

census
2021

Census 2021

**How NISRA is ensuring Census 2021
will serve the public good – January
2021 update**

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1. Introduction

Assessment of Census 2021

The Office for Statistics Regulation (OSR) is assessing the next census across the UK, which is being conducted by the Northern Ireland Statistics and Research Agency (NISRA), National Records of Scotland (NRS) and Office for National Statistics (ONS) in Northern Ireland (NI), Scotland, and England and Wales, respectively. The purpose of the OSR assessment is to inform its recommendation on whether the Census 2021 outputs should be designated as National Statistics, in accordance with the requirements of the Statistics and Registration Service Act 2007, when they are first released.

Census statistics on people and households in the UK are an important resource for a variety of users including government, local authorities, academics, the commercial sector and the general public. Therefore, it is essential that the data meet the standards set out in the [Code of Practice for Statistics](#) (hereafter referred to as the Code).

Compliance with the Code provides users and the public confidence that the Census 2021 statistics are of public value, are high quality and are produced by an organisation that is worthy of trust.

Assessment process to date

The OSR assessment focuses on the complete NI Census 2021 programme, from initial planning and development through to the data collection operation in spring 2021 and on to the production of the suite of standard outputs during 2022 and 2023. Prior to the planned publication of the first Census 2021 outputs, the UK Statistics Authority will decide whether the NI Census retains its National Statistics designation, based on OSR's recommendation.

This is the third report produced by NISRA, which forms part of the evidence base being supplied to OSR for the assessment. In June 2019, we published our initial report '[How NISRA is ensuring that Census 2021 will serve the public](#)', detailing how our plans and progress to that point aligned with the standards set out in the Code. [Office for National Statistics](#) and [NRS](#) published similar reports at the same time.

Following engagement with users and other stakeholders about their views on Census plans, progress and outputs, alongside consideration of the initial reports produced by the Census offices, OSR published its first report '[Assessment of 2021 Censuses in the UK – Preliminary findings](#)' in October 2019. It recognised the areas of strength and positive developments undertaken by the three offices and identified a range of preliminary findings requiring action to improve compliance with the Code.

The Census offices are working, collaboratively where relevant, to address these findings as part of enhancing the public value, quality and trustworthiness of the data and

statistics from the upcoming censuses across the UK. In June 2020, NISRA released '[Census 2021 - Response to Actionable Findings from Phase 1 of the National Statistics Accreditation](#)', its second publication relating to the assessment; this coincided with similar publications by [ONS](#) and [NRS](#). Following a review of the actions, OSR published letters for [NISRA](#), [ONS](#) and [NRS](#) in September 2020, which acknowledged the noteworthy activities being undertaken and identified areas requiring further attention.

Focus of the report

This report is being published as part of Phase 2 of the Census 2021 assessment, which is ongoing and runs until after the Census live operation. It considers compliance against the three pillars of the Code, with more attention on Quality and Value as we move towards and beyond Census day in March 2021. Phase 2 has a stronger focus on plans for developing and disseminating outputs from the next Census, both for the individual countries and the UK as a whole.

The first part of the report provides an update on progress following the September 2020 OSR review of our response to the findings from its Phase 1 report. A number of the findings have a UK perspective and therefore require a collaborative approach involving all three Census offices. In the second part of the report, we provide a general update on the NI Census 2021 programme, focussing on the key systems and services; this includes an overview of the impact of the COVID-19 pandemic. To end, the next steps in the assessment process are outlined.

2. Progress on OSR's actionable findings from Phase 1

NISRA is committed to addressing the OSR findings from Phase 1, as detailed in our June 2020 report. This section describes developments and activities over the intervening period that are relevant in this context.

2.1 User engagement and question development (actionable finding 1, 2 and 3)

Finding 1 – Accessibility of information and website content

Census offices should consider the accessibility of research and other Census information on their websites and consider aligning website design and content where possible to provide a common user experience.

Actions

There is ongoing engagement between NISRA, ONS and NRS in this area. A workshop was held in September 2020 involving the three Census Offices and the digital transformation consultancy enlisted by NRS to deliver the new Scotland's Census outputs website. This enabled each of the attendees to gain a greater insight on the activities and plans around the Census website of each office, and identified opportunities for aligning website design and content to provide a common user experience, where possible and practical. The workshop also reinforced the commitment to greater signposting across the three websites on key topics of interest to users such as legislation, questionnaire content and methodology.

