

Current Adherence to Behavioural and Social Interventions in the UK: Comments from SPI-B [22 March 2020]

Key highlights

- Adherence to some aspects of general social distancing appears to have increased over time. Although survey respondents report having stopped or cut down many behaviours, there appears to be room for social distancing to be increased still further.
- We do not know the level of adherence among children or the level of adherence to household isolation.
- We do not know the level of adherence to shielding, but 37% to 54% of people to whom the policy applies have not stopped seeing friends or members of the family who do not live with them.
- The data we have reviewed were not ideal. We recommend that a single group within Government takes ownership of adherence measurement: optimising measures, co-ordinating activity and rapidly sharing all data.

Background

- Following discussions by SPI-M, on 20 March SAGE asked SPI-B to review: 1) the current level of adherence to behavioural and social interventions and 2) possible options for increasing adherence. This report tackles the first of those requests.
- In preparing this report, we have:
 - requested that the SAGE secretariat provide us with reports on whatever pertinent data are available to the Government;
 - looked at two surveys commissioned by the Government to which we have access; and
 - examined the existing register of COVID-19 relevant polling and academic literature maintained by SPI-B and a separate register held by the Behavioural Insights Team.
- In doing this, we have focused on self-reported behaviour or objective indicators of behaviour within the UK. We have excluded measures of behavioural intentions.
- We have specifically looked for data collected after a relevant announcement. For example, although there are several surveys relating to general social distancing (e.g. [Ipsos MORI](#); [RetailX](#); [YouGov](#); [Brandwatch](#)), we have not included any that pre-date 16 March, when official recommendations to engage in social distancing were announced.

- Given the urgency of the request, it is possible that we have overlooked relevant data. We would ask readers to tell us, via the SAGE secretariat, if there are other data sources that we should consider.

When was guidance given?

- Government guidance has developed over time. Table 1 shows when the broad measures were announced, and their intended implementation date. *The table also shows in italics when data collection for surveys took place.* Note that shielding for vulnerable people was not intended to begin until this weekend (21-22 March).

Table 1: Summary of when guidance was announced and implemented, and when data collection occurred

Measure	Announcement date	Implementation date
Self-isolation 7-14 days if fever / cough	Thursday 12.03	Thursday 12.03
Household isolation 14 days (or longer)	Monday 16.03	Monday 16.03
Mass gatherings suspension	Monday 16.03	Monday 16.03
Social distancing for everyone	Monday 16.03	Monday 16.03
<i>DHSC survey data collection, Monday 16.03 to Wednesday 18.03</i>		
Shielding for vulnerable people for 12 weeks	Monday 16.03	Saturday 21.03
<i>YouGov daily question, Tuesday 17.03</i>		
<i>Cabinet office survey data collection, Thursday 19.03 to Friday 20.03</i>		
<i>YouGov tracker, Friday 20.03</i>		
School closures	Thursday 19.03	Monday 23.03
Pubs, bars, theatres, gyms, leisure centres closed	Friday 20.03	Friday night 20.03

Adherence to general social distancing

Key finding

- Adherence to some aspects of general social distancing (e.g. use of public transport) appears to have improved over time. Although survey respondents report having stopped or cut down many other behaviours, there is room for social distancing to be increased further.

What is the recommendation?

- In addition to advice on respiratory and hand hygiene, the Government's advice to members of the public (as listed on the [NHS](#) website) is to: avoid close contact with people who have the symptoms of coronavirus; only travel on public transport if you need to; work from home if you can; avoid social activities such as going to pubs, restaurants, theatres and

cinemas; avoid events with large groups of people; and do not have visitors to your home including friends and family. More succinct advice has been promoted elsewhere (e.g. on a podium at the PM's briefings: "Stay at home.")

