People living in the least deprived areas (Q5) had a significantly higher (i.e. more internal) score than those living in all other quintiles. This difference was most pronounced between Q1 (most deprived) and Q5.	Q1 (most deprived): 16.5 Q2: 16.9 Q3: 17.0 Q4: 17.2 Q5 (least deprived): 17.6

¹⁴ This table does not include all available estimates. Note that the Urban / Rural breakdown is omitted as there were no statistically significant differences. To compare all available estimates and confidence intervals, please refer to the tables accompanying this report. Estimates are suppressed where fewer than 100 people were sampled.

	Employment	People who were employed (i.e. more internal) score economically inactive.	Employed: 17.4 Inactive: 16.5	
0000	Religion	Those who were other/non-determined had a significantly higher (i.e. more internal) score than Protestants and Catholics.		Catholics: 16.8 Protestants: 17.0 Other: 17.6
W	Health	There were significant differences between those reporting very good/good health, fair health and bad/very bad health.		Very good/good: 17.4 Fair: 16.5 Bad/very bad: 15.5
+%	Disability (LLSI)	People who were not livi standing illness had a signi internal) score than those w	ficantly higher (i.e. more	With LLSI: 16.2 Without LLSI: 17.3
•	Dependants	dependants had a signific	ndividuals who were responsible for one or more dependants had a significantly higher (i.e. more nternal) score than those who were not responsible Wor a dependant.	
0	Marital status	Individuals who were either single or married and living with their spouse had significantly higher (i.e. more internal) scores than each of the other marital groups where estimates could be reported.		Single: 17.1 Married: 17.1 Separated: 16.8 Divorced: 16.8 Widowed: 16.4
	LGD	The highest, or most internal, score was in Antrim and Newtownabbey (17.4). The lowest, or most external, scores were in Derry City and Strabane (16.5) and Fermanagh and Omagh (16.6). These three Local Government Districts had scores which were significantly different to the Northern Ireland average (17.0).	Derry City and Strabane - 16.5 Fermanagh and Omagh - 16.6	Antrim and Newtownabbey - 17.4

Life satisfaction

What is life satisfaction?

Life satisfaction relates to an individual's satisfaction with their life overall. Personal or subjective well-being – of which life satisfaction is a measure – has been shown to influence health and longevity¹⁵. Life satisfaction is one of four measures currently being used by the Office for National Statistics (ONS) to explore and measure national well-being¹⁶.

How is life satisfaction measured?

Life satisfaction is measured using responses to one question: "Overall, how satisfied are you with life nowadays?" The scores are presented on a scale from 0 to 10, where 0 is 'not at all' and 10 is 'completely'. Higher scores on the life satisfaction scale indicate a greater sense of contentment with life.

Estimated mean life satisfaction among adults (16+) in Northern Ireland

The estimated mean life satisfaction score for those aged 16 and over in Northern Ireland was **7.8** out of a possible 10 in 2018/19.

At **7.8**, the estimated mean life satisfaction score for 2018/19 represents a statistically significant decrease from 2017/18 (7.9) but is not significantly different to the three previous years; 2014/15, 2015/16 and 2016/17 (all 7.8) (Figure 5.2).

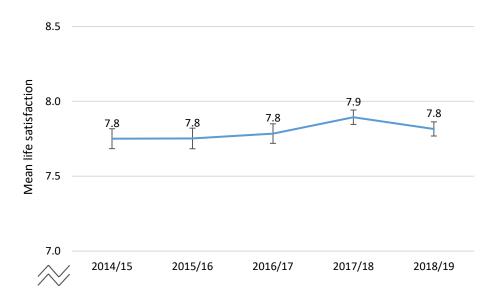
Figure 5.1: NI mean life satisfaction score, 2018/19



¹⁵ Diener, E. & Chad, M (2011) *Happy People Live Longer: Subjective Well-Being Contributes to Health and Longevity* Applied Psychology: Health and Well-Being, 3 (1), 1–43

¹⁶ See: ONS, Personal well-being estimates,

Figure 5.2: Mean life satisfaction scores for the NI population (aged 16 and over), 2014/15 to 2018/19



Note: Figure 5.2 includes the (unrounded) 95% confidence intervals for each estimate. These confidence intervals represent the ranges either side of the CHS means which are 95% certain to include the true values for the population. For example, we can be 95% certain that the mean life satisfaction score of the NI population in 2018/19 falls between 7.8 and 7.9 (see <u>Annex A</u> for more information).

