

# **Technical Report of the 1970 British Cohort Study: 2008- 2009 Survey**

Authors: Elizabeth Hacker, Reg Gatenby, Caroline Killpack, Suneeta Bhamra, Chris Larkin and Carli Lessof

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# 1 Introduction

## 1.1 The 1970 British Cohort Study

The 1970 British Cohort Study (BCS70) is one of Britain's world famous national longitudinal birth cohort studies, three of which are run by the Centre for Longitudinal Studies at the Institute of Education, University of London.

Britain has a unique tradition of carrying out national birth cohort studies, following the same group of people from birth into and through adulthood, and providing a picture of whole generations. There are four such surveys, of which the BCS70 is the third:

- National Survey of Health and Development (started in 1946)
- National Child Development Study (started in 1958)
- 1970 British Cohort Study (started in 1970)
- Millennium Cohort Study (started in 2000)

Each follows a large number of individuals born at a particular time through the course of their lives, charting the effects of events and circumstances in early life on outcomes and achievements later on. The questions on health, education, family, employment and so on are put together by academic researchers and policy makers to understand and improve life in Britain today and in the future.

## 1.2 Background to the study

BCS70 began when data were collected about the births and families of 17,287 babies born in the UK during one week in April 1970. Since then, there have been six surveys gathering information from respondents living in England, Scotland and Wales<sup>1</sup>. With each successive attempt, the scope of enquiry has broadened from a strictly medical focus at birth, to encompass physical and educational development at age five (1975), physical, educational and social development at ages ten (1980) and sixteen (1986), and then to include economic development and other wider factors at age 26 (1996), 30 (1999/2000) and 34 (2004/2005). At age 34 (2004/2005), cohort members' basic skills (literacy and numeracy) were also assessed. In addition, there have been studies of sub-samples of the cohort, for example, in 1991/1992 a 10% representative sub-sample was assessed for difficulties with basic skills. Most recently, in 2004, for a one-in-two sample of BCS70 cohort members, information was gathered from and about all natural and adopted children living with them.

Data for BCS70 have so far been collected from a number of different sources (the midwife present at birth, parents of the cohort members, head and class teachers, school health service personnel and the cohort members themselves). Data have also been collected in a variety of ways (paper and electronic questionnaires, clinical records, medical examinations, physical measurements, tests of ability, educational assessments and diaries).<sup>2</sup> The latest sweep was conducted for the first time as a telephone interview (CATI<sup>3</sup>).

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<sup>1</sup> Including the Channel Islands, Isle of Man and other offshore islands.

<sup>2</sup> Further information on the BCS70 sweeps can be found in Butler, N.R., Golding, J. and Howlett, B.C. (1986) *From Birth to Five: A Study of the Health and Behaviour of Britain's Five year olds*. Oxford: Pergamon Press; Bynner, J., Ferri, E.,

The Centre for Longitudinal Studies (CLS) at the Institute of Education, University of London (and formerly the Social Statistics Research Unit at City University), has been responsible for the study since 1991. The study is funded by the ESRC (the Economic and Social Research Council). NatCen in collaboration with CLS were responsible for the development, fieldwork and initial data preparation for the 1999/2000 survey and the 2004/2005 survey<sup>4</sup>.

### **1.3 Current sweep**

Following competitive tender, the Centre for Longitudinal Studies, commissioned the National Centre for Social Research (NatCen) to carry out the instrument development, data collection and initial data preparation for the 2008/9 sweep of the BCS70.

This report provides an account of the design, development and conduct of the seventh follow-up survey which took place in 2008/9.

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and Shepherd, P. (1997) *Twenty-something in the 90s: Getting on, Getting by; Getting Nowhere*. Aldershot: Dartmouth Press; Bynner, J., Ferri, E. and Wadsworth, M. (2003) (eds), *Changing Britain, Changing Lives: Three Generations at the End of the Century*. London: Institute of Education. Information can also be found on the CLS website <http://www.cls.ioe.ac.uk>

<sup>3</sup> CATI stands for Computer Assisted Telephone Interview

<sup>4</sup> The bio-medical survey involved collaboration between the Institute of Child Health, St George's Hospital Medical School, the Centre for Longitudinal Studies and the National Centre for Social Research.

## 2 Sample Design

### 2.1 Introduction

The BCS70 selected all babies born in the UK during one week in April 1970. In later sweeps, the cohort was augmented by additional children who were born outside Great Britain, but within the target week in 1970, and subsequently moved to and were educated within Britain. Individuals from Northern Ireland, who had been included in the birth survey, were dropped from the study in subsequent sweeps.

The issued sample for the 2008/9 survey consisted of 11,843 cohort members and was comprised of three groups:

- Those who had participated in the 1999/2000 sweep or the 2004/5 sweep and had not subsequently died, emigrated or permanently withdrawn from the study (n=10,926).
- Those who had not participated in any of the above but had personally confirmed their address by responding to a birthday card mailing or in some other fashion since 2000 (n=653).
- Those who had not participated in any of the above but for whom recent contact details had recently been obtained via a tracing exercises conducted in collaboration with the Department of Work and Pensions (DWP) (n=264).

The cases which were not issued were those who had previously indicated that they wished to permanently withdraw from the study, those who have emigrated, those who have died, those for whom no contact details had been confirmed or collected since 2000 and those who had either been interviewed in the Dress Rehearsal or had been approached during the Dress Rehearsal but refused to participate.

The majority of the issued sample (79%) had participated in a face-to-face interview in 2004/2005, but the sample did include cohort members who had either never been interviewed in person (<1%) or had not participated in the study for a significant length of time (see Table 2.1)

**Table 2.1 BCS8 Sample by last sweep cohort member participated in**

Sweep last participated in	No. of cohort	
	members	%
BCS 2004	9314	78.6
BCS 2000	1635	13.8
BCS 1996	281	2.4
BCS 1986	227	1.9
BCS 1980	27	<1
BCS 1975	16	<1
BCS 1970	18	<1
21 Year sub-study (1991)	325	2.7
<i>Total</i>	<i>11,843</i>	<i>100%</i>



## 2.2 Sample structure

The sample was divided into two batches: the first batch contained 11,579 cases which had confirmed or satisfactory contact information when the initial sample file was delivered in advance of fieldwork in June 2008; the second batch was delivered in December 2008 and was comprised of the 264 cases mentioned above for whom recent contact information had been obtained via tracing exercises conducted in collaboration with the DWP. Although the DWP tracing exercise lead to CLS being provided with updated *addresses* for many cohort members they had not been in touch with some time it was not possible to issue most of these cases because the fact that the survey was being conducted via telephone meant that updated telephone numbers were also required.

There were three cases which were issued in error as part of the second batch of sample, having been issued previously in the first batch. The duplicate cases in the second batch were coded as outcome code 730 (Ineligible - issued in error).

## 2.3 Serial number

Each BCS70 cohort member has a unique serial number that was allocated at the beginning of the study in 1970. In order to facilitate fieldwork management and data processing, and to increase confidentiality, each cohort member in the issued sample was allocated a unique NatCen serial number, specific to this sweep of fieldwork. The NatCen serial number was used on the advance letter.

## 2.4 Allocating the sample to waves

To manage fieldwork, the sample was allocated to five fieldwork waves. The first two waves covered 60% of the sample, and contained a greater proportion of cases expected to be more difficult to contact (e.g. they had not been interviewed in the last sweep of fieldwork or there were fewer contact telephone numbers available). The fifth wave, made up of cases with updated contact information from DWP (batch 2 cases), contained only 2% of the sample. Fieldwork waves were released every four weeks, although wave 5 ran parallel to wave 3 and 4.

## 2.5 The sample files

CLS was responsible for providing sample information for cohort members that are part of the 1970 British Cohort Study to NatCen and for ensuring that this information was as accurate and up-to-date as possible.