Finding 2 – Census questions and guidance

Census offices should be open and transparent on their decision-making processes and in their decisions on Census questions and guidance, particularly in relation to any areas of contention.

Actions

The Census 2021 questions are finalised and set out in the [Census Regulations \(Northern Ireland\) 2020](#), which came into operation in July 2020. The design of the various questionnaires was the result of extensive user consultation, testing and a rehearsal involving a large sample of the general public. The NI Census 2021 household questionnaire is available to [view](#) on the NISRA website.

In August 2020, we published a further topic [report](#) on UK armed forces veterans. This detailed the additional research and user engagement conducted since the initial [report](#) published on this topic in April 2019. The report clearly outlines the rationale behind the decision to omit the armed forces veterans question from Census 2021 in NI, primarily that:

- returns from the 2019 Census Rehearsal indicated that some local veterans would not disclose their veteran status; and
- feedback from local focus groups reinforced this with local veterans indicating that the inclusion of this question on the Census was undesirable.

NISRA proposes to use relevant administrative data to provide 'census-type' statistics on this population group, thereby satisfying user demand identified via the topic consultation held at the outset of the Census 2021 programme.

We will continue to work with stakeholders on finalising the guidance provided to assist with completing the questionnaire, for example, accompanying the sex question.

Furthermore, work is ongoing to shape the guidance and instruction required to take into account the impact of the coronavirus (COVID-19) pandemic on respondents' interpretation of Census 2021 questions.

Finding 3 – Needs of UK Census data users

(a) Census offices should consider how best to engage with users and stakeholders of UK Census data and statistics users and coordinate activities as appropriate.

Actions

The three Census Office continue to work together to build upon the initiatives described in section 2.3.1 of our June 2020 report [Response to Actionable Findings from Phase 1 of the National Statistics Accreditation](#). The UK Census Data Working Group (UKCDWG), set up to support collaboration across the Census offices to specifically address the OSR findings 3(a) and 3(c), continues to meet monthly and progress activities in this area. The group intend to draw on expertise across the wider GSS to explore ways that might improve engagement with UK census users. A new UK Census Data User Group is being established and the UKCDWG will share information on its activities via this group to increase the visibility of its work.

There is a continuing commitment to attend and contribute to user and stakeholder events being held by each of the offices. For example, we participated in the series of Census 2021 webinars held by ONS in late 2020, and we attended a virtual event delivered by NRS in January 2020 to discuss the new Scotland's Census outputs website.

(b) Census offices should be clear about the impact of country-specific decision making for UK Census data and statistics and work together to provide greater transparency around their plans and decision making in meeting the needs of users interested in UK Census outputs.

Actions

In July 2020, the Scottish Government [announced](#) that Scotland's Census has been moved to March 2022. This is reflected in the latest update to the statement of agreement between the National Statistician and the Registrars General for Scotland and NI about the conduct of the 2021 Censuses in the UK, [published](#) in January 2021. It is structured around three broad aspects of Census 2021 that are a strong focus of harmonisation, namely outputs, census procedures and governance. Within each section, there is clear

information highlighting to users the considerable progress made to date on harmonisation. Furthermore, the update provides:

- examples of how decisions are made taking into account UK data user needs; and
- a list of all harmonisation working groups demonstrating the breadth of collaborative work the three Census offices undertake.

There are regular meetings between the three Census offices to support harmonisation activities and coordinate engagement with users of UK data. Alongside our ONS and NRS colleagues, we are committed to producing the necessary UK-wide population statistics and will engage with users through the new UK Census Data User Group. This group has been established to provide a forum for sharing information and feedback between the Census offices and UK census data users; ultimately, it will inform development of a dissemination approach that maximises the benefit that can be gained from providing UK census outputs.

We will also ensure that harmonisation information is more easily accessible to users when outputs are made available. Updates on [UK Census harmonisation](#) can be found on the ONS website, with a link available on NISRA's UK Census data [webpage](#).

(c) Census offices should provide users, stakeholders and decision makers with information on harmonisation of Census questions and the impact on outputs at UK level to help inform users and support decision making.

Actions

Work is ongoing to produce a clear understanding of the harmonisation of Census 2021 questions across the UK; this includes highlighting where differences exist, the underlying reasons, and the resultant effect on UK-level outputs. This work could not be completed until the respective Census Orders and Census Regulations for each part of the UK had become law, upon which the Census 2021 questions would be finalised.

