

Methodology, Quality and Use of Publication – Cost to Business of Completing Statistical Surveys issued by Northern Ireland Departments

This document accompanies the [Cost to Business of Completing Statistical Surveys issued by Northern Ireland Departments](#) releases. It provides information on the rationale for the publication, methodology (including definitions and coverage), discontinuity in the time series, main uses of the statistics, data quality and user engagement.

1. Rationale for publication

The collection of data by government departments and their arm's length bodies (ALBs) causes a burden on data suppliers. It is important to keep this burden to a minimum and hence the practice of survey control has been developed and practiced within Northern Ireland since the 1980s.

The [Code of Practice for Statistics](#) recognises the importance of monitoring and reducing respondent burden, balanced with the need to produce official statistics that are fundamental to good government and provide a good evidence base to inform public policy. It emphasises the importance of **transparency**, ensuring respondent **burden is proportionate to benefits** and making **use of existing data** before undertaking a new data collection:

V5.5 Statistics producers should be transparent in their approach to monitoring and reducing the burden on those providing their information, and on those involved in collecting, recording and supplying data. The burden imposed should be proportionate to the benefits arising from the use of the statistics.

V5.3 The suitability of existing data, including administrative, open and privately-held data, should be assessed before undertaking a new data collection.

V5.1 Opportunities for data sharing, data linkage, cross-analysis of sources, and the reuse of data should be taken wherever feasible. Recognised standards, classifications, definitions, and methods should be applied to data wherever possible.

V5.6 Statistics producers should analyse the impact of new data requirements or extending existing collections on those involved in the collection, recording and supply of data, against the potential value of the statistics in serving the public good.

V5.4 Voluntary participation in statistical data collection should be sought, rather than using statutory powers, wherever possible.

The burden to businesses due to statutory Government Statistical Surveys is also monitored by the [Statistics Advisory Committee](#) (SAC). Under the [Statistics of Trade and Employment \(NI\) Order 1988](#), a Northern Ireland Department is required to consult this committee before carrying out a statutory survey of businesses¹. This publication is provided to SAC annually and provides an overview of the overall cost to businesses due to NI Government Statistical Surveys.

¹ Under this Order, a business is defined as any person(s) carrying out an undertaking by way of trade or business, whether or not the trade or business is carried on for profit; and any other undertaking providing employment in respect of which Class 1 contributions are payable under the Social Security (Northern Ireland) Act 1975.

2. Methodology

Data collection

Data are requested from Survey Control Liaison Officers (SCLOs) in each of the Northern Ireland departments, as well as from officials in Arm's Length Bodies (ALBs). Respondents are provided with guidance notes and asked to provide details on the Government Statistical Surveys which their department/ organisation had commissioned or carried out in the relevant financial year. This information is returned to NISRA Survey Control Unit for quality assurance.

Coverage

All statistical surveys to businesses carried out by, or on behalf of, Northern Ireland Government Departments (including Arm's Length Bodies) are included, as well as statistical surveys carried out by NI Departments (or ALBs) on behalf of GB Government Departments (or ALBs) where the data are used directly by the NI Department (or ALB) or feed into UK Statistics.

Definition of Business

For Survey Control purposes, businesses include commercial businesses (including self-employed persons surveyed in the context of their business), schools, universities, colleges, voluntary organisations, non-profit bodies, mutual associations etc. Surveys of local councils are also included under surveys to businesses.

Definition of Statistical Survey

A statistical survey is any structured inquiry designed to obtain aggregated data (which may be qualitative or quantitative) where the individual or corporate identities of the respondents are in themselves of little significance.

This includes both regular and ad hoc surveys; both voluntary and statutory surveys that may be required to determine, evaluate or monitor policy and/or action, provide social or economic indicators or measure customer satisfaction. Statistical surveys conducted by, or on behalf of, non-departmental public bodies are also covered. Arm's length bodies are included under their parent departments.

Statistical surveys in scope are not limited to those conducted by statistics branches and include all modes of data collection: completion of a questionnaire; telephone data entry; face-to-face interview; online/email data collection etc.

Surveys that contribute to official statistics and those that do not are both in the scope of survey control.