The sample information that was provided to NatCen was split into two types: fixed sample, and live sample. The fixed sample files contained details of all sample members, and contained information that was not subject to change, such as:

- Serial numbers
- Survey outcome from previous sweep

- Information from previous sweep, such as:
  - Date and time of last interview
  - Address at last interview
  - Number of household members
  - Number of children in the household

The live sample file contained information that could change and needed to be as up-to-date as possible. Live sample files were produced for each wave, and included the following information:

- Serial numbers
- Survey status code
- Cohort member details
  - Full name
  - Sex
- Contact details
  - The last known address and telephone numbers for the household
  - Stable address details, i.e. the contact details of another family member or friend not resident in the household which could be used for tracing if required
  - Up to seven additional telephone numbers which could be used for tracing if required

Two additional fields relating to contact details were also given: an address status, and the date this status was assigned. The address status was determined by CLS, and related to whether or not the cohort member was confirmed as resident at the address provided, and the date at which this was confirmed.

### **2.5.1 Delivery of sample files to NatCen**

The fixed sample file was delivered to NatCen twelve weeks before the start of fieldwork and contained all cases 17,511 ever included in the study. The live sample file for the first batch of cases was delivered six weeks before the start of fieldwork. For the second batch of cases, the live sample file was delivered two months after fieldwork began, once the data was received by DWP, and was then issued by NatCen six weeks later.

Once the sample was delivered to NatCen it was used to produce the advance letters. The information was also loaded into the CATI programme.

### **2.5.2 Other sample information**

In addition to the fixed and live sample files, a single ‘feed-forward’ file was also delivered to NatCen before the start of fieldwork. This contained the answers cohort members had given to some questions in previous interviews. Like the fixed sample file, this file contained all cases ever included in the study.

The answers were loaded or ‘fed-forward’ into the current CATI questionnaire. For example, the cohort member’s previous job title and economic activity was fed forward and the respondent was asked if that was still their job.

As well as information from previous interviews being added to question text, it was also used in question routing. For example, a question such as, 'Is your mother still alive?' would be routed past if the cohort member had said at a previous interview that their mother had died.

## **2.6 Sample updates**

CLS continued to trace cohort members until the start of fieldwork for each wave. In some cases CLS received information about cohort members after the sample had been sent to NatCen. CLS would begin sending sample updates six weeks before each wave of fieldwork began. If updated information was sent six weeks before the wave began, NatCen were able to use this for the advance letters and to incorporate the data into the CATI for the forthcoming wave. CLS continued sending updates on a weekly basis for all waves that were underway.

The sample updates consisted of three types:

- Changes in classification information: eligibility status, participation status, status of address
- Changes to contact information: change of address, telephone numbers, names, sex, dates of birth, stable address details, etc
- Other information useful for contacting and tracing

The action taken as a result of the sample updates depended on the type of sample update and the progress of the case, that is whether interviewers had already worked on a case or not. For details of how sample updates were handled by NatCen, please see section 5.9.

## **2.7 Return of sample to CLS at end of fieldwork**

NatCen was responsible for updating contact information for cohort members that were interviewed at this sweep of fieldwork and transferring this updated information to CLS at the end of fieldwork. Updated contact information was also supplied, where possible, for cases who were not interviewed at this sweep.

## 3 Overview of the elements of the study

The 2008 sweep of the 1970 British Cohort Study comprised of a 25 minute telephone interview (CATI). Proxy interviews were not permitted for this round of interviewing.

The CATI interview included the following elements:

- Household composition
- Absent children
- Housing
- Relationship history
- Other relationships
- Births
- Adopted children
- Family and social relationships and support
- Family income
- Employment
- Partner's employment
- Qualifications
- Health
- Smoking and drinking
- Collection of contact information
- Collection of contact information for Parents Study

This chapter contains a brief description of the elements of the study. Details of the development work for the study are contained in Chapter 4.

### 3.1 CATI interview

The main stage CATI survey took approximately 25 minutes to complete and aimed to update information on the cohort member's circumstances and key events in their lives. The time period which the questions referred to depended on when the cohort member was last interviewed. This is discussed in greater detail below. The majority of questions in the interview were asked in earlier sweeps of BCS70 and in NCDS which allows comparisons to be made across the BCS70 sweeps and with the NCDS cohort.

#### 3.1.1 Event histories

The CATI interview includes four event history modules: Housing, Relationship history, Births and Employment. These modules ask cohort members to update their situation in these areas from a point set by the CATI program.

Cohort members interviewed **since** 1<sup>st</sup> October 1999 (i.e. in sweep 6 (2004 – 2005) and/or sweep 7 (1999 – 2000) of BCS70) were asked to update their situation from the date of their last interview.

Cohort members who had not been interviewed since 1<sup>st</sup> October 1999 (and may never have been interviewed) were asked to update their situation from a set start point, the 1<sup>st</sup> January 2000, for all modules except the Births module. For the Births module, these cohort members were asked to update their situation from the date of their sixteenth birthday.

For this sweep of BCS70, forward recall was employed for all the event histories. Research into how respondents best recall life events conducted on other NatCen longitudinal studies, found that most respondents prefer to recall events in chronological order and feel that this is how they best remember their life histories. As a result this approach was adopted to improve the accuracy of data collected in these sections of the study.

As well as updating circumstances from a set start point, the Relationship History module was designed to improve the quality of data in this domain from the previous sweep of the study, where this was necessary. Post-fieldwork editing and cleaning of the relationship history data collected in the previous sweep of the study (the 2004-5 follow-up) revealed that there were a number of problems with the routing of the questions in this module which lead to flaws in the information obtained about the period between the 1999/2000 follow-up and the 2004/5 follow-up. Cases which were affected by these errors were flagged as 'repair cases' and a revised introduction to the relationship history module was triggered which explained that when interviewed in 2004/5 there was a problem with the data that was collected about their relationship history and that as a result it was necessary to recollect some information. These cohort members were then asked for a full relationship history from the date of their 1999/2000 follow-up interview through to the date of their 2008/2009 follow-up interview.

### **3.1.2 Collection of contact information**

The Contacts block was placed at the end of a productive interview with the cohort member. Cohort members were asked to confirm or update their full name, their telephone (home, work, mobile and extra) numbers, address and email address details. They were also asked to provide details of a stable contact who could be approached should contact be lost with the cohort member in the future. The block allowed interviewers to enter these updates directly into the CATI at the time of interview (rather than in the interviewers' admin block post-interview).

### **3.1.3 Collection of contact information for the Parents Study**

Cohort members with living parents were told of a potential follow up research project with the parents of BCS70 cohort members. Cohort members were asked permission for CLS to contact their parents and to confirm their parents' contact details, so that they could be approached to be involved in a prospective research project looking at inter-generational transfers.

## 4 Development Work

### 4.1 Scope of the development work

The development stage of BCS70 was conducted over a five month period from March to July 2008.

The BCS70 CATI was essentially a cut down version of the 60 minute NCDS face to face interview. The questions, content and structure of the two questionnaires were very similar with only a small minority of questions included in BCS70 differing from those in NCDS. The NCDS pilot took place before the development stage of BCS70 began, meaning that the basic structure, content and flow of the instrument had already been thoroughly tested. Therefore, the NCDS pilot acted as a substitute for a BCS70 pilot and development work for BCS70 focused instead on a dress rehearsal which tested how well the questionnaire worked as a CATI, and ensured the procedures and interviewer instructions were suited to a telephone interview. The dress rehearsal also ensured that the questions and survey documents were appropriate for the 1970 cohort and tested the interview length. In addition, the sample management, contact and tracing procedures were developed for the Telephone Unit.

### 4.2 Dress rehearsal

#### 4.2.1 Objectives

The dress rehearsal survey took place in June 2008. The main aims were to:

- Test the questions and accompanying procedures for the CATI questionnaire, especially to look at how well the flow, content and instructions translated to a CATI interview.
- Estimate the length of the interview.
- Test the use of feed forward data in the CATI.
- Test the protocols for contacting and tracing cohort members in the Telephone Unit.
- Test the procedures for governing the exchange of sample updates between the organisations.
- Test the wording of the advance letter and other materials as well as the use of sample data for survey documents.

