

Article

## Coronavirus and homeschooling in Great Britain: April to June 2020

Analysis of homeschooling in Great Britain during the coronavirus (COVID-19) pandemic from the Opinions and Lifestyle Survey.

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## 1. Main points

- Between 7 May and 7 June 2020, 87% of parents said a child in their household had been homeschooled because of the coronavirus (COVID-19) pandemic, with the percentage decreasing as the age of the only or eldest child increased.
- The average number of hours spent doing schoolwork per week significantly increased as the age of the child increased from 5 to 10 years (10 hours) to 11 to 15 years (16 hours), with the hours spent learning by those aged 5 to 10 years being significantly lower when there was a child aged 0 to 4 years in the household.
- The percentage of parents who said their children had used real-time interactive online learning resources
  provided by schools (for example, live lessons) significantly increased as the age of the child increased,
  with 44% of parents saying their children aged 16 to 18 years had used this compared with 13% for
  children aged 5 to 10 years.
- Over half (52%) of parents with school-aged children said a child in their household was struggling to continue their education while at home, with just over three in four of these parents (77%) giving lack of motivation as one of the reasons.
- While under 1 in 10 (9%) parents with a child who was struggling gave a lack of devices as a reason for struggling, this was significantly higher for households with one adult (21%) than households with two or more adults (7%).
- Most older children aged 16 to 18 years in full-time education (64%) thought that continuing their education at home would negatively affect their future life plans.
- Between 3 April and 10 May 2020, of parents who were homeschooling, one in three women (34%) agreed that it was negatively affecting their well-being compared with one in five men (20%), while 43% of homeschooling parents agreed that it was negatively affecting the well-being of their children.

## 2. Understanding homeschooling in Great Britain

This release contains data and indicators from a new weekly module being undertaken through the Office for National Statistics (ONS) Opinions and Lifestyle Survey (OPN) to understand the impact of the coronavirus (COVID-19) pandemic on British society, which is reported on in the <u>Coronavirus and the social impacts on Great Britain</u> series of bulletins.

#### More about coronavirus

- Find the latest on <u>coronavirus (COVID-19) in the UK.</u>
- All ONS analysis, summarised in our <u>coronavirus roundup</u>.
- View <u>all coronavirus data</u>.
- Find out how we are working safely in our studies and surveys.

This analysis uses two pooled datasets each containing five waves of this weekly OPN data. One dataset covers the period 3 April to 10 May 2020. During this period, respondents were asked whether they had homeschooled their children and about their experiences of homeschooling. For those who were not homeschooling, other adults in the household may have been homeschooling the children in the home. The second pooled dataset covers the period 7 May to 7 June 2020. Here, respondents were asked if a child in the home had been homeschooled and about the experiences of the child. This change was made to better capture where homeschooling was taking place regardless of whether the person responding was the person homeschooling.

During this period, schools were closed to most children. Schools in Great Britain closed from Monday 23 March 2020, except for children of critical workers or vulnerable children who could not be safely cared for at home. From the week commencing 1 June 2020, schools in England extended their opening to include all pupils in Reception, Year 1 and Year 6. Schools in Scotland and Wales continued to remain open only for children of critical workers or vulnerable children during the weeks captured in the data used in this article.

The term "parents" used in this article refers to a responding adult who has at least one <u>dependent child</u> (see <u>Section 9: Glossary</u>) in their household. This will include parents and other guardians. Parents who have at least one school-aged child (that is, a child aged between 5 and 18 years) are included in the base population; parents where all their children are aged between 0 and 4 years are excluded.

The analysis in this article refers to opinions and experiences of adults with children that are being homeschooled because of school closures due to the coronavirus (COVID-19) pandemic. It is not reflective of adults that electively educate their children at home when schools are normally open.

The statistics presented are estimates and as with all estimates, there is a level of <u>uncertainty</u> associated with them. We have included 95% <u>confidence intervals</u> in the <u>accompanying datasets</u>. These indicate the range within which we would expect the true value to lie for 95 out of every 100 samples drawn at random from the population. Wide confidence intervals, often associated with small sample sizes or large sample variance, indicate a wider range of values within which we would expect the true value to lie.