Breakdown among various sections of Northern Ireland's population (16+)

When the mean scores for life satisfaction among adults (16+) were estimated for different breakdowns of the population, there were some significant differences in almost all categories (Figure 5.3). Similar to the estimates for self-efficacy, the highest and lowest life satisfaction scores across all groups were found within the breakdown for health – the mean life satisfaction score among those reporting very good/good health was 8.3 and the mean among those reporting bad/very bad health was 5.7.

<u>Figure 5.3: Life satisfaction – differences among sections of Northern Ireland's population (16+) in 2018/19¹⁷</u>

	a scale from 0 (lo to 10 (high satisfo	ow satisfaction,	n life satisfaction score for – Northern Ireland: 7.8
**	Age	There were significant differences between several age groups. The highest scores were found amongst 16-24 and 25-34 year olds. 55-64 year olds had the lowest scores.	•
	Deprivation quintiles	People living in the least deprived areas (Q5), as well as those living in Q3 and Q4, had significantly higher scores than those living in the most deprived areas, Q1.	()2.11

¹⁷ This table does not include all available estimates. Note that the Gender and Ethnicity breakdowns are omitted as there were no statistically significant differences. To compare all available estimates and confidence intervals, please refer to the tables accompanying this report. Estimates are suppressed where fewer than 100 people were sampled.

	Employment	People who were employed had a significantly higher score than those who were economically inactive.		Er Employed: 8.0 Inactive: 7.5	
000	Religion	_	There were significant differences between the scores of Protestants, Catholics and those who were other/non-determined.		
	Urban / Rural		People living in rural areas had a significantly higher score than those living in urban areas		
	Health	There were significant difference reporting very good/good bad/very bad health.			
+%	Disability (LLSI)	Individuals with a limiting los significantly lower score than		a With LLSI: 6.8 Without LLSI: 8.2	
	Dependants	dependants had a significa-	Individuals who were responsible for one or more dependants had a significantly higher score than those who were not responsible for a dependant.		
0	Marital status	Individuals who were marri spouse had a significantly hi the other marital groups whereported.	gher score than each o	of Separated: 8.1	
	LGD	The highest scores were in Mid Ulster (8.2) and Armagh City, Banbridge and Craigavon (8.1). The lowest scores were in Belfast (7.4) and Derry City and Strabane (7.6). These four Local Government Districts had scores which were significantly different to the Northern Ireland average (7.8).	Derry City and Strabar 7.6 Mid Ulster - 8.2 Armagh City, Banbrid	Belfast - 7.4 ge and Craigavon - 8.1	
	Sexual	Individuals identifying as I straight had a significantly high	gher score than	Heterosexual/straight: 7.8	

those identifying as gay / lesbian / bisexual

orientation

/ other

Gay/lesbian/bisexual/other: 7.3

Annex A: Technical notes

Instruments for measuring self-efficacy, locus of control and life satisfaction

The instruments for measuring self-efficacy and locus of control are each a simple statement-based survey tool. They both take the form of five statements to which the individual indicates to what extent they agree or disagree on a five point Likert scale. Self-efficacy and locus of control are each presented as an overall score, minimum 5 and maximum 25, taken from the summed total of the five statement questions. Self-efficacy scores were categorised as low if they fell between 5 and 17, i.e. in the bottom 70% of the scale¹⁸.

Self-efficacy statement questions:

- 1. I can always manage to solve difficult problems if I try hard enough.
- 2. I am confident that I could deal efficiently with unexpected events.
- 3. I can remain calm when facing difficulties because I can rely on my coping abilities.
- 4. When I am confronted with a problem, I can usually find several solutions.
- 5. No matter what comes my way, I'm usually able to handle it.