#### 4.2.2 Elements included in the dress rehearsal

The first element of the CATI was the household grid, which was used to confirm and update the information currently known about the cohort member and their household. The interview then updated information on the following topics:

- Housing
- Relationships
- Other relationships
- Births
- Adopted children
- Absent children
- Family and social relationships and support
- Family income

- Employment
- Partner's employment
- Qualifications
- Computer Use
- Health
- Smoking and drinking
- Social Participation
- Social Support
- Citizenship, attitudes and values

At the end of the interview, cohort members were asked to update their contact information. Proxy interviews were not allowed.

### 4.2.3 Dress rehearsal briefing and fieldwork

Fieldwork was undertaken by NatCen's Telephone Unit. A group of 10 telephone interviewers were briefed by NatCen researchers, with contributions from the CLS research team. There was a half day briefing and a half day de-briefing.

The pilot was carried out from the 2<sup>nd</sup> June and concluded with a de-brief on 29<sup>th</sup> June 2008.

Advance letters and survey leaflets were sent to cohort members approximately one week before the dress rehearsal started. The letters were printed on BCS70 headed paper and were signed by Jane Elliott and Matt Brown. The advance letter did not mention that this was a dress rehearsal study.

### 4.2.4 Pilot sample

The dress rehearsal used a named sample of 181 cohort members living in Great Britain.

The questions that cohort members were routed to in the CATI were often determined by when they were last interviewed (see section 3.1.1). To ensure that the key routes of the questionnaire were thoroughly tested, the sweep the cohort member was last interviewed in (i.e. a sweep before 2000, or, sweep 6 (1999/2000) or sweep 7 (2004-2005)), was the primary sampling criteria for the dress rehearsal. The sample was fairly evenly divided between those last interviewed in sweep 6 and/or 7 (56%), and cohort members last interviewed in a sweep before 2000 (46%).

The mode of interview (CATI) offered greater opportunities to test the less typical routes which could not be fully tested in the NCDS dress rehearsal due to the geographical restrictions necessary when selecting a sample for face to face interviewing by a relatively small number of interviewers. As a result, a number of secondary sampling criteria were included. The first was to select cohort members who, due to questionnaire error at the previous sweep of BCS70, had incomplete relationship histories that needed to be repaired at this sweep of the study (see section 3.1.1). These cohort members were routed to a specific set of questions in the relationship history module that needed to be tested. In addition, cohort members with more complex relationship histories and less common event histories were prioritised to ensure that the questions asked were appropriate.

### **Response**

A total of 95 productive CATI interviews were achieved during the fieldwork period. This exceeded the expected target of 85 productive interviews. Of those interviewed, 58% were female and 42% were male. The sample was evenly split between those who were interviewed in the previous two

sweeps of BCS70 (54% of cases) and cohort members last interviewed before sweep 6 (46% of cases), ensuring that the two main routes in the questionnaire were thoroughly tested. Furthermore, 27 cohort members had incomplete relationship histories enabling the questions in the Relationship history module designed to repair these incomplete histories to be tested.

## 4.3 Key findings and changes

### Overview

Feedback received from interviewers and cohort members about the dress rehearsal study was generally very positive. The dress rehearsal and subsequent data checking showed there were no major problems with the CATI. However, there were some relatively minor changes required to make the questionnaire more suitable for a telephone interview, and for the 1970 cohort. Substantial cuts were required due to the overly long interview. Significant changes were also required to the contact and tracing procedures, particularly to improve the documenting of this process.

### Length

The CATI questionnaire exceeded the target length of 20 minutes by 18 minutes, with a median of 38 minutes. Feedback from interviewers suggested that the interview was a comfortable length for a CATI and there were no complaints about the interview being overly long or burdensome. Interview length did vary considerably: the inter-quartile range was 26 to 46 minutes. This can be explained by the impact that the extent of change in a respondent's circumstances had on length. As expected (because circumstances had to be updated from over a longer period), interviews were longer for cohort members not interviewed in the previous two sweeps of the study: a median of 41 minutes compared to 34 minutes for those cohort member last interviewed in 2004.

The interview timings were weighted to account for the different sample make up at the main stage of the study where the proportion of cases not interviewed in the previous two sweeps would be much smaller (approximately 9% of cases compared to 46% at the dress rehearsal). The interview length still exceeded the target by almost fifteen minutes with a median of 34.6 minutes.

The longest modules were employment (5.8 minutes), housing (2.6 minutes) and health (2.5 minutes). It also took an average of over 3 minutes to collect or update cohort members' contact details.

### CATI

The CATI interview was well received by cohort members who did not find it overly burdensome. There were some minor amendments required to interviewer instructions, routing and question text. Interviewers did feel that the flow of the interview could be improved and thought that reading out long code frames slowed the interview down and was repetitive. The consistency checks in the program also affected the interview flow and could be difficult to resolve whilst speaking with the cohort member on the telephone. At the dress rehearsal, cohort members were sent only one show card (a list of qualifications for the variables WhatQual) along with the advance letter. Interviewers suggested including additional show cards to reduce the time taken to read long code frames. At the main stage of fieldwork two additional show cards were included: a list of health conditions for variable KhLPrb and a list of economic activities for variables Activity and PEconAct.



Interviewers noted that some questions were sensitive and some cohort members found them difficult to answer. The pregnancies block was mentioned in particular.

### **Contact procedure**

Contact procedures worked well at the dress rehearsal, with a low number of refusals (6 cases). However, the dress rehearsal showed that improvements were required to the contact and tracing procedures. This included: making the dial screen (the CATI ARF equivalent where sample information is displayed and calls are recorded) more fit for purpose so that call histories for all numbers could be entered in a more standardised way and updates to contact information could be more clearly recorded; improving the quality and scope of the information provided to CLS for unproductive cases (particularly non-contacts); and refining the outcome codes, particularly for non-contacts so that the type of non-contact could be clearly identified.

### **Movers and tracing**

Interviewers were expected to make reasonable attempts to contact the cohort member, meaning a minimum of twelve call attempts. If a cohort member could not be contacted on the telephone number(s) provided or they had moved, interviewers were required to start tracing the cohort member. If available, the stable contact details and up to seven additional contact numbers associated with the cohort member were provided on the dial screen. Interviewers were instructed by supervisors to begin using these numbers once it was clear that the cohort member could not be contacted using the cohort member's personal contact information. If the interviewer found that the cohort member had moved, they were prompted to ask the person they spoke to for their new address and telephone number and to record this in the CATI. If the Cohort Member could not be contacted using the tracing contact information available, a supervisor flagged the case so that it was returned to CLS for further tracing by the Tracing Unit.

CLS used the information recorded by interviewers on the dial screen to help them further trace non-contact cases. There were only 15 cases which required further tracing by CLS. The dress rehearsal highlighted the fact that the information recorded on the dial screen was of limited use: the call histories were not recorded in a standardised way and it was difficult for CLS to establish what work had already been carried out to trace a case. In addition, because some outcome codes were telephone level outcomes, rather than case level, they were not fit for purpose on a study where multiple numbers for each case are common. In order to avoid duplicating NatCen telephone interviewer's efforts, the design of the dial screen, the non-contact block and outcome codes was reconsidered (see sections 5.5 and 5.6).

### **Sample updates**

Although update files and mover files were exchanged during dress rehearsal fieldwork, the very small number of updates and movers meant the dress rehearsal did not provide a fully rigorous test of this procedure.

### **Survey materials**

The advance letter was well received and only minor changes were required to the leaflet and advance letter (including the addition of the office hours for making contact with CLS or NatCen's operation department).

Some interviewers noted that the calendar was not used by cohort members during the interview and that not all cohort members had the show cards available. However, interviewers did feel that for some questions with particularly long code frames, additional show cards would be useful. Two additional show cards were included so that three show cards were sent to cohort members with the advance letter, leaflet and calendar during the main stage of fieldwork.

## 5 Conduct of Fieldwork

The main stage of BCS70 fieldwork took place between 9<sup>th</sup> October 2008 and 9<sup>th</sup> May 2009. Fieldwork was carried out by telephone interviewers at NatCen's Telephone Unit in Brentwood, Essex.