The following are examples of statistical surveys **covered** by these controls:

- Surveys designed to obtain aggregated data;
- Surveys where responses are solicited by means of a direct approach to potential respondents;
- Surveys carried out for departmental sponsors by consultants or private organisations;
- Customer satisfaction surveys designed to identify overall success of a product or service.

The following are examples of surveys **excluded** from survey control:

- Surveys where there is no direct approach made and where respondents clearly select themselves (e.g. web sites, readership surveys, some types of consultation exercises where there is an invitation to comment);
- Where information is required as an integral part of the operational management of a public service. Such returns will often be regulated under specific departmental controls;
- Surveys relating to the contractual obligations of potential respondents to the department or agency concerned;
- Surveys to respondents in central government and its agencies.

Where part of a survey falls outside scope, the part of the survey within scope has been included where possible.

Compliance Cost

Compliance costs are the estimated financial burden placed on businesses as a result of completing government statistical surveys. Where the actual or estimated completion time is not available for each business, an overall completion time for the survey is estimated using the median time to complete the survey. The median time to complete the survey is estimated based on: information from the survey, paradata, historical data (within the last five years), a pilot survey, reviews or survey manager expertise. Only those completing the survey are included; nonresponse is assumed to place no burden on respondents. Any time spent establishing eligibility for businesses that are subsequently deemed out of scope is included.

Where a business survey uses a number of different form types, or data collection methods e.g. electronic/postal, and these vary in terms of completion time then the calculations may be conducted separately for each form type/ data collection method and summed for an overall compliance cost. Similarly, if there are different types of businesses with different completion times then the calculations for each type of business may be carried out separately and summed.

Validation procedures may require a re-contact with the business. The burden due to re-contact is also calculated. If actual or estimated re-contact times are not available then the median time taken to complete the full questionnaire may be substituted on the assumption that a respondent may need to review the entire questionnaire.

SCLOs are provided with a choice of five rates of pay taken from the Annual Survey of Hours and Earnings (ASHE)². SCLOs must select the most appropriate rate of pay for the person most likely to have completed the survey. The rates of pay used in compliance cost calculations are the UK median hourly pay (excluding overtime)³ for the following grades:

² The provisional 2020 ASHE results have been used for 2020/21. These figures have been used to ensure direct comparability with 2020/21 compliance costs published for other parts of the UK (<https://www.ons.gov.uk/employmentandlabourmarket/peopleinwork/earningsandworkinghours/datasets/regionbyoccupation4digitsoc2010asetable15>).

³ Table 15.6a: Earnings and hours worked, region by occupation by four-digit SOC: Hourly pay - Excluding overtime 2021.

Grade	ASHE Code
Chief Executive and Senior Officials	1115
Managers and Senior Officials	1
Professional Occupations	2
Associate Professional and Technical Occupations	3
Administrative and Secretarial Occupations	4

Any external costs incurred by businesses (e.g. accountant's fees) when complying with government survey requests are also included in the calculation of compliance cost.

The Compliance Cost (£) is a simple **addition** of Response Cost (£), Re-contact Cost (£) and External Cost (£), which are calculated as:

Response Cost (£) = No. of responses x Median time (hrs) x Hourly rate (£/hr)

Re-contact Cost (£) = No. re-contacted x Median time (hrs) x Hourly rate (£/hr)

External Cost (£) = No. with external cost x Median external cost (£)

If a survey is carried out on behalf of a number of government departments, then each government department will only include the compliance costs for the questions/ modules commissioned by them⁴.

Compliance costs at current year staff costs (constant prices)

The method used for calculating compliance costs at current year staff costs (or constant prices) is to use the rates of pay for the current, or base year, instead of the rates for previous years. This removes the effect of wage growth (changing staff costs) and adjusts the overall cost making it directly comparable to the current year. Any external costs incurred by businesses have not been adjusted as these represent a small proportion of the overall total.