Locus of control statement questions¹⁹:

- 1. I am in control of my life.
- 2. If I take the right steps, I can avoid problems.
- 3. Most things that affect my life happen by accident.
- 4. If it's meant to be, I will be successful.
- 5. I can only do what people in my life want me to do.

Life satisfaction is presented as a single question to which the individual responds on an 11 point scale (0-10). Life satisfaction is scored from 0 to 10, with 10 being the highest achievable score.

Life satisfaction question:

1. Overall, how satisfied are you with your life nowadays?

Continuous Household Survey

This report presents findings from the 2018/19 Continuous Household Survey (CHS) on the perceived general self-efficacy, locus of control and life satisfaction of the Northern Ireland population. The CHS is carried out by the Central Survey Unit (CSU) within the Northern Ireland Statistics and Research Agency (NISRA). The CHS has been in existence since 1983 and is designed to provide a regular source of information on a wide range of social and economic issues relevant to Northern Ireland.

Each year CSU sets the content of the questionnaire in consultation with client departments. The questionnaire consists of both a household interview and an individual interview with each person aged 16 and over. Both the household and individual questionnaires consist of core items that are included each year and modules that recur on a regular cycle. Core items include household and individual demographics,

¹⁸ For more information on determining high and low scores in Likert-type survey instruments, please see: Child, D. (1973) *The Essentials of Factor analysis*. In T. Hick & M. McFrazier (Ed.), *College Student Self-efficacy Studies*. New York: University Press of America

¹⁹ Locus of control statement questions 3, 4 and 5 were reversed and recoded prior to analysis.

accommodation, tenure, employment status, employment activity, educational qualifications, health and Section 75 classifications.

Sample

The 2018/19 CHS is based on a systematic random sample of 9,000 addresses drawn each year from the Pointer list of domestic addresses.²⁰ Pointer is the address database for Northern Ireland and is maintained by Land & Property Services, with input from Local Councils and Royal Mail. The findings reported for 2018/19 for self-efficacy and life satisfaction are based on questions asked of the full achieved sample of 5,735 respondents (and of these, 2,092 are aged 60 and above). Findings for locus of control are based on questions asked of a smaller subsample of 2,941 respondents. Data are collected by personal interview using Computer Assisted Personal Interviews, and the interviews are spread equally over the 12 months from April to March.

Sampling error and weights

As the CHS is a sample survey there is a certain level of sampling error, i.e. the characteristics of the group sampled may differ slightly from the population as a whole. To account for this sampling error, the data has been weighted in order to produce estimates that better represent the population. The adjustment may be less than or greater than 1, but is generally close to 1. Six separate weights were produced for age, sex and age and sex combined, with three each for both the full sample and the smaller subsample. This reduces (but does not completely eliminate) error. **All reported means / proportions have been weighted**.

Confidence intervals

The data tables include the 95% confidence intervals for each estimate. These confidence intervals represent the ranges either side of an estimate which are 95% certain to include the true value for the population. For example, the mean self-efficacy score for the Northern Ireland population aged 16 and over was estimated as 19.3 for 2018/19; we can be 95% certain that the true Northern Ireland population mean for 2018/19 falls between 19.2 and 19.4.

Publication threshold

The smaller a sample size is the less precise an estimate from that sample is likely to be. Estimates for groups where the achieved sample size is less than 100 have been omitted from the report, as they are likely to be unreliable. These instances have been denoted with an asterisk (*) in the tables accompanying this report. In some instances smaller groups have been coded together in order to allow for a larger sample size.

Statistically significant differences

Statistically significant differences between years or groups (at the 95% level) have been highlighted throughout the report. This means that we can be 95% confident that the differences between groups are actual differences and have not just arisen by chance. The base numbers, mean scores and percentages have an effect on statistical significance. Therefore on occasion, a difference between two groups may be statistically significant while the same difference in mean score or percentage points between two other groups may not be statistically significant. The reason for this is because the larger the base numbers or the closer the percentages are to 0 or 100, the smaller the standard errors. This leads to increased precision of

²⁰ From 2014/15 to 2016/17 the CHS was based on a systematic random sample of 4,500 addresses. The 2017/18 and 2018/19 samples were based on a systematic random sample of 9,000 addresses.

the estimates which increases the likelihood that the difference between the proportions is actually significant and did not just arise by chance.