Now that the legislation is in place, the three Census offices will continue to work together to review question and outputs harmonisation. The expectation is for this information to be published in late 2021 or early 2022, so data users are fully informed at the earliest opportunity and in advance of the publication of the first census outputs.

2.2 Methods, data and quality management (actionable finding 4 and 5)

Finding 4 – Quality assurance of administrative data

Census offices should build their awareness of the relative strengths and limitations of any administrative, commercial or other data sources used in the production of Census outputs, by regular engagement with suppliers. This should be undertaken on an ongoing basis and as part of a normal way of working.

Actions

The OSR guidance on Quality Assurance of Administrative Data (QAAD) is a key tool in supporting the QA of administrative data sources handled by the Census Administrative Data (CAD) team within NISRA. The strategy of acquiring QAAD information from data suppliers, summarising it and disseminating it to the entire CAD team continues to be a standard activity. This work has been severely hampered since spring 2020 owing to issues such as staff redeployment to work on projects related to COVID-19 and inability to work on the sensitive administrative data sources remotely; however, considerable efforts are being made to maintain progress.

It is important to note also the additional requirement that now exists, namely to assess the impact that the COVID-19 situation is having on the various administrative data that we handle. For example, there is evidence of fewer persons showing activity on the health register, which may necessitate a change in the inclusion rules that we apply.

Finding 5 – Methodology and quality assurance information

Census offices should make information on the methodology and quality assurance arrangements available to users at the earliest opportunity.

Actions

Since November 2020, NISRA has been conducting an extensive rehearsal of the data processing system developed for Census 2021. The first phase involves a test of the data flow through the various processing stages using a large sample of Census 2011 records. Once the data flow is fully functioning, the processing stages such as data cleansing, edit and imputation and coverage estimation will be applied to the sample data to ensure that the system is operative. This will also facilitate testing of dependencies with other key interfaces such as the administrative data system, the mechanism for response data delivery from ONS and the quality assurance (QA) system. Following the data processing rehearsal, we will be better placed to publish information for users on the methods being employed for processing of Census 2021 data.

The QA strategy developed by NISRA for Census 2021 was [published](#) in January 2021. It outlines the work that will be undertaken to ensure that the NI Census outputs are robust, reliable and meet the needs of users. Within the strategy, QA at all the key stages of the end-to-end Census journey is considered, from question development through to outputs production. Users and stakeholders will be invited to provide feedback on the QA strategy, while proposals for other analyses, data sources or methods that could provide reassurance on the reliability of the Census results are welcome.

2.3 Planning, management and ways of working (actionable finding 6 and 7)

Finding 6 – Census 2021 milestones

Census offices should provide users with an indication of future Census milestones – including future user engagement opportunities, publication of further research or reporting, and legislative milestones – to provide an added level of transparency and support trustworthiness and public confidence.

Actions

The Census 2021 milestones [page](#) on the NISRA website is updated where relevant, with links to further information included where available. Any changes to milestones or anticipated dates in light of the ongoing COVID-19 situation will be reflected on this webpage to keep users informed.

Finding 7 – Assurance mechanisms for Census 2021

Census offices should be clear to users what assurance mechanisms are in place and be open about identified areas for improvement in a way that is a proportionate and accessible to users.

Actions

The assurance [page](#) on our website informs users about the assurance mechanisms in place to ensure the successful delivery of Census 2021 in NI. The minutes from the meetings of the Demographic Statistics Advisory Board held over the period mid-2016 to early 2020 are [available](#) on the NISRA website, while those from the most recent meeting held on 9th December 2020 will be added in due course. Furthermore, the evaluation report on the operational element of the 2019 Census Rehearsal was [published](#) in August 2020. This provides evidence of assurance around the functioning of key systems and services such as internet data capture, online help and field staff recruitment, and

highlights the areas requiring improvements. Section 3.9 of this report provides additional information on activities relating to assurance of Census 2021.

3. Update on the NI Census 2021 programme

The NI Census day of 21st March 2021 is less than two months away and NISRA is committed to delivering a successful operation underpinned by effective design and implementation. The aim is to provide households and persons with every opportunity to participate in the Census, thereby maximising the response. The following section provides an update on the main elements of the NI Census 2021 programme, initially touching upon the impact of the COVID-19 pandemic.