Grade ⁵	2012 (for 2012/13)	2013 (for 2013/14)	2014 (for 2014/15)	2015 (for 2015/16)	2016 (for 2016/17)	2017 (for 2017/18)	2018 (for 2018/19)	2019 (for 2019/20)	2020 (for 2020/21)	2021 (for 2021/22)
Chief Executives and Senior Officials (1115)	£42.50	£43.17	£41.35	£42.42	£43.82	£45.83	£46.00	£44.08	£40.71	£43.15
Managers, directors and senior officials (1)	£18.57	£19.04	£19.25	£19.42	£19.71	£20.51	£20.60	£20.95	£20.89	£21.02
Professional occupations (2)	£18.99	£19.23	£19.31	£19.45	£19.71	£20.00	£20.44	£21.08	£21.30	£21.94
Associate professional and technical occupations (3)	£14.53	£14.74	£14.81	£15.00	£15.00	£15.33	£15.63	£15.73	£15.59	£15.85
Administrative and secretarial occupations (4)	£9.92	£10.00	£10.12	£10.28	£10.51	£10.71	£11.07	£11.44	£11.56	£11.98

⁴ The number of forms however will be the same as for the complete survey, which means that the forms and surveys will be counted more than once in aggregated figures.

⁵ Hourly rates of pay are (median) Hourly (£) UK rates of pay (excluding overtime)

Statutory and Voluntary surveys

Where the status of a survey is statutory there is a legal obligation on the respondents to provide the information that will be collected, for example, under the Statistics of Trade and Employment (NI) Order 1988. The Code of Practice for Statistics encourages official statistics producers to seek voluntary participation in statistical data collection rather than using statutory powers, wherever possible.

Official Statistics and Other Statistics surveys

Surveys that contribute to National or official statistics are referred to as 'official statistics' surveys, and surveys that do not contribute to National or official statistics are referred to as 'other statistics' surveys.

Data collection method

The data collection method is recorded for each survey. Prior to 2016/17 SCLOs were asked to write-in the data collection method(s) used for each survey. This meant that there was substantial variation in the descriptions used and it was not always easy to identify the primary data collection method. In 2016/17, this was replaced with a drop-down menu (Paper questionnaire; Paper diary⁶; Telephone interview; Face-to-face interview; Email data collection; Online questionnaire/ data collection; Online/electronic diary⁶; Telephone data entry; and Digital Voice Recognition Survey). SCLOs are asked to identify the primary, secondary, tertiary, etc. method of data collection. As a result, groupings and analysis from 2016/17 onwards will be more accurate than in previous years.

Rounding

In the tables, compliance costs have been rounded to the nearest hundred. Thus figures may not add exactly due to rounding. Compliance costs of less than £1,000 included in the commentary have been rounded to the nearest ten.

3. Discontinuity (affecting 2016/17, 2017/18 and 2018/19)

The application of the survey control methodology was reviewed prior to the 2016/17 data collection and improved guidance was produced. This has resulted in a discontinuity in the time series as some surveys, and types of surveys, which were excluded prior to 2016/17 are now included.

The methodology used to calculate compliance costs for surveys carried out by ONS, on behalf of ELMS, was also revised in 2016/17, 2017/18 and 2018/19. This has resulted in a substantial increase in the estimated compliance costs for some surveys in 2016/17, a smaller decrease for 2017/18 offsetting some of the 2016/17 increase, and a relatively small increase for 2018/19.

These discontinuities are noted when presenting the between year comparisons and examining the trend over time.

⁶ This option was first introduced in 2017/18. As paper diaries usually accompany face-to-face interviews, these have been grouped with face-to-face interviews in the analysis. This maintains consistency with what was done in 2016/17 and earlier years. Online/electronic diaries have been grouped with online questionnaire/data collection.

Reason for Discontinuity – Improved Coverage

Prior to the 2016/17 data collection exercise, a review was conducted of the guidance provided to Survey Control Liaison Officers (SCLOs) to provide greater clarity around the criteria for inclusion or exclusion of surveys. As a result of this review, a number of surveys that were not included in previous years have been included from 2016/17, specifically surveys carried out by Arm's Length Bodies (ALBs) and some surveys which were omitted due to being considered part of the operational management of a public service. These are primarily participant evaluation surveys, customer surveys and surveys which have a secondary operational purpose.