Population breakdowns

Gender

The CHS outlines two gender categories for respondents: Male and Female

Age

The CHS asks respondents for their age at their last birthday. For the purposes of this report, the ages were coded into the following groups: 16-24 years, 25-34 years, 35-44 years, 45-54 years, 55-64 years, 65 years and over.

Note that when analysing the estimated proportion of people with low self-efficacy among individuals aged 60 and over, the ages were broken down instead into the following groups: 60-64 years, 65-69 years, 70-74 years, 75-79 years, 80 years and over

Deprivation

Deprivation figures presented in this report are based on the Northern Ireland Multiple Deprivation Measure 2017, which is a measure of deprivation at the small area level. Quintiles of deprivation categorise an area of deprivation; Quintile 1 (Q1) represents the 20% most deprived areas, and Quintile 5 (Q5) represents the 20% least deprived.

Employment status

The following definitions for employment status are used for the data presented in this report:

Employed: Comprises all individuals aged 16 or over who are in paid employment (both employees and self-employed), those on government training or work schemes, those who had a formal attachment to their job but were temporarily not at work during the reference period, performed some work for profit or family gain in cash or kind, were with an enterprise such as a business, farm or service but who were temporarily not at work during the reference period for any reason.

Unemployed: The unemployed compromise all persons above 16 who are without work, that is, not in paid employment or self-employment, currently available for both paid employment or self-employment and seeking work with specific steps taken to seek either employment or self-employment. Please note, throughout the report sample sizes are too small to provide an analysis of this category.

Inactive: The economically inactive population comprises all persons aged 16 and over who are neither employed nor unemployed.

Religion

Interviewers for the CHS collected information on the religion of residents aged 16 and over in each household, the religious categories represented within the questionnaire were as follows: Catholic, Presbyterian, Church of Ireland, Methodist, Baptist, Free Presbyterian, Brethren, Protestant – not specified, Christian – not specified, Buddhist, Hindu, Jewish, Muslim, Sikh, Any other religion, No religion. For the purposes of this report, the aforementioned religious groups were coded into three distinct categories, as follows:

1) Catholic

- 2) Protestant to include Presbyterian, Church of Ireland, Methodist, Baptist, Free Presbyterian, Brethren, Protestant not specified and Christian not specified.
- 3) Other/non-determined to include Buddhist, Hindu, Jewish, Muslim, Sikh, any other religion, respondents that did not specify a religion, and for those for whom religion could not be determined.

Urban/Rural

Data presented in this report have also been analysed by whether respondents are living in SOAs that have either been categorised as urban or rural. The definitions for an urban/rural SOA are outlined in the 'Technical Guidance on production of official statistics for Settlements and Urban-Rural Classification' (May 2016)²¹.

Health

The CHS outlines five distinct health categories by which respondents report on their general health. These are: 1) Very Good; 2) Good; 3) Fair; 4) Bad; and 5) Very Bad. For the purposes of this report, both very good/good and bad/very bad have been combined to create three health groups under which respondents are classified: 1) Very good/good; 2) Fair; and 3) Bad/very bad.

Limiting long-standing illness

Respondents are defined as having a limiting long-standing illness if they have any physical or mental health conditions or illnesses lasting or expecting to last for 12 months or more, and these condition(s) or illness(es) reduce their ability to carry out day to day activities.

Dependants

An individual is defined as having dependants if they have responsibility for the care of: a child(ren); a person with a disability; and/or a dependant elderly person.

Marital status

The CHS outlines nine distinct marital status categories for respondents as below. Please note sample sizes for some of these categories were too small for an analysis to be provided.