Self-report data

- The Cabinet Office has commissioned a series of polls through the market research company YouGov. Each poll takes place over the course of a single evening and achieves a sample of around 1,500 people. Recent iterations of the survey asked participants to "look at the list of [seven] activities below and, for each one, say whether you have reduced how much you are doing it." Options for each behaviour are "I am still doing this as much as usual," "I am still doing this, but have cut it down a little," "I am still doing this, but have cut it down a lot," "I have stopped doing this entirely" and "Not applicable, I did not do this anyway."
- Appendix 1 shows the results for the 19-20 March iteration of the survey. The following percentages relate to people who are below the age of 70 years, do not have any relevant medical condition, and report having stopped doing a behaviour entirely or who gave "not applicable, I did not do this anyway" as an answer.
 - going to pubs, bars, restaurants or the theatre: 82%
 - attending clubs or taking part in hobbies with other people: 87%
 - seeing friends: 52%
 - seeing members of the family who do not live with me: 47%
 - sending your children to school: 87%
 - going to your place of work: 53%
 - using public transport: 80%
- Note that even among those who are still doing these behaviours to some extent, many report having "cut it down" a little or a lot (see Appendix 1), with the notable exception of going to your usual place of work.
- For some of these, it is difficult to assess how much room for improvement there is. For example, it is not clear to us how many people *need* to use public transport. 'Seeing friends' and 'seeing members of the family who do not live with me' might offer more room for movement. However, note that "seeing" someone is ambiguous and may include a conversation where both people remain several metres apart – this might even be a beneficial interaction, rather than a risky one, if friends or family members are delivering supplies but keeping their distance. The wording for many of these items needs to be improved.

- An earlier ‘daily question’ poll by [YouGov](#) (17 March, n=2,460) asked participants “are you staying inside more as a result of the coronavirus, or going out as normal?” 55% reported staying inside more, 41% going outside as normal and 4% don’t know. This suggests less change in behaviour than the Cabinet Office data, but the survey occurred only one day after the policy announcement on social distancing. Note that the survey does not explain what “going out as normal” entails – it presumably encompasses various levels and types of behaviour.
- A more recent [tracker survey by YouGov](#) (20 March) reported that, among other things, 57% of people in the UK were “avoiding crowded public places” and 20% were “avoiding going to work (e.g. by working from home).” Note that the underlying data and exact questions for these results are currently unclear to us.
- We did not find any data relating to social distancing among children.

Other metrics

- Over the weekend (Saturday 21st to Sunday 22nd March), we were provided with multiple reports of other metrics. These related to data sources we were previously unfamiliar with and our interpretation below should therefore be treated with caution. For a more reliable summary, readers are directed to the relevant Government departments, via the SAGE secretariat. The secretariat has also kindly provided a summary in Appendix 2, and we understand that ONS will present some of these data in person to SAGE.
- The key overall finding appears to be that objectively measured travel has reduced and these reductions have grown on a daily basis.
- Transport for London passenger data:
 - The graphs provided by TfL (reproduced in Appendix 3) suggest there has been a reduction in Tube and bus usage since approximately 11 March.
- [City Mapper](#) is an app that allows people to identify routes including public transport options.
 - In comparison to “a typical period at the start of 2020,” for the week ending Sunday 15th March, usage of the app was 83% of typical in London.
 - For the last seven days (week ending Friday 20th March), usage was 50% for London.
 - For Saturday 21st March, usage was 23% for London.
- [REDACTED]
- [REDACTED]
 - [REDACTED]
 - [REDACTED]

- [REDACTED]
- Google places data (Friday 20th March):
 - Activity on average fell on Friday 20th March compared to Thursday 19th March.
 - Mainline station activity (18 stations across the UK, excluding London) between 4-6pm was 27% of usual, down from 36% of usual on Thursday.
 - Mainline station activity (measured across 11 stations) between 4-6pm was around 26% of usual on Friday, similar to Thursday's levels (27% of usual).
 - There was a similar trend on the Tube – activity fell to 28% of usual on Friday vs 31% on Thursday.
 - Westminster Abbey fell to 12% of activity.

Regional variations

- Although we have not had time to analyse this in any detail, several of the datasets appear to show regional variations.
- The YouGov daily question reported that while 63% of people from London reported staying inside more, this was true for only 49% of people from Scotland.
- The Google places data show that Glasgow's morning rush is 83% of usual activity.
- A cursory examination of the Cabinet Office topline suggests several variations may exist. To take one example, people in the South East are more likely than those in North West to have stopped going out to pubs, bars, restaurants or theatres.

Adherence to household isolation

Key finding

- At present, we do not know the level of adherence to household isolation.