### 5.1 Interviewer briefings

Four half-day briefings were held at the NatCen Telephone Unit over two consecutive days, starting on 8<sup>th</sup> October 2008. One further briefing was held in February. In addition to interviewer briefings, a separate briefing was conducted for supervisors to advise them on completing the admin block. In total 50 telephone interviewers were briefed to work on the survey. The briefings were led by researchers from NatCen with contributions from the CLS research team. Interviewers were provided with full written project instructions to supplement the briefing.

The briefings covered the background to the BCS70, the purpose of this sweep of the survey, the study documents and contact and tracing procedures. A dummy interview was completed and a section was included instructing interviewers on how to update contact information. Before beginning work on the project, interviewers completed at least two practice interviews immediately after the briefing. A supervisor was present while interviewers practiced and they were encouraged to ask questions on matters they were unclear about. All interviewers who worked on the BCS70 survey were supervised during every shift.

The briefing schedule is outlined below:

<b>BCS70 Briefing schedule</b>
<b>Overview of the 1970 British Cohort Study</b>
➤ Background to study and aims of current sweep (CLS)
<b>The sample</b>
➤ Issue of work
➤ Who the cohort members are
<b>Contacting cohort members and tracing</b>
➤ The Dial Screen
➤ Recording contact attempts and updates
➤ Tracing
<b>Questionnaire (CATI) structure</b>
➤ Overview of content
➤ Routes through the questionnaire
➤ Event histories
➤ Practice taking measurements in small groups
<b>Dummy interview</b>
➤ Main interview
➤ Updating contact information
➤ Admin block
<b>Practice sessions</b>

## 5.2 Materials for interviewers

Advance letters and the accompanying documents were sent to cohort members from the Operations Department at NatCen. Telephone interviewers were not responsible for sending any materials to cohort members. They were provided with copies of the advance letter, survey leaflet, show cards and calendar to help them when contacting cohort members and to ensure they were aware of what materials cohort members had been provided with. Interviewers were also given detailed interviewer project instructions which they were required to read before they began work on the project.

## 5.3 Issuing sample to interviewers

The sample was comprised of 11,843 cohort members (see section 2.1 for more details). The sample was issued in five waves between 9<sup>th</sup> October 2008 and 2<sup>nd</sup> February 2009 (see Table 5.1).

In each live wave, cases were selected by the Telephone Unit's automated call scheduler. The call scheduler is an automated system which assigns a case to an interviewer. When the interviewer receives a case, attempts are made to contact and interview the cohort member. If contact is made and a final outcome can be assigned, for example, if contact results in a productive interview or the cohort member refuses to take part, the case will no longer be selected by the call scheduler. If a final outcome cannot be assigned, either because contact cannot be made or the cohort member wishes to take part at a later date, the case will not be assigned a final outcome, allowing the call scheduler to select the case again in the future. If the cohort member does not wish to take part until a certain date or makes an appointment to be interviewed, interviewers can schedule an appointment and the call scheduler will automatically select the case at the specified time and date.

**Table 5.1** Schedule of fieldwork issue

Wave	Date advance letters posted	Date fieldwork started	No. of cohort Members
1	29 <sup>th</sup> September	8 <sup>th</sup> October	3474
2	6 <sup>th</sup> November	10 <sup>th</sup> November	3473
3	11 <sup>th</sup> December	15 <sup>th</sup> December	2315
4	29 <sup>th</sup> January	2 <sup>nd</sup> February	2316
5	8 <sup>th</sup> January	12 <sup>th</sup> January	265
<i>Total</i>			<i>11,843</i>

### 5.3.1 CATI dial screen

A CATI dial screen was generated for each case using data provided by CLS in the sample files. The dial screen contained all the information required for interviewers to prepare for the interview and to contact and/or trace the cohort member. The following information was provided:

- Cohort member information
  - Name
  - Serial number
  - Gender

- Whether the cohort member has sight, hearing, learning, reading, speech or physical disabilities/ difficulties or is deaf or blind
- Date and outcome of last interview
- Cohort member contact details
  - Address
  - Telephone numbers (home, work, mobile and telephone number found through AFD matching by NatCen)
- Tracing information
  - Stable contact
  - Additional tracing telephone numbers (up to seven)

Interviewers were advised that dial screen information was confidential and for their own use only, and should not be discussed with the cohort member or anyone else.

## **5.4 Pre-notification of cohort members**

Cohort members were not sent a pre-notification letter by CLS before the start of fieldwork.

## **5.5 Contact procedures**

### **5.5.1 Advance letters**

The advance letter was sent to cohort members by NatCen's Operations Department. The advance letter was printed on BCS70 letterhead, and signed by Jane Elliott and Matt Brown. It included the cohort member's name, the NatCen serial number and NatCen project number.

The letter introduced the current wave of the survey, explained NatCen's role and asked for the cohort member's continued participation in the study. The letter explained that this sweep of the study would be conducted by telephone and that an interviewer would be in touch shortly to invite them to take part. The NatCen freephone number was included so that cohort members could leave a message for the Telephone Unit, stating their preferred time to be contacted. A CLS freephone number and email address was also provided in case cohort members had further queries about the study. Cohort members were sent a leaflet with the advance letter, which contained general information about the study and outlined what the latest sweep involved in more detail.

In order to aid the cohort member's recall of events since their last interview, a calendar was printed on the back of the advance letter. Interviewers also had a copy of this calendar. Cohort members were encouraged to use the calendar during the interview.

Cohort members were also sent three show cards with the advance letter. These were to be used during the interview to help with questions which had particularly long, difficult or sensitive codeframes. Show card A contained a list of economic activities for variables Activity and PEconAct, show card B, a list of qualifications for WhatQual and show card C contained a list of health conditions for variable KhLprb.

For cohort members living in Wales, the Welsh translation was provided on the back of the advance letter.

Copies of these documents can be found in the appendix.

## **5.5.2 Recording contact attempts on the CATI dial screen**

The CATI dial screen enabled interviewers to record their attempts to contact the cohort member and any other relevant information. Every attempt at contacting the cohort member was recorded in the appropriate field on the dial screen for each telephone number (e.g. home, work, mobile, extra number) the interviewer called. Interviewers were instructed to write as much information as possible in the 'notes' fields beneath each telephone number, including the time, date and outcome of the call. This provided a call history for each number so that interviewers knew if a number was ineffective and could ensure that each number was tried on multiple occasions at different times of the day and on different days of the week.

Interviewers were told to make a minimum of twelve attempts to contact the cohort member at different times of the day and on different days of the week. If cohort members were not available for interview within a reasonable period, they were deferred and re-contacted at a later stage in the fieldwork. If they found the cohort member had moved or were unable to make contact on the telephone numbers provided, they attempted to obtain their new telephone number and, if possible, their new address by speaking to the current residents, the stable contact or attempting the additional tracing numbers provided by CLS that were displayed on the dial screen if available (see section 5.6).

## **5.6 Tracing procedures**

Telephone Unit supervisors monitored automated call records and the call history notes made by interviewers. If no contact with the cohort member had been made once the telephone numbers were tried a sufficient number of times or the numbers were unobtainable, the supervisor indicated on the dial screen that the cohort member needed to be traced. Interviewers would then begin tracing the cohort member using the tracing information provided on the dial screen. As well as using the extra tracing numbers and attempting to contact the stable contact, tracing activities included using matching software to attempt to find telephone numbers for cases which either (a) had no valid telephone number when issued, but did have a valid address & postcode or (b) cases where a new address (but no telephone number) was found during contact and/or tracing attempts.

If the cohort member could not be traced, supervisors would assign the appropriate non-contact outcome code to the case and record useful information for tracing from the dial screen in a specially designed admin block. This included a call history for each number associated with the cohort member, an outcome code for each number, any updates to the contact information found by CLS or Telephone Unit interviewers, and any other information that would be useful for further tracing. On a weekly basis, the cases assigned with a non-contact outcome were referred to the CLS tracing unit who used the tracing information, as well as additional information recorded on the BCS70 address database and various other sources, to attempt to find the cohort member's new contact details. There were two types of non-contact cases: cases which were definitely not contactable on the telephone numbers provided (e.g. incorrect number(s)); and cases where at least one number was or could be associated with the cohort member, and therefore the cohort member could potentially be contacted using the existing numbers (e.g. contact made with a household member but the cohort member is never available). Cases where the numbers provided were not associated with the cohort members were prioritised by CLS.