Due to these coverage changes, from 2016/17 there is an increase in the total number of surveys, forms and compliance costs. There was a small re-adjustment in 2017/18, as some surveys had been incorrectly included in 2016/17 and these were subsequently removed from 2017/18.

Assessment of Impact of coverage changes

In 2016/17, including those surveys and types of surveys that were not previously included potentially increased the number of surveys by 46, the number of forms by around 17,000 and the overall compliance burden by around £61,000. While these figures give an indication of the potential size of the discontinuity, it is difficult to say with certainty what surveys would have been included had the guidance not been reviewed and additional training provided.

In 2017/18, surveys of teachers which had been incorrectly included in the 2016/17 data for DE were removed⁷. These surveys were mostly ad-hoc training or event evaluation surveys and accounted for 18 of the additional 41 DE surveys in 2016/17, around 1300 of the additional forms and £2,100 of the increase in compliance costs⁸. For DfE, surveys carried out by the Construction Industry Training Board NI (CITB NI) were included for the first time in 2017/18. These 13 surveys accounted for 235 forms and compliance costs of £1,600.

Reason for Discontinuity – Change in Methodology used by ONS

The Office for National Statistics (ONS) also carried out a major review of its methodology in 2016/17, with further improvements in 2017/18 and 2018/19. This resulted in a large increase in compliance costs for ONS surveys in 2016/17, a smaller decrease in 2017/18 which offset some of the earlier increase, and a relatively small increase in 2018/19. This change in methodology impacts the compliance costs but not the number of surveys or number of responses.

In 2016/17, ONS moved away from calculating stratified compliance costs based on business size; included an estimate of re-contact burden and reviewed median completion times in conjunction with survey managers.

In 2017/18, median completion times were reviewed for a further ten surveys and median re-contact times (which had been assumed to be equal to median completion times) were revised. This assumption, while allowable under the survey control methodology (see 'compliance cost' in Section 2), inflated the compliance cost estimates for these surveys in 2016/17.

⁷ Surveys of teachers are excluded from survey control as the majority of teachers are employees of the Education Authority (EA) or the Council for Catholic Maintained Schools (CCMS) which are both ALBs of the Department of Education and surveys of government employees are excluded from survey control (see 'Definition of Statistical Survey' in Section 2).

⁸ This has been estimated based on the information returned for CCEA (and other DE) surveys in 2016/17.

In 2018/19, ONS revisited the staff costs used in calculating compliance burden and moved away from a single occupation code applied to all surveys (ASHE Code 1) to a weighted calculation based on the breakdown of the profession of respondents obtained from survey compliance reviews⁹

Assessment of Impact of ONS methodology changes

The change to the methodology used by ONS in 2016/17 resulted in a large increase in the compliance costs for surveys carried out by ONS on behalf of ELMS. While the total number of responses remained approximately constant, at around 12,000, for the 27 surveys carried out by ONS that were common to both 2015/16 and 2016/17, the compliance costs increased by 61% (from £213,100 to £342,600).

The impact of the ONS methodology change in 2017/18 has been assessed by applying the revised median completion and re-contact times to the 2016/17 data and re-calculating the compliance costs for those surveys where comparable information is available for both years. Applying the revised median re-contact times to the 2016/17 data, reduces the compliance costs by £81,900; this equates to 62% of the increase observed between 2015/16 and 2016/17 for these 22 surveys. This over-estimation of compliance costs is only present in the 2016/17 data. The review of median completion times affected ten surveys in 2017/18. Applying the revised medians to the 2016/17 data would have reduced the compliance costs by £57,500 and reduced the compliance costs in 2017/18 by £59,300.

The change in the methodology used by ONS in 2018/19 to estimate staff costs has resulted in an increase of £16,700 in the estimated compliance costs for 2018/19. This has been assessed by comparing compliance costs for ONS surveys calculated using the revised approach (a weighted calculation based on all five ASHE Codes) with compliance costs calculated using the previous approach (a single ASHE Code 1).