3.1 Impact of COVID-19 on Census 2021

Given the wide-ranging impact of COVID-19 on society, it is important to highlight how it is affecting Census 2021. Unsurprisingly, the situation presents a considerable challenge in terms of delivering a successful Census 2021 across the UK. While NISRA and ONS are pressing ahead with conducting the Census in March 2021, the Scottish government [announced](#) in July 2020 that Scotland's Census will now take place in March 2022 owing to the impact of the pandemic on preparations.

Since April 2020, ONS has conducted scenario planning and regular readiness assessments, which are published in the UK Statistics Authority Board's minutes, available through the UK Statistics Authority publications [page](#). The aim of these activities is to assess the risks to delivery of the programme as a result of COVID-19. This work was undertaken in parallel with NISRA and ONS in order to provide mutual support and aim to maintain coherence.

For Census 2021 in NI, it has been necessary to modify or re-design some of the systems and services to counteract the impact of or address concerns relating to COVID-19, as well as to adhere to public health requirements. The following is an overview of the main measures that have been or will be implemented. Note that changes announced by Scotland have no operational impact on these elements of Census 2021 in NI.

Field operations

The activities of recruiting, equipping and training field staff are impacted by restrictions (local and national) and social distancing measures. NISRA is recruiting almost two thousand temporary staff to support the field operation for Census 2021 in NI. The recruitment process for the manager roles, namely Census Area Manager and Census

Team Coordinator, had to be carried out virtually; online interviews were held during the second half of 2020 and early 2021 to enable the selection of successful candidates. The recruitment of enumerators and subsequent training will also be conducted virtually to a large extent. Face-to-face contact will potentially be necessary for the provision of equipment to field staff.

Certain measures will be implemented to minimise the risk to staff and householders during the field operation. The former will be provided with Personal Protective Equipment, including reusable face masks and hand sanitiser. The doorstep routine has been changed such that staff will be advised to use hand sanitiser before contacting touch points around the entrance; they must then take a step back to allow for sufficient distance between the householder and themselves.

If a householder requests assistance in completing their Census return, they will be advised to ring the Contact Centre and ask for telephone capture. In the event of a local lockdown, there is a contingency process to promote telephone capture in the affected areas. For Census 2011, it was possible for two members of field staff to enter a householder's home to help them complete the questionnaire; this facility will not be available during Census 2021.

Questionnaire

The COVID-19 pandemic has seriously affected the labour market and economic activity. This includes job losses, cancellation of recruitment activities and reductions in working hours. As a consequence, NISRA has updated the guidance associated with the labour market and economic activity questions in the online questionnaire for Census 2021. The aim of this measure is to provide respondents with clear information that makes the questions easily understandable and fit to collect high-quality data.

Data processing

There is flexibility in the coverage strategy developed by NISRA for Census 2021, with the ultimate goal of producing robust estimates. While the aim is to achieve a response rate that is comparable to that for Census 2011, we acknowledge that this will be extremely challenging. This is based on declining response rates observed in other census-taking countries in recent years, while there is greater apathy amongst the public towards participation in state-promoted operations such as the census. Furthermore, the COVID-19 pandemic has demonstrated the need to be prepared for the unexpected.

For Census 2021, we plan to use an enhanced version of the Census Under Enumeration (CUE) project that was successfully implemented in Census 2011. The method uses high quality administrative data to supply demographic information on households that field

staff have indicated did not take part in the Census. The dual approach of the post-collection Census Coverage Survey and the ability to scale up the extent of CUE is a contingency in the event of a lower than expected response rate.

Outputs

In addition to the primary utility of census statistics in informing decision-making, resource allocation and service planning and delivery, outputs from Census 2021 will facilitate a strong understanding of the societal impacts of the ongoing pandemic. As well as providing an insight on the composition and characteristics of the NI population at this indelible point in time, data from Census 2021 will serve as an important baseline for measuring change over time after the pandemic.

In terms of UK-level outputs, the move in Scotland's Census data will inevitably affect timing and scope; we continue to work closely with colleagues in ONS and NRS to fully understand these impacts. We will engage with users through the new User Working Group for UK Census Data. This has been set up to ensure we are getting user input to inform decision making on UK-level outputs.