If tracing attempts were successful, the updated contact information was sent to the NatCen Telephone Unit. Supervisors entered this information on the dial screen in the appropriate 'update' field (e.g. if an update to the home telephone number was provided, this was entered in the 'Home Update' field). When an interviewer next worked on the case, the new contact information would be clearly visible and they would attempt to make contact using the updated information.

## **5.7 Making appointments**

If a cohort member wanted to participate but was unable to take part when initially contacted, the interviewer would try to make an appointment for a time that suited the cohort member. The CATI call scheduler allowed interviewers to schedule future appointments when necessary. When an appointment was made, the case was selected at the specified time and date so that the interviewer could contact the respondent. Interviewers were advised to try to arrange the appointment for the earliest possible date in the fieldwork wave.

If the cohort member contacted the Telephone Unit's freephone number and left a message stating a convenient time to be contacted, supervisors would schedule an appointment for the time and date specified to ensure that the appointment was honoured.

## **5.8 Unproductive cases**

The course of action taken when cases were assigned unproductive outcomes was dependent on the type of unproductive outcome:

- Refusals: when interviewers assigned a refusal outcome code they were routed to a series of follow up questions in the admin block asking whether the cohort member wanted to permanently withdraw from the study and the reasons for the refusal.
- Ineligible: if a case was assigned a 'died' or 'emigrated' outcome code, interviewers were required to record who had provided this information.
- Non-contacts: supervisors reviewed the call histories recorded on the dial screen and assigned a non-contact outcome if appropriate. Supervisors then completed the admin block by entering a call history for each number associated with the untraced cohort member, an outcome code for each number, any updates to the contact information found by CLS or the tracing unit, and any other information that would be useful for further tracing. This information was then transferred to the CLS tracing unit in the weekly 'mover' file (see section 5.6).

## **5.9 Sample management during fieldwork**

CLS continued to trace cohort members until the start of fieldwork for each wave. In some cases, CLS received information about cohort members after the sample had been sent to NatCen. CLS would begin sending sample updates six weeks before each wave of fieldwork began. If updated information was sent six weeks before, Natcen were able to use this for the advance letters and to incorporate the data into the CATI for the forthcoming wave. CLS continued sending updates on a weekly basis (every Tuesday) for all waves that were underway.

These sample updates consisted of three types:

- Changes in classification information: eligibility status, participation status, status of address
- Changes to contact information: change of address, telephone numbers, names, sex, dates of birth, stable address details etc.
- Other information used for tracing

The action taken as a result of the sample updates depended on the type of sample update and the progress of the case, that is whether the interviewers had already worked on a case or not.

Table 5.2 summarises the actions taken by NatCen's Telephone Unit as a result of sample updates from CLS.

Changes to other contact information, such as names, sex, dates of birth, etc. were not normally notified to NatCen.

Respondents sometimes contacted NatCen's head office, Telephone Unit or Operations Department with information. This information was handled in the same way as the sample updates from CLS.



**Table 5.2 Actions taken as a result of sample updates**

Type of update	Not yet issued by NatCen's Telephone Unit	Issued to NatCen's Telephone Unit but final outcome not yet assigned	Issued to NatCen's Telephone Unit and final outcome assigned by interviewer
<b>Change in eligibility status, i.e. death or emigration of cohort member</b>	Telephone Unit supervisor assigned the appropriate outcome code, and the case was not issued.	Telephone Unit supervisor assigned the appropriate outcome code. This meant the call scheduler would not select the case to be worked on by interviewers.	If the case had been assigned a productive outcome code, no action was taken.  If the case had been returned with an unproductive outcome code, a new survey outcome code was assigned by a Telephone Unit supervisor.
<b>Change in participation status</b>	As above	As above	No action.
<b>Change in status of address, i.e. it became known that the cohort member was no longer living at the address, but the new address was not known</b>	Telephone Unit supervisors manually entered updates in the appropriate fields on the dial screen and the case was issued to interviewers for tracing.	Telephone Unit supervisors manually entered updates in the appropriate fields on the dial screen and the case was issued to interviewers for tracing.	No action.
<b>Change to contact information</b>	As above	As above	If the case had been returned with a productive outcome code, NatCen stored the new address as the most recent address until the case was returned to CLS.  If the case had been returned with an unproductive outcome code but the interviewer had made contact with the respondent, NatCen stored the new address as the most recent address until the case was returned to CLS  If the case had been returned with a non-contact outcome code the case was reissued.

Table 5.3 shows the number of cases that were sent to CLS in the 'mover file' and the number of cases sent to NatCen in the sample update file during fieldwork.

<b>Table 5.3 Number of cases in mover file and sample update file by month</b>		
<b>Month</b>	<b>No. of cases in Mover file sent to CLS</b>	<b>No. of cases in Update file sent to NatCen</b>
October	108	294
November	734	173
December	239	383
January	331	326
February	134	181
March	242	431
April	121	247
<i>Total</i>	<i>1909</i>	<i>2035</i>

### 5.9.1 Updating sample information on the dial screen

If an update to a cohort member's sample information was received from CLS in the weekly 'Update' file before a final outcome had been assigned, supervisors updated the dial screen so that interviewers could see the new information when they next worked on the case. If an update was found by the interviewer when trying to contact the cohort member, they were responsible for entering this information on the dial screen for their own and other interviewers' use.

When updating the dial screen, the update as well as its source, was entered in a specific update field for each contact detail on the dial screen. The example below shows a home telephone number update (highlighted in yellow) entered in the home update field by a TU interviewer and a new work telephone number (highlighted in blue) provided by CLS in the weekly update file, and recorded on the dial screen by a supervisor. All updates and changes made to the sample information by interviewers were recorded in such a way that the new information was distinguishable from the origin.

Number	0161-4831418
HomeNotes	*
HomeUpdate	+ (TU) 020 7549 7024 - spoke with previous occupants who provided new TN.
AFDTel	
WorkTel	
WorkNotes	*
WorkUpdate	+ (CLS) 020 7549 7065

### 5.9.2 Non-contact outcome codes

Two months into fieldwork the non-contact outcomes were improved in order to distinguish more clearly between the two types of non-contacts, i.e.:

- i. Cases which were definitely non-contactable on the provided sample telephone numbers.
- ii. Cases where it had not been established whether the provided sample telephone numbers

were definitely not associated with the cohort member (and so the cohort member could potentially have been contacted using the sample telephone number(s)).

Cases which could not be contacted on the telephone numbers provided (type (i) above) needed to be prioritised for tracing so it was important to make the distinction clearer. The table below outlines the changes that were made and the type of non-contact each outcome code was classified as.

**Table 5.4 Changes to non-contact outcome codes made during fieldwork**

Outcome at start of fieldwork	Updated outcome	Description	Type of non-contact
301 – No contact with anyone	300 - No contact with anyone – number(s) incorrect	Use if no contact has been made with anyone and all telephone numbers provided are incorrect. <i>E.g. Telephone numbers are incorrect, the number is a fax number or there are technical problems.</i>	Type 1
	301 – No contact with anyone – don't know if telephone number is associated with cohort member	Use if no contact has been made with anyone once numbers have been attempted at least 12 times, on different days of the week and times of the day. <i>E.g. Telephone number(s) are always engaged, never answered or an answer machine/voicemail is always switched on.</i>	Type 2
302 – No direct contact with cohort member	302 – No direct contact with cohort member because always unavailable	Use only if cohort member is associated with at least one telephone number. <i>E.g. Contact is made with another household member who confirms the cohort member is resident but they are unavailable.</i>	Type 2
	304 – No direct contact with cohort member – don't know if telephone number is associated with cohort member	Use if contact is made with someone but the interviewer is unable to establish whether the cohort member is associated with the number. <i>E.g. There is a household language barrier or the person the interviewer has made contact with refuses to provide information.</i>	Type 1
303 – No direct contact with cohort member	303 - No direct contact with Cohort Member – CM not contactable on TN provided	Use if contact is made with someone and it is established that the CM is <u>not</u> associated with the number <i>E.g. Telephone number has changed or is confirmed as incorrect.</i>	Type 1

## 5.10 Fieldwork progress

Fieldwork began on 9<sup>th</sup> October 2008 and ended on 14<sup>th</sup> May 2009.