The statistical significance of differences noted within the release have been determined using statistical hypothesis tests.

## 3. Parents who were homeschooling in April

Between 3 April and 10 May 2020, 77% of parents with a school-aged child said they had homeschooled their children in the past seven days because of the coronavirus (COVID-19) pandemic.

Parents who had not worked in the past seven days were significantly more likely to have homeschooled at 86% compared with 74% of those who had worked. The qualifications held by the parent also made a difference, with 83% of parents with a degree-level qualification homeschooling in the past week compared with 62% of parents without any formal qualifications.

There were no significant differences in those homeschooling when considering the sex, disability status or income group of the parent. Further analysis on how parents have spent their time through the pandemic is published in <u>Parenting in lockdown: Coronavirus and the effects on work-life balance</u>. This also found men and women spent similar amounts of time on developmental childcare which would include homeschooling through the pandemic, however women continued to provide more non-developmental childcare than men.

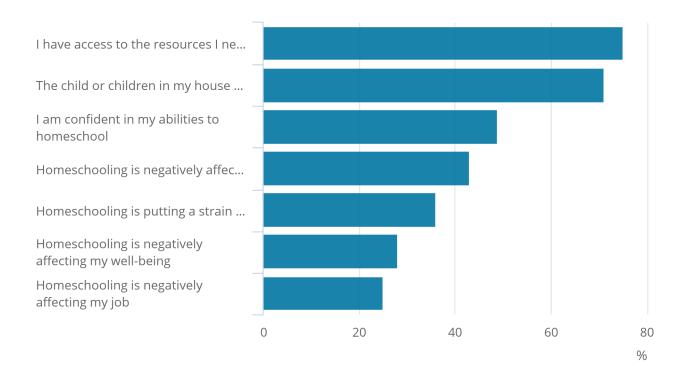
During this period, only half of parents who were homeschooling (49%) strongly or somewhat agreed that they were confident in their abilities to homeschool their children. Parents also reported that homeschooling was negatively affecting their jobs and well-being (Figure 1).

Figure 1: Only half of parents who were homeschooling (49%) agreed that they were confident in their abilities to homeschool their children

Percentage of parents homeschooling children in their household aged 5 to 18 years, who agreed with the statement on homeschooling, Great Britain, 3 April to 10 May 2020

## Figure 1: Only half of parents who were homeschooling (49%) agreed that they were confident in their abilities to homeschool their children

Percentage of parents homeschooling children in their household aged 5 to 18 years, who agreed with the statement on homeschooling, Great Britain, 3 April to 10 May 2020



Source: Office for National Statistics - Opinions and Lifestyle Survey

#### Notes:

- 1. Question: How much do you agree or disagree with the following statement on homeschooling?
- 2. All parents with a dependent child or children who said they strongly or somewhat agree with the statement on homeschooling.
- 3. Base population: parents with at least one dependent child living in the household aged 5 to 18 years who said the children in their home had been homeschooled and had used school-provided resources."

Nearly a third (30%) of parents who were homeschooling and in employment (this includes employees, self-employed and unpaid family workers; see (Section 9: Glossary for details) agreed that it was negatively affecting their job. For parents in employment, those in the highest income band of £40,000 or more a year were significantly more likely than lower income bands to say this, at 43%. This compared with 16% for those with an annual income of less than £10,000. Homeschooling parents in employment with a degree were also significantly more likely to agree that it was negatively affecting their job than those with other qualification levels, with two in five (40%) of these agreeing.

For parents who were homeschooling, over one in four (28%) agreed that it was negatively affecting their well-being. This was higher for women, with around one in three mothers (34%) agreeing that their well-being was negatively affected compared with only one in five fathers (20%). However, it should be noted that women in general were more likely to report their well-being was affected by the coronavirus than men regardless of homeschooling responsibilities. In addition, over two in five parents (43%) agreed that homeschooling was negatively affecting the well-being of their children. This was higher for parents living in households with one or more adults (44% agreed) than for those parents with no other adults in the household (30% agreed).

## 4. Homeschooling in May

Between 7 May and 7 June 2020, 87% of parents with dependent children of school age said a child in their home had been homeschooled in the past seven days because of the coronavirus (COVID-19) pandemic. This is higher than the 77% for the earlier period as this refers to whether a child in the home had been homeschooled rather than if the parent responding had homeschooled.