3.2 2019 Rehearsal

A rehearsal for Census 2021 in NI was carried out during autumn 2019, providing a large-scale test of processes and systems being developed for the main census. It covered three geographical areas with different characteristics, comprising approximately 19,000 households. Just over 9,000 household responses were received, of which two-thirds were online. In addition, there was a rehearsal of the Census Coverage Survey conducted in early 2020. Overall, the Rehearsal was considered to be very successful in terms of identifying what worked well and where improvements are necessary, while also providing confidence in the use of new and innovative methods for Census 2021.

The [Census Rehearsal 2019 Evaluation Report](#), published in July 2020, details the main findings and lessons learned, with this intelligence being used to refine elements of the Census 2021 operation and ensure its successful delivery. The focus of this evaluation is the collection phase, covering areas such as stakeholder engagement, the address register, field operations and incident management. A rehearsal of the data processing phase is ongoing, as described in section 2.2, using response data from Census 2011 to provide a high volume. This enables checking of the data flow along the processing platform, as well as the performance of the various stages such as cleansing, edit and imputation and coverage estimation.

3.3 Legislation

The legislation necessary to undertake Census 2021 in NI is in place, with [details](#) provided on the NISRA website. The planning process for the Census has also seen the production of a number of statutory impact assessments, namely the 2021 Census Regulatory Impact Assessment, 2021 Census Data Protection Impact Assessment and 2021 Census Equality Impact Assessment Screening Template; these are [available](#) online.

The Data Protection Impact Assessment covers key aspects such as the way response data will be processed, assessing the necessity and proportionality of the Census and identifying the risks in processing personal data and how these are mitigated. In the Equality Impact Screening Template, information is provided on how the design and delivery of Census 2021 does not disadvantage or inadvertently discriminate against any individual or groups in respect of the nine equality categories defined in Section 75 of the Northern Ireland Act 1998.

Privacy information for respondents will be published on census.gov.uk/ni and available to the public throughout the course of the Census. A paper version of the privacy information will be provided alongside all paper questionnaires, while the information will also be available on request. Shorter versions will be available in a variety of languages and in Braille. There will also be a British Sign Language video of the information, accessible from the census.gov.uk/ni.

3.4 Maximising response to Census 2021

One of the key strategic objectives for Census 2021 is to maximise overall response rates and minimise differences in response rates across areas and among particular population groups. Our respondent-centric approach will ensure that it is as easy as possible for people to respond however and wherever they wish to.

Census 2021 will use online questionnaire as the default response mode for the first time; this approach will enable us to monitor response in real time and react quickly in targeting interventions to maximise response. Support will be available through Online Help and the Contact Centre, where people can get assistance to complete their Census return. Services to be provided by the Contact Centre include trained telephone advisors, webchat and language support for 17 different languages. Paper questionnaires will be provided to people who are unlikely, unable or reluctant to respond online, although these will include an access code to facilitate online response should the recipient wish to do so. Furthermore, there will be a facility for telephone capture.

The cooperation of the public will be essential if Census 2021 is to be successful. Community and stakeholder engagement in addition to a publicity campaign are key tools

in this regard. NISRA is implementing a variety of initiatives and measures in these areas with the aim of:

- ensuring all householders know that the Census is happening;
- encouraging all householders to complete their questionnaire, ensuring that they are aware of the legal obligation to make a return;
- providing assurances to the public about the confidentiality and security of the Census; and
- informing the public about how they can get more information.

Online Help

NISRA will share this system with ONS, who are overseeing its development. The Online Help content is integrated with the Census 2021 campaign [website](#) and will go live in February 2021. The ultimate aim of the system is to enhance the quality of responses by:

- answering anticipated question(s) a respondent may have that would interfere with their ability or willingness to participate in the Census; and
- providing appropriate, easy-to-access and easy-to-understand information at the point of demand on the website, via the Contact Centre and all public-facing channels across the programme.

Users of the system will include the public, Contact Centre advisors and field staff.

Community and stakeholder engagement

Community and stakeholder engagement is a vital tool in not only promoting the Census but also empowering people from a range of backgrounds and circumstances to be able to participate. While advertising and publicity serve as a means of creating broad awareness, engagement is needed to help those who need additional support to be able to take part in the census.

NISRA is in ongoing contact with appointed representatives from each of the 11 local councils in NI. The councils are key partners in delivering a successful data collection operation as they can assist with communication and provide information to support QA. They can also provide local intelligence such as identifying areas that are likely to prove difficult to enumerate. As the councils rely heavily on census data to inform their decision-making, there is mutual benefit in collaborating to help ensure a successful census operation.