Each wave of fieldwork started on time, except for Wave 5. The cases sent to DWP for tracing were released later than anticipated and some cases could not be issued without the updated contact information (see also section 2.2). As a result, Wave 5 which contained only cases whose contact information had been updated as part of the DWP tracing exercise, was released two weeks later than scheduled. There was a six week mop-up period which gave interviewers time to contact and interview previously untraced cases returned with updated contact information by the CLS Tracing Unit.

Fieldwork finished as scheduled in May 2009.

**Table 5.5 Main stage fieldwork dates**

Wave name	Timetabled fieldwork dates
W1	October 2008 – December 2008
W2	November 2008 – January 2009
W3	December 2008 – February 2009
W4	February 2009 – March 2009
W5	January 2009 – April 2009
Mop-up	March 2009 – May 2009

**Table 5.6 Interviews achieved by month**

Fieldwork month	Wave 1	Wave 2	Wave 3	Wave 4	Wave 5	Total
October	1535	0	0	0	0	1535
November	823	1285	0	0	0	2108
December	25	1003	673	0	0	1701
January	29	127	1039	0	59	1254
February	22	25	35	1700	26	1808
March	76	87	62	133	21	379
April	10	24	11	23	8	76
May	4	4	2	3	0	13
<i>Total</i>	2524	2555	1822	1859	114	8874

## 5.11 Progress reporting

Fieldwork progress reports were sent to CLS weekly, and more substantial progress reports were provided each month. The weekly reports comprised a breakdown of survey response (broadly, into categories of productive, non-productive, ineligible and outstanding cases) by fieldwork wave.

The monthly reports had additional breakdowns: by prior response and by response to the Parents questions.

The first weekly report was provided on 26<sup>th</sup> October 2008, and the first monthly report in January 2008, with reports continuing throughout fieldwork.

## 5.12 Translations

Cohort members living in Wales received the advance letter in English and Welsh (double sided A4). This was the only document translated and because all cohort members were educated in the British school system, interpreters were not necessary for the CATI interview.

## 5.13 Thank you letter

Thank you letters were sent to all cohort members who had taken part in the study. This included cohort members who only completed a partial interview. Thank you letters were not sent to cohort members who had requested since the completion of the interview that they did not wish to be contacted again, or cases where NatCen or CLS had been informed that the cohort member had died since the interview. A copy of the thank you letter can be found in the appendix.

The contact information for productive cases was cleaned before sending the thank you letters. It was anticipated that thank you letters would be sent six weeks after the cohort member was interviewed. However, in practice, the time taken to set up the cleaning process and to develop the file meant that the first thank you letters were not sent until the beginning of January 2009. Contact information was cleaned in batches rather than on a case by case basis as part of the edit. The thank you letters and Contact Information files were delivered in three batches (originally there were four batches scheduled but the final two batches were merged due to the relatively small number of cases). The following table shows the number of thank you letters sent by month. A contact information file was provided to CLS at the same time as each thank you letter mailing.

**Table 5.7** Number of thank you letters sent by month

Month	Number
January 2009	6444
March 2009	2320
May 2009	110
<i>Total</i>	<i>8874</i>

## 5.14 Fieldwork Quality Control

All interviewers were required to attend a half-day briefing and conduct two practice sessions before starting work. During the briefing, interviewers conducted dummy interviews, and practiced in the Telephone Unit's practice suite with supervisors on hand to answer questions and monitor interviewers' progress.

Most interviewers who worked on the project were experienced telephone interviewers and many had worked on the National Child Development Study telephone interview in 2004-5.

Interviewers worked under constant supervision and silent monitoring of interviews was carried out to ensure quality of work and productivity. Any problems identified during monitoring or supervision were followed up by supervisors in a one-to-one session with the interviewer. The interviewer would be monitored again to ensure the feedback had been acted on.

The interviewer's route through the CATI questionnaire was programmed so that all relevant questions came on route according to the cohort member's earlier answers. Consistency checks of values and measurements were also built into the CATI. The 'hard' checks did not allow entries outside a given range, and the 'soft' checks asked the interviewer to confirm what he or she had entered. Soft checks were usually triggered where values were implausible but not impossible. All checks were reviewed when the data were edited.

## 5.15 Fieldwork issues and complaints

NatCen has a standard procedure for dealing with complaints from respondents about interviewers, but this procedure was altered slightly for BCS70 because of the longitudinal nature of the study, and the fact that respondents could contact the sponsors directly.

If complaints were made directly to CLS, the matter would be referred to NatCen for further investigation. Once fully investigated, either NatCen or CLS would respond, depending on the nature of the complaint. If the complaint concerned an interviewer's conduct, the matter would be handled by the manager of Telephone Unit.

If complaints were made directly to the NatCen research team, the matter would be investigated fully, and then forwarded to the manager of the Telephone Unit and CLS.

In cases where an interviewer's conduct had been criticised, the manager of the Telephone Unit would conduct a one-to-one meeting with the interviewer. The interviewer would be monitored again to ensure the feedback had been acted upon.

**Table 5.8 Summary of complaints from BCS70 cohort members during the fieldwork period**

<b>Reason for complaint</b>	<b>Number</b>
Interviewer conduct	3
Questions too intrusive	2
Incorrect sample information used in questionnaire	1
Lack of correspondence from CLS	1
Contact after firm refusal	1
Mode of interview (CATI)	1
<i>Total</i>	<i>9</i>

During fieldwork, a technical problem at NatCen's Telephone Unit led to 44 interviews not being saved. The cohort members whose interviews were affected were sent a letter which explained that there had been a problem and asking them if they would be willing to be interviewed again. A £15 High Street voucher was provided with the letter (in advance of the interview) in recognition of the inconvenience caused. This was well received and only one respondent refused to be re-interviewed.

## **5.16 Confidentiality Issues**

In order to maintain confidentiality, interviewers were instructed to avoid mentioning the title of the study to anyone but the cohort member or their parents. The dial screen information was confidential and for interviewers use only, and interviewers were informed that this information should not be discussed with the cohort member or anyone else.

The advance letter and information leaflet informed cohort members that their answers were treated in strict confidence in accordance with the Data Protection Act.

Interviewers were not permitted to interview anyone known to them personally, such as a friend, a neighbour or a colleague. Such instances were re-assigned to other interviewers.

## 6 Survey Response

### 6.1 Summary

A total of 8,874 cohort members were successfully interviewed, a response rate of 75.6% of the eligible sample, and a co-operation rate of 90.7% of those successfully contacted.

Of the 11,843 individuals invited to participate, there were 110 ineligible cases. Fifteen were not eligible because the cohort member had died and 91 had emigrated. The remaining 4 ineligible cases were duplications, issued in error by CLS as part of the second batch of the sample after having previously been issued in the first batch. The response rates detailed in the commentary exclude these ineligible cases.

**Table 6.1 Summary of sample eligibility**

	<b>No. of cohort members</b>	<b>% of issued sample</b>
Eligible	11,733	99.1
Ineligible	110	0.9
<i>Died</i>	15	*
<i>Emigrated</i>	91	*
<i>Issued in error (duplication)</i>	4	*
<i>Total issued sample</i>	11,843	100

### 6.2 Details of Survey Contact and Response

Overall, 16.6% of the eligible sample (1,949 cohort members) could not be contacted. Of the 9,784 successfully contacted cohort members 7.3% refused to participate in the survey and 2.0% were unproductive for other reasons.