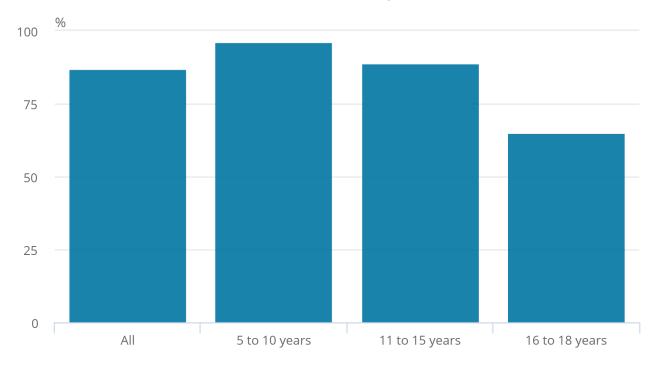
There were similar levels of homeschooling for both single-adult households (85%) and households with two or more adults (87%). However, as the age of the only or eldest child in the household increased, the percentage of parents saying their children had been homeschooled significantly decreased (Figure 2).

Figure 2: 87% of parents said a child in their household had been homeschooled in the past seven days because of the coronavirus pandemic

Percentage of parents with dependent children who said a child in their home had been homeschooled in the past seven days, by the age of the only or eldest dependent child in the household, Great Britain, 7 May to 7 June 2020

# Figure 2: 87% of parents said a child in their household had been homeschooled in the past seven days because of the coronavirus pandemic

Percentage of parents with dependent children who said a child in their home had been homeschooled in the past seven days, by the age of the only or eldest dependent child in the household, Great Britain, 7 May to 7 June 2020



Source: Office for National Statistics – Opinions and Lifestyle Survey

#### Notes:

- 1. Question: In the past seven days, has a child in your home been homeschooled due to the coronavirus (COVID-19) outbreak?
- 2. Base population: parents with at least one dependent child living in the household aged 5 to 18 years who said the children in their home had been homeschooled and had used school-provided resources."

Parents whose only or eldest child was aged 5 to 10 years were significantly more likely to say a child in their home had been homeschooled at 96%, compared with 65% of parents where their eldest child was aged 16 to 18 years. However, when asked directly, 82% of older children aged 16 to 18 years in full-time education said they had continued their studies at home, implying that a significant proportion of them may have been studying independently of their parents.

When parents with school-aged children were asked the ways in which the coronavirus pandemic was affecting their life, over 6 in 10 (61%) said their work had been affected. For those who were in employment (including employees, self-employed and unpaid family workers; see (Section 9: Glossary for details), 67% said this. Among these, over one in four (28%) said one of the reasons was having to work around homeschooling responsibilities, with over half of parents giving this reason being women (59%). In addition, 20% of working parents whose work had been affected said this was because of having to work around childcare responsibilities. Analysis of time-use data in Parenting in lockdown: Coronavirus and the effects on work-life balance also found that parents had changed their working patterns through the pandemic. Parents spent more time on childcare in the day, with work moving earlier in the morning or later into the evening.

## 5. Resources used for homeschooling

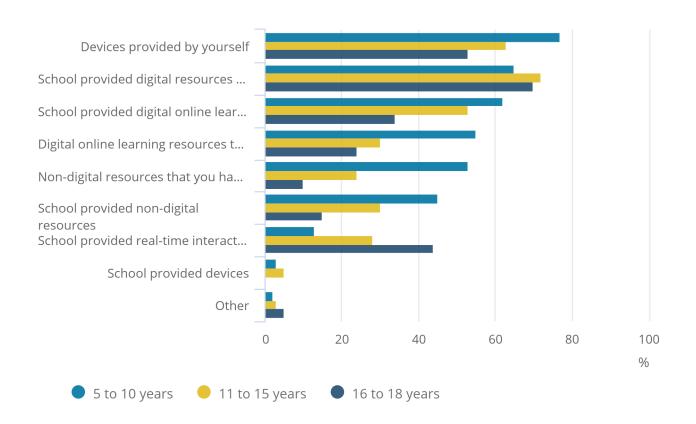
The most common resources that parents said their children had used for their homeschooling were school-provided digital resources accessed via online learning platforms (for example, pre-recorded lessons, assignments and e-workbooks) and devices provided by their parents (such as laptops and tablets). School-provided digital online learning resources (for example, links to BBC Bitesize or YouTube) were also commonly used. However, the resources used by children differed significantly based on the age of the child (Figure 3).