The 12 Census Area Managers, employed in October 2020 as part of the temporary field staff recruitment, have an important role in community and stakeholder engagement. To date, they have held a number of meetings with local council representatives and

identified opportunities to virtually engage with a range of groups in each council area to publicise the Census, provide information and address any concerns. This will be essential in helping make sure we get the response we need to make the Census a success.

NISRA has engaged extensively with community and voluntary groups and charities, informing them of our plans for Census 2021 and encouraging their support. We highlight the uses and benefits of census statistics to these groups with the aim of motivating them to participate. There is a strong focus on population groups that are less likely to engage with the census owing to cultural or ability reasons. We have had notable success with the Royal National Institute of Blind People and the Inter Ethnic Migrant Forum; efforts will continue to maintain engagement with this sector.

There is ongoing communication with public sector organisations across NI to secure their support for Census 2021. The nature of this support will vary based on the organisation in question. Examples include the NI Civil Service, Health and Social Care Boards and Police Service of NI among others. We will continue to enhance these relationships through regular engagement.

We have identified other groups and organisations who we believe could be of assistance in terms of supporting the Census. As part of this initiative, we have made contact with various churches and religious bodies, while other influential groups in NI society are being targeted. Plans are also in place for early 2021 to increase awareness of the Census within political parties at various levels.

Census at Schools

NISRA has worked with the Council for the Curriculum, Examinations and Assessment (CCEA) to develop the Census at Schools Programme for Census 2021 in NI. We have worked to adapt the England and Wales Census at Schools Primary programme to ensure that the content is mapped to the NI curriculum. Several lesson plans have been carefully developed for each of the three primary school stages, namely foundation, key stage 1 and key stage 2. These plans will link the Census to the students' own learning pathways and the home exercises will help to build awareness in their households about the upcoming census. The lesson plans are available to download from the CCEA website and a marketing plan is in place to promote these across the primary education sector in NI.

Assisted Digital

The Assisted Digital facility, involving support staff based in libraries, was trialled during the 2019 Rehearsal to provide help to those who wished to complete their questionnaire online. However, the initiative was considered unsuccessful as there was no uptake from

the general public, while it was not considered to be scalable for the main census. Consequently, the decision was taken to not offer this facility during Census 2021.

Social media channels

NISRA has two social media accounts for Census 2021, on [Twitter](#) and [Facebook](#). The frequency of posts and messages will increase as we get closer to the operational period in spring 2021. These accounts will be used to promote a range of aspects of the Census, for example, key operational dates, data security issues and field staff activity. As part of our engagement activities, we encourage organisations and groups to follow our accounts and to share our posts through their own social media channels; this helps to increase the reach of our messaging. The social media channels provide a great opportunity for the public to engage with Census 2021.

Publicity campaign

A leading advertising agency in NI has been appointed, following a public procurement exercise, to deliver an advertising campaign for Census 2021 in NI. This agency delivered a smaller scale campaign for the 2019 Rehearsal, which has helped us to develop a strong and effective working relationship. The campaign used for the Rehearsal has been reviewed and adapted to fit the needs of the main census. A full media plan has been developed, laying out the choice and balance of media for the campaign. Paid advertising is due to commence in February and will contain the following elements:

- multi-phase television campaign;
- radio advertising to be broadcast across the main radio stations in NI;
- advertising on Spotify and Podcast services;
- video on demand services;
- outdoor advertising including billboards, buses and adshel;
- digital and online advertising across the web;
- Google Ads;
- social media advertising on Facebook, Instagram and Twitter; and
- traditional print advertising in NI-wide publications and local papers.

In addition, we are working closely with colleagues in the departmental Press Office to identify and develop opportunities to promote the Census in addition to the paid advertising detailed above. Plans are still being finalised but activities will include press conferences, media briefings, appearances on local television and radio to promote Census 2021 and editorial pieces in local NI newspapers and digital news sites.

Non-response follow-up

Invariably, there will be some members of the public needing encouragement to complete their questionnaire for Census 2021 in NI. To this end, there will be approximately 1,800 staff working in the field during the data collection operation. The vast majority of these will be Census Enumerators, who will each have responsibility for a fixed area. One of their key tasks will be to follow up all non-responding households over a period of around four weeks from late-March 2021, in an attempt to encourage participation and boost the response rate. In the event of failing to make contact with a household, the Enumerator will make further visits to increase the chance of contact. Finally, around the mid-point of the non-response follow-up period, all non-responding households will be issued with a paper questionnaire to ensure they have every opportunity to participate and fulfil their statutory duty.