Self-report data

- Since early in the outbreak, DHSC has been conducting weekly polling through the market research company BMG. Each week, a fresh sample of approximately 2,000 adults from the UK answer a set of questions in an on-line poll. Data collection for each poll takes place across approximately three days. Quotas are applied to ensure that the eventual sample of respondents is representative of the UK population in terms of age and gender (interlocked) and Government Office Region.
- The DHSC polling asks participants to report if "as far you know, have you had a high temperature / fever or a new, continuous cough in the past seven days." Those who respond 'yes' are asked "While you had high temperature/fever or new, continuous cough, which actions, if any, did you take?"

- In the most recent poll (16-18 March, n=2,002), 209 people (10%) reported having had either a high temperature / fever or a cough. Of these, 58 (28%) ticked a response option marked “I stayed at home and avoided contact with other people.”
- Note, however, that this response option was chosen for the survey before the whole-household isolation policy was announced. It does not map well onto the current guidance, which allows people to have contact with household members. This newer policy was in place at the time participants were completing the survey. This limitation substantially reduces the usefulness of these data.

Adherence to shielding

Key finding

- At present, adherence to shielding is unknown, but 37% to 53% of people have not completely stopped seeing friends or members of the family who do not live with them.

Self-report data

- In Appendix 1, we report the data from the 19-20 March Cabinet Office survey on social distancing for a) respondents aged 70 years or over (n=228) and b) respondents under 70 years with a relevant medical condition (n=294).
- The following percentages relate to those over 70 years of age who report having stopped doing each behaviour entirely or who gave “not applicable, I did not do this anyway” as an answer. Few respondents reported sending children to school or attending a workplace.
 - going to pubs, bars, restaurants or the theatre: 91%
 - attending clubs or taking part in hobbies with other people: 94%
 - seeing friends: 63%
 - seeing members of the family who do not live with me: 58%
 - using public transport: 87%
- The following percentages relate to those under 70 years of age but with a medical condition, who report having stopped doing a behaviour entirely or who gave “not applicable, I did not do this anyway” as an answer.
 - going to pubs, bars, restaurants or the theatre: 90%
 - attending clubs or taking part in hobbies with other people: 94%
 - seeing friends: 63%
 - seeing members of the family who do not live with me: 55%
 - sending your children to school: 94%
 - going to your place of work: 76%
 - using public transport: 84%

- The percentages for these two groups are broadly similar. As for the wider population, the two areas with the greatest room for improvement are seeing members of my family who do not live with me and seeing friends. The caveat as to what “seeing” others means applies here.
- The YouGov daily question poll of 17 March provides a breakdown by age. Among those aged 65 years or over, 66% reported staying inside more, 33% going outside as normal and 1% don’t know.

Recommendations about data collection

- The self-report data currently being collected do not map well onto the recommendations being made to members of the public. Changing this will help provide a better estimate of adherence.
- 10% of survey respondents to the DHSC survey reported having had a new cough or fever in the past 7 days. Given that the Cabinet Office survey is being run daily, using a question about relevant symptoms within that survey could quickly generate a sample of respondents who should be in household isolation. A carefully designed set of questions could identify whether they are adhering to recommendations and if not, why.
- It was clear to us that there is a large number of initiatives underway to collect various social distancing metrics, including surveys, Google data, transport data and much more. We recommend that a single group take ownership of this, ensuring that modelling colleagues are represented to ensure that data are useful for them, and that work towards a dashboard to integrate the multiple data streams is progressed rapidly.

Caveats

- For the survey data, the samples are not random samples of the UK population. Instead they are a sample of people selected from a wider panel who have actively signed up to take part in paid, on-line surveys. There are a range of [caveats](#) that apply to such data and it is not always clear if the absolute numbers in such polls reflect the rates of behaviour in the general population.
- Issues around the representativeness of respondents in on-line polls are particularly important for [older adults](#). Results relating to respondents who are over 70 years old should be treated with caution.
- It is plausible that participants in on-line polls may be less busy than people who do not take part: by definition, they have enough time to be able to complete surveys. Data may therefore underestimate actual activity levels. It is plausible that people who are inclined to

respond to a request to fill in a survey are also more likely to adhere to recommendations from the Government.