Figure 3: Resources used varied by the age of the child with younger children more likely to use parentprovided resources

Percentage of parents who said their child had used each of the resources for their learning by the age of the only or eldest dependent child in the household, Great Britain, 7 May to 7 June 2020

## Figure 3: Resources used varied by the age of the child with younger children more likely to use parent-provided resources

Percentage of parents who said their child had used each of the resources for their learning by the age of the only or eldest dependent child in the household, Great Britain, 7 May to 7 June 2020



Source: Office for National Statistics - Opinions and Lifestyle Survey

#### Notes:

- 1. Question: Which, if any, of the following resources has the only child or oldest child in your home used for their homeschooling?
- 2. Base population: parents with at least one dependent child living in the household aged 5 to 18 years who said the children in their home had been homeschooled and had used school-provided resources."
- 3. Respondents were asked to select all that apply.
- 4. The estimate for parents who said school-provided resources were used by children aged 16 to 18 years is not shown because of a small sample size.

Resources that were found or provided by parents were more likely to be used by younger age groups. For example, parents of younger-aged children were significantly more likely to say their child had used non-digital resources found by them (for example, books and textbooks) for their homeschooling, with over half (53%) of parents using them for children aged 5 to 10 years while only 1 in 10 parents (10%) used them for children aged 16 to 18 years.

Older age groups were more likely to have used real-time interactive online learning provided by schools (for example, live lessons), with over 1 in 10 (13%) parents saying these were used for children aged 5 to 10 years compared with over 4 in 10 (44%) for children aged 16 to 18 years.

## 6. Hours spent learning

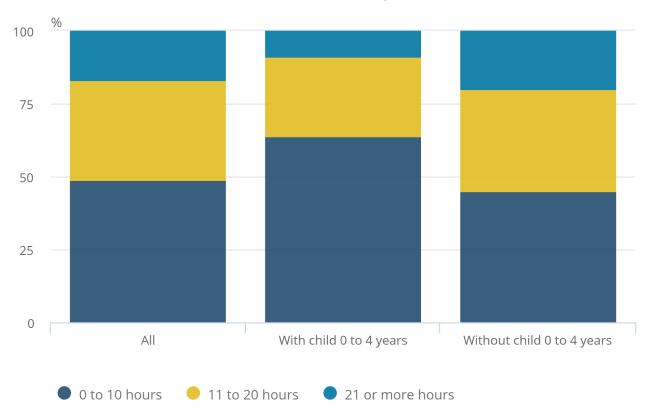
On average, children completed 13 hours of learning using school-provided resources in the past week. This was similar regardless of the number of adults or children in the household. However, the average number of hours school-aged children spent learning differed depending on whether there was also a child aged 0 to 4 years in the home (Figure 4). This may be because younger children require more childcare resulting in less time for parents to help and support other children in the home with their schoolwork.

Figure 4: Parents who have a child aged 0 to 4 years as well as their school-aged child report completing fewer hours of learning then those without

Percentage of parents who said their only or eldest child had completed the banded number of hours of learning over the past week, by whether there is a child aged 0 to 4 years in the household, Great Britain, 7 May to 7 June 2020

## Figure 4: Parents who have a child aged 0 to 4 years as well as their school-aged child report completing fewer hours of learning then those without

Percentage of parents who said their only or eldest child had completed the banded number of hours of learning over the past week, by whether there is a child aged 0 to 4 years in the household, Great Britain, 7 May to 7 June 2020



Source: Office for National Statistics - Opinions and Lifestyle Survey

#### Notes:

- 1. Question: In the past seven days, how many hours of learning has the child in your home done using online lessons, worksheets, or other materials provided by their teachers?
- 2. Base population: parents with at least one dependent child living in the household aged 5 to 18 years who said the children in their home had been homeschooled and had used school-provided resources."