- 1) Single, never married
- 2) Married and living with husband/wife
- 3) In a registered same-sex civil partnership
- 4) Married and separated from husband/wife
- 5) Divorced
- 6) Widowed
- 7) Separated, but still legally in a same-sex civil partnership
- 8) Formerly in a same-sex civil partnership which is now legally dissolved
- 9) Surviving partner from a same-sex civil partnership

Local Government District

Data presented in this report have also been analysed by which of the 11 Local Government Districts (LGD2014) respondents are living in: Antrim and Newtownabbey, Armagh City, Banbridge and Craigavon, Belfast, Causeway Coast and Glens, Derry City and Strabane, Fermanagh and Omagh, Lisburn and Castlereagh, Mid and East Antrim, Mid Ulster, Newry, Mourne and Down, Ards and North Down²².

²¹ https://www.nisra.gov.uk/sites/nisra.gov.uk/files/publications/settlement15-guidance.pdf

²² https://www.nisra.gov.uk/sites/nisra.gov.uk/files/publications/11DC Guidance 0.pdf

Sexual orientation

The CHS outlines 4 distinct groups for sexual identity²³ for respondents: Heterosexual/straight, Gay/Lesbian, Bisexual, Other. For the purposes of this report, the aforementioned groups were coded into two distinct categories, as follows:

- 1) Heterosexual/straight
- 2) Other to include Gay/Lesbian, Bisexual, Other

Ethnicity

The CHS outlines 16 distinct ethnic groups for respondents: White, Irish Traveller, White and Black Caribbean, White and Black African, White and Asian, Any other mixed / multiple ethnic background, Indian, Pakistani, Bangladeshi, Chinese, Any other Asian background, African, Caribbean, Any other Black / African / Caribbean background, Arab, Any other ethnic group. For the purposes of this report, the aforementioned groups were coded into two distinct categories, as follows:

- 1) White
- 2) Other to include Irish Traveller, White and Black Caribbean, White and Black African, White and Asian, Any other mixed / multiple ethnic background, Indian, Pakistani, Bangladeshi, Chinese, Any other Asian background, African, Caribbean, Any other Black / African / Caribbean background, Arab, and Any other ethnic group

Research – possible linkages between the three constructs and use of a five item scale for self-efficacy

This report has been informed by research conducted by Queens University Belfast which was supported and contributed to by the ONS Methodological Advisory service funded through the Quality Improvement Fund (QIF)²⁴. The research was titled 'Investigating Locus of Control, Self-efficacy and Wellbeing – The relationship between all items across 3 instruments for a single item scale'.

This report examined the key constructs of locus of control and self-efficacy and how they relate to individual wellbeing, through analysis of data from the Belfast City Council Resident Survey and the Continuous Household Survey. Previous research suggested that both internal locus of control and self-efficacy are important constructs which predict higher wellbeing and life satisfaction among individuals and the Queen's research supported this.

The aim of this research was to assess if all three constructs were linked and whether they were significant predicators of one another and assess the feasibility of developing one overall scale of measurement which encompassed the three metrics together. Despite finding that higher wellbeing is partially mediated by self-efficacy and internal locus of control, it was concluded that the three metrics could not be measured on the same scale and must be treated as the three separate constructs they are.

The research conducted by Queens University has also influenced the use of a five item scale to measure self-efficacy rather than an alternative number of items. For self-efficacy, an exploratory factor analysis revealed that on the five item scale all items loaded highly and consistently onto a single underlying latent factor. For example, the self-efficacy scale when utilising the data from the CHS and Belfast City Council

²³ Terminology around sexual identity and sexual orientation aligns with guidance found here: https://gss.civilservice.gov.uk/policy-store/sexual-orientation/#terminology

²⁴ This research was funded by the Quality Improvement Fund (QIF). The QIF was provided by the UK Statistics Authority each year to the Government Statistical Service to support improvements in quality and trust in official statistics.

recorded loadings of 0.66-0.81 and 0.81-0.86 respectively, on a scale of 0 to 1 with higher being stronger. The exploratory factor analysis suggests that the self-efficacy scale functioned as a coherent and strong scale with the five items, this is further reflected in the good internal consistency, highlighted by the scales high Cronbach's alpha score (0.85 or above in each dataset from 2014/15 to 2018/19).