Refusals included those cohort members who contacted the office (NatCen) directly prior to fieldwork, those who refused in person to an interviewer, and cases where appointments were broken. Broken appointments were considered to be disguised refusals, as these cohort members were consistently unavailable after several attempts by interviewers to follow-up and reschedule.

Table 6.2 provides a detailed breakdown of the response to the survey



**Table 6.2 Summary of contact and response**

	No. cohort members	% of eligible sample	% of contacted sample
Total issued sample	11843	-	-
Total eligible sample	11733	100	-
Total contacted sample	9784	83.4	100
<hr/>			
<b>Productive</b>	<b>8874</b>	<b>75.6</b>	<b>90.7</b>
<i>Fully productive</i>	8841	75.4	90.4
<i>Partially productive</i>	33	0.3	0.3
<hr/>			
<b>Unproductive</b>			
Non-contact	1949	16.6	-
<i>No contact with anyone - Cohort Member not contactable on tel nos provided</i>	429	3.7	-
<i>No contact with anyone - don't know if tel nos are associated with the Cohort Member</i>	249	2.1	-
<i>No direct contact with Cohort Member, because CM always unavailable</i>	428	3.6	-
<i>No direct contact with Cohort Member - CM not contactable on tel nos provided</i>	706	6.0	-
<i>No direct contact with Cohort Member - don't know if tel nos are associated with the CMr</i>	75	0.6	-
<i>Anonymous call bar</i>	62	0.5	-
Refusal	712	6.1	7.3
<i>Office refusal</i>	88	0.8	0.9
<i>Refusal to interviewer</i>	484	4.1	4.9
<i>Broken appointment</i>	140	1.2	1.4
Other unproductive	198	1.7	2.0
<i>Ill during fieldwork period</i>	3	0.0	0.0
<i>Away during fieldwork period</i>	52	0.5	0.7
<i>Physically or mentally incapable</i>	39	0.3	0.4
<i>Language difficulties</i>	5	0.1	0.1
<i>Other reason</i>	101	0.7	0.9

## 6.2.1 Response by survey wave

As outlined in Section 5.1, the sample was issued in two batches. The first batch (11,579 cohort members) was issued across Waves 1 to 4 from October 2008 to March 2009, and the second batch (264 cohort members) was issued in wave 5 in the fieldwork period January to April 2009.

Table 6.3 shows how the contact and response rates varied across waves for the eligible sample. The rate of non-contact was highest at wave 5 (29.2%), where the issued sample consisted of cases which had required tracing. The refusal rate was also considerably higher at wave 5 with 21.9% refusing or breaking appointments, compared with just 4.6% at the previous wave.

There was a slight gradual increase in productive interviews across the first four waves, with the rate of productive interviews increasing from 73.4% in wave 1 to 80.9% in wave 4 of the eligible sample.

**Table 6.3 Sample and response by survey wave**

	Wave 1	Wave 2	Wave 3	Wave 4	Wave 5	Total
	N	N	N	N	N	N
Base: Total eligible sample	3441	3435	2300	2297	260	11733
<hr/>						
Productive	2524	2555	1822	1859	114	8874
Unproductive	917	880	478	438	146	2859
<i>Non-contact</i>	697	601	276	299	76	1949
<i>Refusal</i>	182	224	143	106	57	712
<i>Other unproductive</i>	38	55	59	33	13	198
<hr/>						
	%	%	%	%	%	%
Productive	73.4	74.4	79.2	80.9	43.8	75.6
Unproductive	26.6	25.6	20.8	19.1	56.2	24.4
<i>Non-contact</i>	20.3	17.5	12.0	13.0	29.2	16.6
<i>Refusal</i>	5.3	6.5	6.2	4.6	21.9	6.1
<i>Other unproductive</i>	1.1	1.6	2.6	1.4	5.0	1.7

## 6.2.2 Breakdown of overall response by sweep of last interview

Table 6.4 shows the breakdown of the total eligible sample by year of last participation in the BCS survey. As expected, the greatest proportion of the eligible sample (78.7%) had last participated in the 2004 sweep, followed by 13.7% of the sample who had last participated in 2000. The remaining cohort members (7.4%) were last interviewed at one of the 6 survey sweeps between 1970 (0.1%) and 1996 (2.3%).

**Table 6.4 Breakdown of sample by sweep of last interview**

	No. issued	No. eligible	% of total eligible sample
2004	9314	9,251	78.8
2000	1635	1,610	13.7
1996	281	272	2.3
1991	325	318	2.7
1986	227	223	1.9
1980	27	26	0.2
1975	16	16	0.1
1970	18	17	0.1
<i>Total eligible sample</i>	<i>11,843</i>	<i>11,733</i>	<i>100</i>

Table 6.5 shows contact and response rates varied according to the survey sweep in which cohort members last participated. Non-contact accounted for the greatest proportion of unproductive cases, regardless of last sweep of participation. The non-contact rates ranged from 58.8% of the eligible sample last interviewed in the 1970 sweep, to 10.1% in 2004.

Co-operation rates were highest for cohort members that had taken part in the 2004 survey (93.8%) and lowest for those who had last been interviewed in the 1980 sweep (20%). The co-operation rate for contacted cohort members who had not participated since the 1970 sweep was 71.4%.

**Table 6.5 Summary of survey response and co-operation rates by last sweep of interview**

	Year of last interview								
	1970	1975	1980	1986	1991	1996	2000	2004	Total
	N	N	N	N	N	N	N	N	N
Total issued sample	17	16	26	223	318	272	1610	9251	11733
Total ineligible	1	0	1	4	7	9	25	63	110
<i>Died</i>	0	0	0	0	0	0	4	11	15
<i>Emigrated</i>	1	0	1	3	6	8	21	51	91
<i>Issued in error (duplication)</i>	0	0	0	1	1	1	0	1	4
Total eligible sample	17	16	26	223	318	272	1610	9251	11733
Productive	5	2	2	70	143	81	771	7800	8874
Unproductive	12	14	24	153	175	191	839	1451	2859
<i>Non-contact</i>	10	9	16	116	114	136	615	933	1949
<i>Refusal</i>	1	4	7	33	54	42	181	390	712
<i>Other unproductive</i>	1	1	1	4	7	13	43	128	198
	%	%	%	%	%	%	%	%	%
Total eligible sample	94.4	100.0	96.3	98.2	97.8	96.8	98.5	99.3	99.1
Productive	29.4	12.5	7.7	31.4	45.0	29.8	47.9	84.3	75.6
Unproductive	70.6	87.5	92.3	68.6	55.0	70.2	52.1	15.7	24.4
<i>Non-contact</i>	58.8	56.3	61.5	52.0	35.8	50.0	38.2	10.1	16.6
<i>Refusal</i>	5.9	25.0	26.9	14.8	17.0	15.4	11.2	4.2	6.1
<i>Other unproductive</i>	5.9	6.3	3.8	1.8	2.2	4.8	2.7	1.4	1.7
Co-operation rate <sup>5</sup>	71.4	28.6	20.0	65.4	70.1	59.6	77.5	93.8	90.7

<sup>5</sup> Co-operation rate excludes cohort members with a 'non-contact' outcome

### 6.3 Consent to contact parents

Cohort members with living parents were asked for permission for CLS to contact their parents for a follow-up research project (see section 3.1.3). Overall 8,603 of productive respondents (97%) were eligible, that is, had living parents at the time of interview.

The rate of consent was high overall, with 85% of respondents agreeing for their parents to be contacted. However the second sample batch consisting of traced cohort members, issued at wave 5, had a lower rate of consent than previous waves, at just 61.9%.

Table 6.6 below shows the rate of consent for the eligible sample, across each wave of the 2008 survey.