The hours spent learning also varied by age of the child. Parents said that children aged 5 to 10 years had completed an average of 10 hours of learning in the past week compared with 16 hours a week for children aged 11 to 15 years.

The impact from having a child aged 0 to 4 years in the household also varied depending on the age of the other children. Where there were no children aged 0 to 4 years in the household, children aged 5 to 10 years completed an average of 11 hours of schoolwork a week; this reduced to an average of 9 hours a week where there was a child aged 0 to 4 years present. However, there was no significant difference in hours spent learning for children aged 11 to 15 years between households with another child aged 0 to 4 years present and those without.

This analysis focuses on the time children have spent doing schoolwork. We have also published more detailed analysis on how parents spent their time during the first few weeks of lockdown in <a href="Parenting in lockdown: Darenting in lockdown: Daren

## 7. Extent children are struggling and why

Between 7 May and 7 June 2020, over half (52%) of parents with dependent children of school age said a child in their household was struggling to continue their education while at home. There were no significant differences for this when considering the number of adults or children in the household or the age of the only or eldest child.

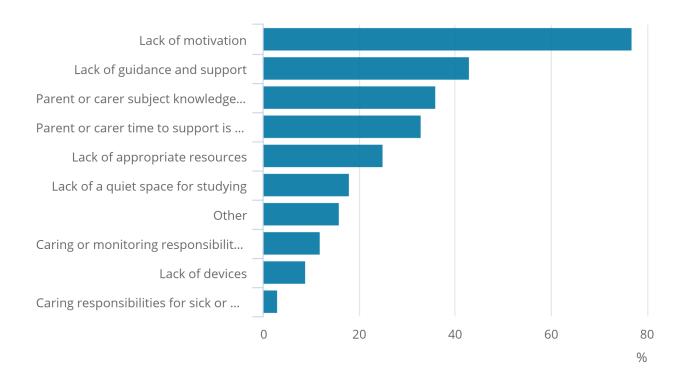
Among the parents who said their children were struggling, the most common reason was lack of motivation, with just over three in four of these parents (77%) giving this as one of the reasons. Lack of guidance and support was the next most common reason, with 43% saying this (Figure 5).

Figure 5: Just over three in four parents (77%) who said a child in their home was struggling to continue their education said this was because of a lack of motivation

Reasons why the oldest or only child in the home was struggling to continue their education while at home, Great Britain, 7 May to 7 June 2020

## Figure 5: Just over three in four parents (77%) who said a child in their home was struggling to continue their education said this was because of a lack of motivation

Reasons why the oldest or only child in the home was struggling to continue their education while at home, Great Britain, 7 May to 7 June 2020



Source: Office for National Statistics - Opinions and Lifestyle Survey

#### Notes:

- 1. Question: Which of the following reasons describes why the oldest or only child in your home is struggling to continue their education?
- 2. Base population: parents with at least one dependent child living in the household aged 5 to 18 years who said the children in their home had been homeschooled and had used school-provided resources."
- 3. Respondents were asked to select all that apply.

While lack of motivation was the most common reason for children to be struggling to continue their education, this was significantly higher for parents who had a child aged 0 to 4 years living in the household alongside one or more school-aged children, with 86% of these parents reporting this was one of the reasons their oldest child was struggling. This compares with 75% of parents with at least one school-aged child but who did not have a child aged 0 to 4 years in the household. This indicates that having a younger child in the household could negatively impact on the motivation of school-aged children to complete their learning at home.

Whether a child aged 0 to 4 years was in the household or not had a significant impact on several of the results. For example, parents with a child aged 0 to 4 years were significantly more likely than those without to say that one of the reasons their eldest child was struggling was because of caring or monitoring responsibilities for younger children (39% compared with 7%) or a lack of quiet space for studying (41% compared with 13%).

While only 9% of parents with a child who was struggling gave a lack of devices as a reason for struggling, this was significantly higher for households with one adult, with 21% stating this as a reason compared with 7% for households with two or more adults.