In addition to households, Census 2021 needs to enumerate the population living in over 1,000 communal establishments across NI (for example, hotels, hospitals, student halls of residence). This task will be managed by a central team in NISRA headquarters. There will be a strong focus on engaging with managers of communal establishments to ensure that a response is made using the available modes. In addition, specific procedures will be put in place to capture certain population groups such as those with no settled place of residence or rough sleepers. The aim of all of these measures is to maximise the response rate, which is crucial to delivering a high-quality and successful Census 2021.

3.5 Use of administrative data in Census 2021

There will be extensive use of administrative to support the delivery of Census 2021 in NI. This has been outlined in previous reports relating to the National Statistics assessment in question, namely [How NISRA is ensuring that Census 2021 will serve the public](#) and [Response to Actionable Findings from Phase 1 of the National Statistics Accreditation](#). We also published a specific report entitled [Use of Administrative Data in the 2021 Census](#) in April 2019, which provides further detail.

Administrative data were successfully used to support aspects of Census 2011. For Census 2021, this will be built upon, while new and innovative applications of these secondary data sources will be implemented. These include:

- using data on interaction with government websites as evidence of a digital signal to enhance the Census Address Register (CAR) and enable identification of areas where there is likely to be a high take-up of the online response option;
- using utilities data to improve the CAR, for example, providing evidence that certain addresses are occupied;

- improving the removal of false persons stage of data cleansing using information from the statistical person database created from linked administrative sources to support Census 2021;
- potentially supplementing the edit and imputation stage of data processing by using the aforementioned database to replace basic demographic information that is missing from a census response, for example, date of birth, sex;
- implementing an enhanced version of the CUE approach employed in 2011 to support the coverage assessment stage of data processing, with the capability to scale up CUE as a mitigation against a lower than expected response rate;
- helping quality assure the Census 2021 population estimates; and
- supporting the production of census-type statistics on the armed forces population to satisfy user demand for information on this population group, given the exclusion of this question from Census 2021.

3.6 Data processing methods and quality assurance

The data processing methods are developing well, with the ongoing rehearsal generating valuable insights on their performance and identifying any issues that need to be resolved; the ultimate aim is to provide confidence that the methods can be successfully applied to Census 2021 response data. The Data Processing team in NISRA continues to avail of expertise and assurance from participation in method-specific working groups with colleagues in ONS and NRS. There is a Data Processing Harmonisation working group established to manage relationships between the relevant teams in the three UK Census offices, which identifies potential areas of joint working and documents synergies and differences in the way the data are processed.

We are members of the Census Research Advisory Group, which is coordinated by ONS and facilitates assessment and feedback on developed methods from specialists across the UK statistics offices and academia. Furthermore, we have availed of learning opportunities via engagement with other national statistics offices in the International Census Forum.

The response data from the Census in NI will be collected via the online and paper questionnaire systems developed by ONS. We are therefore working closely with ONS to ensure that the mechanism for the transfer of the raw response data from its processing pipeline to the NISRA platform is secure, efficient and effective. The ONS processing pipelines have been assessed and approved by various internal groups and by the external [Census Methodological Assurance Review Panel](#), which provides considerable assurance to NISRA.

Data processing for Census 2021 in NI will broadly follow the approach successfully employed for Census 2011. The main stages are:

- data cleansing
- addition of administrative data-based CUE records;
- edit and imputation;
- coverage estimation and adjustment;
- statistical disclosure control;
- release of processed and quality assured data for outputs production.

Some of the processes have been modified to cater for differences in Census 2021, primarily the promotion of online response and changes to the questionnaire. This includes:

- requesting that managers of communal establishments (CEs) provide a list of the associated residents so we have an independent source of information on expected responses from each CE;
- amending the online questionnaire and using other data sources (for example, information provided by CE managers) to counteract the acknowledged difficulty in accurately enumerating students at their term-time address;
- availing of better administrative data to enhance certain processes such as removal of false persons and the addition of CUE records;
- potentially supplement the edit and imputation stage with administrative data (for example, replace missing basic demographic information in responses using data in matched records from the statistical person database); and
- using a model-based approach to create the Hard to Count index, which is a key measure for selecting the sample areas for the Census Coverage Survey.