4. Main uses of these official statistics

These official statistics are used by business and industry, by the Statistics Advisory Committee (SAC), by Members of the Legislative Assembly (MLAs), by the media and by the general public. Under the Statistics of Trade and Employment (NI) Order 1988, a Northern Ireland Department is required to consult SAC before carrying out a statutory survey of businesses¹⁰. The Northern Ireland Statistics and Research Agency (NISRA) also consults SAC before carrying out voluntary surveys of businesses. This publication is provided to SAC annually and provides an overview of the overall cost to businesses of completing NI Government Statistical Surveys.

Information in this publication has previously been used to investigate the cost to Northern Ireland businesses in completing government surveys; to respond to MLA questions; and to provide briefing for the Minister of Finance. The information has also been used by NISRA

⁹ Compliance reviews of ONS surveys are carried out every three or five years (depending on the frequency of the survey). A subsample is sent a separate survey, asking questions to more accurately calculate respondent burden. Questions are also added to the end of a new surveys or survey with substantial changes to allow ONS to assess the impact.

¹⁰ Under this Order, a business is defined as any person(s) carrying out an undertaking by way of trade or business, whether or not the trade or business is carried on for profit; and any other undertaking providing employment in respect of which Class 1 contributions are payable under the Social Security (Northern Ireland) Act 1975.

branches to identify their contribution to the overall burden on businesses, and to assess the impact of alternative methods of data collection on the compliance burden resulting from their surveys.

5. Data quality

Data are derived from returns provided by other government departments and ALBs. Although the compliance cost is an estimate, the quality of the underlying data has improved greatly since the pre-2016/17 review, and is now considered to be of a high standard. The improvements include:

- Improved coverage of non-NISRA branches within Departments; and improved coverage of ALBs.
- Better application of the criteria to determine whether surveys should be included or excluded from the return.
- Better estimation of median completion times, re-contacts and median re-contact times.
- More use of separate calculations for different subgroups where the compliance costs vary across different modes of data collection and/or type of business.
- Improved quality assurance, with the introduction of local quality assurance by SCLOs.

There have also been improvements in the coherence and comparability of the returned data, both within and between departments, due to improved and expanded SCLO guidance, annual training for SCLOs and an improved data collection workbook, including standardised options for e.g. data collection methods; automatic calculation of compliance costs; built-in guidance and basic validation checks.

The data collection process means that individual SCLOs are the key decision makers in terms of including or excluding surveys from the returns. While there is communication between SCLOs and NISRA Survey Control Unit to clarify any queries, there is the potential for individual interpretations of the inclusion and exclusion criteria to lead to small inconsistencies in individual returns.

The quality assurance checks carried out by Survey Control Unit focus on ensuring that the data returned are complete and internally consistent for the current year, and also consistent with returns from previous years. Where data are missing or there are large changes or inconsistencies, explanations are sought from the data supplier, and if necessary the data are re-supplied.

Changes in the methodology used by ONS - as well as the data quality improvements outlined above - have resulted in a discontinuity in the time series, which are discussed in section 3 above.

Further information on the quality of the data used to produce these official statistics can be found in the [Background Quality Report – Cost to Business of Completing Statistical Surveys issued by Northern Ireland Departments](#).

6. User Engagement

User engagement is on-going between the publication of one report and the production of the next. Following the pre-2016/17 review of the guidance and methodology a specific programme of engagement was carried out. This resulted in some minor changes to the publication such as referencing the Statistics Advisory Committee and the Statistics of Trade and Employment (NI) Order 1988. The 'Uses of Surveys' section was also added to the publication as a result of user feedback, as were the [case studies](#) focusing on the use of surveys.

An [online consultation](#) seeking users' views on proposals to reduce the content of the 'Cost to Business' report and discontinue the 'Burden on Households & Individuals' report was held between December 2022 and February 2023. The [responses from the consultation](#) were supportive of the proposals, which is consistent with the feedback received from other user engagement. As a result the 'Burden on Households & Individuals' will no longer be produced and the 'Cost to Business' report has been reduced to only include analysis at the Northern Ireland level and a single breakdown by Department. The downloadable data will continue to be made available alongside the report, enabling users to replicate the missing analysis.

We would welcome your feedback, on what you use this report for, any tables/ charts or commentary you find particularly helpful and any additional analysis you would like to see. Feedback can be provided by emailing Garbhan.McKevitt@nisra.gov.uk.