Limited time for parents to support children with their learning was more likely to be a reason younger age groups were struggling. Nearly half of parents (49%) whose only or eldest child was aged 5 to 10 years gave this as one of the reasons their child was struggling, compared with 1 in 10 (10%) for those where their only or eldest child was aged 16 to 18 years. This is likely because of older children being more likely to complete their learning on their own, without help from their parents.

However, when older children aged 16 to 18 years in full-time education were asked directly, over half (53%) said they were struggling to continue their education while at home. The most common reasons given for why they were struggling were lack of motivation and lack of guidance and support, the same most common reasons given by parents.

Most older children aged 16 to 18 years in full-time education (64%) somewhat or strongly agreed that they were concerned that their future life plans will be negatively affected by continuing their education at home. A detailed analysis of the <u>social impacts the coronavirus (COVID-19) pandemic has had on younger people</u> was published on 22 June.

## 8. Coronavirus and homeschooling data

#### Coronavirus and homeschooling in Great Britain

Dataset | Released 22 July 2020

Analysis of homeschooling in Great Britain during the coronavirus (COVID-19) pandemic from the Opinions and Lifestyle Survey (OPN). Data relate to homeschooling from the COVID-19 module of the OPN, collected from 3 April to 10 May 2020 and 7 May to June 2020.

## 9. Glossary

#### **Adults**

Adults refer to individuals aged 16 years and over, excluding those aged 16 to 18 years who have never been married and are in full-time education.

#### Dependent children

A dependent child is defined as someone who is under the age of 16 years or someone who is aged 16 to 18 years, has never been married and is in full-time education.

### **Disability status**

To define disability in this publication, we refer to the <u>Government Statistical Service (GSS) harmonised "core" definition</u>: this identifies "disabled" as a person who has a physical or mental health condition or illness that has lasted or is expected to last 12 months or more and that reduces their ability to carry-out day-to-day activities.

The GSS definition is designed to reflect the definitions that appear in legal terms in the <u>Disability Discrimination</u> Act 1995 and the subsequent <u>Equality Act 2010</u>.

The GSS harmonised questions are asked of the respondent in the survey, meaning that disability status is self-reported.

### In employment

A respondent is said to be "in employment" if their employment status is either employee, self-employed or unpaid family worker. This is different to the definition used in <u>our labour market estimates</u>, which also include a small number of people on government training schemes. The Opinions and Lifestyle Survey (OPN) does not ask whether a person is on a government training scheme.

### **Highest qualification**

The qualifications a person has obtained are classified as follows:

- degree or equivalent formal degrees or equivalent
- higher education qualifications that are lower than a degree but higher than A Levels, often described as level 4 or level 5 qualifications such as Higher National Certificates and National Vocational Qualifications
- A Level or equivalent A Levels, ONC or Level 3 BTECs, and Scottish Highers
- GCSE A\* to C or equivalent O-Level or GCSE equivalent (Grade A to C) or O-Grade or CSE equivalent
- other qualifications GCSE (Grade D to G) or CSE (Grade 2 to 5) or Standard Grade (level 4 to 6) or foreign qualifications below degree level
- no formal qualification having no formally obtained qualification

#### Income

The income in this publication refers to total personal income before any deductions are taken.

#### **Parent**

An adult is classed as a parent if they are the parent of a dependent child living in the household. Dependent children in this case includes children and stepchildren.

#### School-aged children

A school-aged child includes dependent children aged 5 to 18 years.

#### Working

For the OPN, a person is said to be working if they had a paid job, either as an employee or self-employed; they did any casual work for payment; or they did any unpaid or voluntary work in the previous week.

## 10. Measuring the data

The Opinions and Lifestyle Survey (OPN) is a monthly omnibus survey. In response to the coronavirus (COVID-19) pandemic, we have adapted the OPN to become a weekly survey used to collect data on the impact of the coronavirus on day-to-day life in Great Britain.

The survey results are weighted to be a nationally representative sample for Great Britain, and data are collected using an online self-completion questionnaire. Individuals who did not complete the survey online were given the opportunity to take part over the phone.

The estimates provided in this article are based on two pooled datasets each containing five waves of weekly OPN data. One dataset covers the period 3 April to 10 May 2020 (inclusive) with a sample of approximately 6,400 adults (64% response rate) and the other covers the period 7 May to 7 June 2020 (inclusive) with a sample of approximately 6,350 adults (58% response rate) for the period 7 May to 7 June 2020.