The second phase of the data processing rehearsal will overlap with live processing of Census 2021 responses, with the delivery of early data facilitating refinement of the various stages. Once the live processing of response data commences, the ultimate aim will be to generate a complete and statistically robust database from which to produce accurate and trustworthy Census 2021 outputs.

Quality assurance will be integrated with each stage of data processing. A key tool in this regard will be diagnostic information; this will enable detailed assessment of the response data after each stage to ensure that the process has run as expected and not introduced any anomalies.

In addition to the QA activities specific to data processing, there is a strong QA focus underlying all elements of the Census 2021 programme; further detail is available in the [QA strategy](#). The Census Quality Survey (CQS) is another QA mechanism, having been undertaken in the last two censuses to estimate the level of respondent error and provide an insight on the overall quality of the information collected. We are currently working with ONS to consider the benefit of undertaking a CQS for Census 2021 and the potential approaches for conducting such a survey should it be deemed necessary.

3.7 Outputs development

Consultations and active engagement with users up to and beyond Census 2021 will ensure NISRA is well informed of user requirements regarding outputs. The Census 2021 Outputs Strategy consultation, conducted in 2018, generated valuable user feedback that NISRA will use to shape the design and delivery of NI outputs that are coherent and accessible; the consultation report will be published in the first quarter of 2021.

Our proposed dissemination plans for Census 2021 outputs will be detailed in a future user consultation, scheduled for summer 2021. Where appropriate, questions relating to UK data will be harmonised with England and Wales' equivalent consultation. In late 2021 or early 2022, NISRA plans to produce an outputs prospectus, including a proposed release schedule.

Key principles for NISRA are to produce statistical outputs that will meet user information needs and will be both timely and flexible. The first publication of outputs is scheduled for 2022. Census outputs will be easily located and accessed through a dedicated website, with a proposed facility for users to filter and summarise data that have been appropriately protected from a statistical disclosure control perspective.

3.8 Geography

NISRA plans to retain Small Area (SA) and Super Output Area (SOA) as the base geography for the reporting of Census 2021 statistics. Work is underway to update the existing SAs and SOAs from the previous census to make them fit-for-purpose. The main focus is on realigning boundaries to ensure the broad population and household thresholds used in their original development are maintained; this is necessary in areas that have experienced high population growth over the past decade. User demand for comparability with the base geographies used in Census 2011 is an important consideration.

We intend to retain other existing geographies from Census 2011, namely Travel to Work Areas and Workplace Zones. In addition, we plan to produce grid square statistics for both 100m and 1km grids, building upon the lengthy time series of these data that stretches back to the census held in 1971.

The findings from the ONS Census 2021 Output Geography Policy, products and services [consultation](#), held in late 2020, will be of interest. Although it has an England and Wales focus, it will provide a valuable insight on the views and requirements of users from the geography perspective of Census 2021.

3.9 Assurance of Census 2021

As outlined in section 2.3, NISRA has established robust assurance mechanisms to monitor the performance of the Census 2021 programme. The COVID-19 pandemic presents considerable challenges to the successful delivery of the Census, from the impact on suppliers' workplaces and staff, through to the capacity of the field force to engage with households and promote participation.

As we share many of the census systems and services with ONS, we have contributed to the series of COVID-19 readiness assessments they have conducted over the past number of months, the most recent of which took place in December 2020. Internally, NISRA maintains a formal risk register, which facilitates management of risks in a vigilant and effective way to assist in timely decision making. We have also established a comprehensive Incident Management Plan; this prepares us for responding to unexpected incidents during the operational phase, with the aim of minimising adverse impacts on Census 2021.

4. Next steps

For Phase 2 of the Census 2021 assessment, OSR will use this report as evidence, as well as other documentation in the public domain. As part of the process, OSR will continue to engage with the UK Census offices to receive updates on progress of Census 2021. There will also be a consultation to enable OSR gather users and stakeholders' views and experiences of Census 2021 in NI.

The intention of OSR is to publish its assessment on the UK Statistics Authority website in autumn 2021. The assessment report will include requirements that we will need to take forward and address. Towards the end of 2021, we aim to publish an update outlining how we have responded to the OSR requirements, to keep users informed.

At the end of the Phase 2 assessment period, OSR will consider whether the NI Census 2021 can retain the badge of National Statistics accreditation. If we are successful, our accreditation will be confirmed before the first Census outputs are released in 2022.