**Table 6.6 Consent to contact parents**

	Wave 1	Wave 2	Wave 3	Wave 4	Wave 5	Total
	N	N	N	N	N	N
Base: total productive interviews	2524	2555	1822	1859	114	8874
Ineligible respondents – both parents deceased	73	85	53	51	9	271
Eligible respondents	2451	2470	1769	1808	105	8603
Consent given	2056	2083	1539	1572	65	7315
Consent not given	395	387	230	236	40	1288
Consent refused	364	364	210	223	33	1194
No information	31	23	20	13	7	94
	%	%	%	%	%	%
<i>Eligible respondents</i>	97	97	97	97	92	97
<i>Consent given</i>	83.9	84.3	87.0	86.9	61.9	85.0
<i>Consent not given</i>	16.1	15.7	13.0	13.1	38.1	15.0
<i>Consent refused</i>	14.9	14.7	11.9	12.3	31.4	13.9
<i>No information</i>	1.3	0.9	1.1	0.7	6.7	1.1

## 6.4 Module timings

The mean and median interview lengths, including the completion of the household questionnaire, were 25.9 minutes and 24.4 minutes respectively.

See Table 6.7 for a breakdown of individual module timings.

**Table 6.7 Module timings for respondent interview**

<i>Base: 4028</i>	Mean time (decimal minutes)	Median time (decimal minutes)
Household Grid	3.1	2.8
Housing	2.0	1.4
Relationships history & other relationships	1.4	0.9
Births	0.6	0.0
Adopted children	0.1	0.0
Absent children	0.2	0.0
Family, social relationships and support	1.1	1.0
Family income	1.7	1.6
Employment	5.3	4.7
Partner Job	1.4	0.9
Qualifications	0.0	0.0
Health	2.8	2.3
Smoking and drinking	0.4	0.3
Contact information	5.8	5.0
<i>Respondent interview total</i>	25.5	24.4

# 7 Coding, Editing and Data Preparation

## 7.1 Editing CATI Data

In order to minimise post-interview editing, data entered into CATI was automatically subjected to range and consistency error checks (see section 5.14). This enabled interviewers to clarify and query data discrepancies directly with the respondent during the interview. Consistency checks comprise of 'soft' and 'hard' checks. Hard checks must be resolved by the interviewer at the time of the interview, but soft checks can be suppressed by the interviewer. Where a soft check was triggered, the interviewer often opened and recorded a note explaining the situation. These notes were kept alongside the data, and could be inspected later.

However, some data checking is too complex to be carried out in the field. In addition it is not always possible to include all possible consistency checks in the program. As a result, a separate coding and editing process was required and this was carried out electronically, using a new version of the CATI program, specially developed for this purpose using Blaise. The edit checks and coding instructions were agreed with the CLS team.

The coding and editing process required the NatCen Operations Department to conduct further data checking, resolve outstanding queries and code responses to "other-specify" and open-ended questions (see Section 7.2). For each case a paper fact sheet was generated for the editor to use. This factsheet included the cohort member's details, and listed responses which had triggered a soft check during the interview, notes or remarks entered by the interviewer and all verbatim responses to "other - specify" and open-ended questions for coding.

Examples of actions taken by editors included:

- reviewing entries which had triggered a soft check (e.g. extreme values of earnings or amounts received or paid) in conjunction with interviewers' notes where available
- checking and resolving interviewer queries
- back-coding "other - specify" responses that interviewers had been unable to code using a revised codeframe (e.g. main reason for moving house)
- coding open-ended responses (e.g. problems with vision)

Editors only made changes to the data according to the rules written in the codebook provided (see Appendix) and recorded their actions and any outstanding queries on the paper fact sheets. Queries were reviewed by the Operations Department, and, in many cases they were referred back to the NatCen researchers for guidance.

## 7.2 Coding open-ended and 'other-specify' questions

As mentioned in section 7.1, the CATI interview included a number of questions where the responses were recorded verbatim and subsequently needed to be coded. These were questions where the interviewer was either unsure where to code a particular response within the existing code frame or the full range of responses could not be predicted before the interview.

## 7.2.1 Other-specify questions

Most of the questions that required coding were 'other-specify' questions, where the interviewer entered an answer if they were not confident of coding into the pre-specified code frame. In many cases it was possible for editors to code 'other-specify' answers back into the existing code frame (back coding). However, in some cases back coding is not always possible as new, distinct groups of responses emerge.

Therefore, before the data was passed to the Operations Department at NatCen for editing, the researchers at NatCen reviewed the early data to try to identify where additional codes were needed, and what they should be. Any new codes that were identified via this process were incorporated into the code frames.

In some cases it was still not possible for responses to be allocated to an existing code or any of the additional codes. In these instances, coders assigned a new 'other' code as appropriate. These codes were:

- code 94 - other specific answer (used for most of the responses that could not be coded using the existing/additional codes in the code frames)
- code 95 - vague/ irrelevant answer (used for responses that did not answer the question)
- code 96 - editor cannot deal with this

NatCen researchers reviewed all responses given one of these codes by editors.

## 7.2.2 Open questions

Open questions require the interviewer to record the respondent's responses verbatim, i.e. it was intentional that a codeframe was not provided in the CATI. For open questions researchers used codeframes which they had developed for the 2008 sweep of the NCDS. As with the other-specify questions, if interviewers were not able to allocate the responses to a code in the codeframe, then a new 'other' code was allocated, as specified in section 7.2.1.

## 7.2.3 SOC and SIC Coding and ICD-10

Some of the questions made use of pre-existing classification schemes, for example relating to type of occupation and industry as well as health problems. For the first group of questions, Standard Occupational Classification (SOC2000) and Standard Industrial Classifications (SIC 2003) were used; the National Statistics Socio-economic Classification (NS-SEC) was derived from SOC2000 and employment status, and was used as a social class measure. For health questions, coding was based on the International Classification of Diseases, 10<sup>th</sup> revision (ICD-10).

New or revised code frames were largely developed by NatCen researchers, with contributions from the CLS team. Final agreement on code frames was reached in March 2009. A list of all questions that were coded is provided in Table 7.1.



**Table 7.1 List of coded variables**

<b>Code frame</b>	<b>Module</b>	<b>Variable name</b>
<b>SOC / SIC</b>	Bemploy	CJDo, CJTitle, CJFirm
	BEmploy - Histories	JTitle, Jdo
<b>ICD-10</b>	Bhealth	LsiCond
<b>Other - specify questions: (pre-existing codeframes were expanded after reviewing responses)</b>	Bhouse	HomeGo
	Bemploy	Othact1, JyOEnd , CJOthOrg , CNetOPrd, CGroOPrd, SeOType
	BHealth3	OthCanc , HearOth, OthSkin, SBGBOth, BKOth
<b>Open - ended questions (codeframes created to edit responses)</b>	Bhealth	EyePrbTp

### 7.3 Quality Control

For the first 200 cases, all factsheets were reviewed by the NatCen Operations Department, to ensure that the editing and coding rules were being applied consistently. If any inconsistencies were found, feedback, and additional guidance, was given to the editors, and, where required, the codebook was updated with additional information that helped to ensure consistency and accuracy. Once Operations were satisfied that the coding and editing was being carried out consistently, spot checks were made to ensure continued accuracy. In addition, all editor queries were checked and referred to researchers if necessary.

### 7.4 CATI Problems with the Data

The data that was delivered to CLS was of high quality. However during the editing process one routing issue was identified in the programme. Five cohort members who corrected the fed forward details of their children who no longer lived in their household, were not routed to the correct questions in the Absent Children block. Cohort Members were not re-contacted. CLS were provided with a detailed description of this routing issue so that this can be taken into account during analysis of the data.

## 7.5 Survey outputs

Table 7.2 Survey Outputs		
Output	Date Delivered	Notes
<b>CATI Data</b>		
Interim data	W/c 23 February 2009 W/c 27 April 2009	
Final data	W/c 10 August 2009	
<b>Contact Information</b>		
Contact Information File - Final	W/c 28 September 2009	Includes both productives and unproductives. Note that contact files were delivered for each of the thank-you letter mailings, but this file superseded those.
<b>Final Response and ParaData</b>		
Final outcomes of survey elements	W/c 25 October 2009	Reconciled outcomes for all issued cases.
ParaData	W/c 25 October 2009	
<b>CAPI Questionnaire Documentation</b>		
Draft 1	W/c 23 February 2009	
Near Final	W/c 7 September 2009	
Final	W/c 12 October 2009	