More quality and methodology information on strengths, limitations, appropriate uses, and how the data were created is available in the OPN QMI.

## Sampling

A weekly sample of 2,010 households (increasing to 2,500 for the last two weeks of this period) were randomly selected from the Annual Population Survey (APS), which consists collectively of those respondents who successfully completed the last wave of the Labour Force Survey (LFS) or the local LFS boost. From each household, one adult was selected at random but with unequal probability. Younger people were given higher selection probability than older people because of under-representation in the sample available for the survey. Further information on the sample design can be found in the <a href="https://example.com/openses/by/">OPN QMI</a>.

## Weighting

The responding sample contained approximately 6,400 individuals (64% response rate) for the period 3 April to 10 May 2020. For the period 7 May to 7 June 2020, the responding sample contained approximately 6,350 individuals (58% response rate). Survey weights were applied to make estimates representative of the population.

The weights for each of the pooled datasets were obtained by re-weighting the pooled dataset using the scaled weights of the component datasets as the starting weights in calibration. This ensures that each week is equally represented in the pooled dataset. Subsequently, the scaled component weights were calibrated to satisfy population distributions considering the following factors: sex by age, region, tenure, highest qualification, employment status, National Statistics Socio-economic Classification (NS-SEC) group by sex, and smoking status.

For age, sex and region, population totals based on projections of mid-year population estimates for April 2020 were used for the dataset covering the period 3 April to 10 May 2020, while projections of mid-year population estimates for May 2020 were used for the dataset covering the period 7 May to 7 June 2020. For the remaining factors, the distributions were based on estimates obtained from APS 2019. The resulting weighted sample is therefore representative of the Great Britain adult population by a number of socio-demographic factors and geography.

The calibration process helps in adjusting for potential bias stemming from attrition in the last waves of the LFS and its local boost, the samples from which OPN samples are selected, non-consent to follow-up and non-response in the OPN.

## 11 . Strengths and limitations

The main strengths of the Opinions and Lifestyle Survey (OPN) include:

- it allows for timely production of data and statistics that can respond quickly to changing needs
- it meets data needs: the questionnaire is developed with customer consultation, and design expertise is applied in the development stages
- robust methods are adopted for the survey's sampling and weighting strategies to limit the impact of bias
- quality assurance procedures are undertaken throughout the analysis stages to minimise the risk of error

The main limitations of the OPN include:

- the sample size is relatively small: it consists of 2,010 to 2,500 individuals per week with fewer completed interviews, meaning that, even with pooled data, detailed analyses for subnational geographies and other sub-groups are difficult
- comparisons between periods and groups must be done with caution as estimates are provided from a sample survey; as such, confidence intervals are included in the datasets to present the sampling variability, which should be taken into account when assessing differences between periods, as true differences may not exist

More information on strengths and limitations is available in <u>Coronavirus and the social impacts on Great Britain</u> and the <u>OPN QMI</u>.

#### 12. Related links

#### Parenting in lockdown: Coronavirus and the effects on work-life balance

Article| Released 22 June 2020

An article which looks at how parents in Great Britain have been trying to balance caring for their children with working from home.

#### Coronavirus (COVID-19) latest data and analysis

Web page | Updated as data become available

Latest data and analysis on the coronavirus (COVID-19) in the UK and its effects on the economy and society.

#### Coronavirus and the social impacts on Great Britain

Bulletin | Released weekly

Indicators from the Opinions and Lifestyle Survey (OPN) to understand the impact of the coronavirus pandemic on people, households and communities in Great Britain.

#### Personal and economic well-being in Great Britain: May 2020

Bulletin | Released 4 May 2020

Estimates looking across personal well-being and economic well-being covering the period October 2019 to April 2020 to understand the impact of the coronavirus pandemic on people and households in Great Britain.

#### Coronavirus and the social impacts on young people in Great Britain: 3 April to 10 May 2020

Bulletin | Released 22 June 2020

Indicators from the OPN on the impact of the coronavirus pandemic on young people in Great Britain.