- Self-reported behaviour is not the same thing as actual behaviour. There are a variety of biases likely to be at play, including, for example, a desire to present oneself as taking responsible actions during a national crisis.
- Where individual behaviours are reported as having stopped or reduced in survey data, we cannot tell if other behaviours occurred. For example, if participants have reported not going to restaurants, we cannot tell if they went to a friend's house for dinner instead.
- This report was prepared over a 48hr period. During that time, we received many helpful reports from colleagues across Government about sources of data. Because we have not had long to familiarise ourselves with these, it is possible that we have misinterpreted some. We recommend that SAGE and readers within Government cross-check this report with the colleagues who provided these reports.
- We understand that some of the reports we were provided with were preliminary 'early looks' at the data and have not been subjected to standard quality controls. Due to the rapid turn-around required, that caveat also applies to this report.

Appendix 1: Self-reported changes in behaviour. Cabinet Office survey 19-20 March. All data are unweighted.

	Less than 70 years with no relevant medical conditions (n=1,127)					Less than 70 years with a relevant medical condition (n=294)					Aged 70 and over (with or without relevant medical conditions) (n=228)				
Self-reported behaviour	Still doing this as much as usual	Cut it down a little	Cut it down a lot	Stopped doing it entirely	Not applicable, did not do it anyway	Still doing this as much as usual	Cut it down a little	Cut it down a lot	Stopped doing it entirely	Not applicable, did not do it anyway	Still doing this as much as usual	Cut it down a little	Cut it down a lot	Stopped doing it entirely	Not applicable, did not do it anyway
Going to pubs, bars, restaurants or theatre	53/1127 (5%)	46/1127 (4%)	105/1127 (9%)	704/1127 (62%)	219/1127 (19%)	3/294 (1%)	11/294 (4%)	16/294 (5%)	173/294 (59%)	91/294 (31%)	3/228 (1%)	5/228 (2%)	12/228 (5%)	147/228 (64%)	61/228 (27%)
Attending clubs or taking part in hobbies with other people	45/1127 (4%)	34/1127 (3%)	64/1127 (6%)	586/1127 (52%)	398/1127 (35%)	3/294 (1%)	7/294 (2%)	8/294 (3%)	148/294 (50%)	128/294 (44%)	0/228 (0%)	4/228 (2%)	9/228 (4%)	116/228 (51%)	99/228 (43%)
Seeing friends	66/1127 (6%)	89/1127 (8%)	382/1127 (34%)	502/1127 (45%)	88/1127 (8%)	14/294 (5%)	16/294 (5%)	78/294 (27%)	154/294 (52%)	32/294 (11%)	2/228 (1%)	16/228 (7%)	67/228 (29%)	127/228 (56%)	16/228 (7%)
Seeing members of my family	100/1127 (9%)	117/1127 (10%)	386/1127 (34%)	413/1127 (37%)	111/1127 (10%)	25/294 (9%)	19/294 (7%)	87/294 (30%)	127/294 (43%)	36/294 (12%)	6/228 (3%)	16/228 (7%)	75/228 (33%)	109/228 (48%)	22/228 (10%)

who do not live with me															
Sending your children to school	111/1127 (10%)	12/1127 (1%)	21/1127 (2%)	153/1127 (13%)	830/1127 (74%)	14/294 (5%)	0/294 (0%)	3/294 (1%)	40/294 (14%)	237/294 (81%)	0/228 (0%)	0/228 (0%)	1/228 (0.4%)	5/228 (2%)	222/228 (97%)
Going to your place of work	400/1127 (36%)	42/1127 (4%)	89/1127 (8%)	253/1127 (22%)	343/1127 (30%)	52/294 (18%)	5/294 (2%)	14/294 (5%)	74/294 (25%)	149/294 (51%)	4/228 (2%)	2/228 (1%)	1/228 (0.4%)	17/228 (8%)	204/228 (90%)
Using public transport	74/1127 (7%)	36/1127 (3%)	112/1127 (10%)	346/1127 (31%)	559/1127 (50%)	13/294 (4%)	6/294 (2%)	27/294 (10%)	99/294 (34%)	149 /294 (51%)	4/228 (2%)	3/228 (1%)	22/228 (10%)	84/228 (37%)	115/228 (50%)

Appendix 2: Compliance Behaviours Data Summary from SAGE Secretariat

Top lines

- Delivery services, especially for food, are seeing far more interest than this time in 2019.
- Transport has seen substantial reductions in usage, particularly on London mass transit.
- There is less footfall in leisure shopping such as shopping centres but a spike in food spending.
- People are reducing their leisure spending and avoiding crowded tourist places but they are frequenting open spaces like parks more.
- Compliance, based purely the data on transport, seems to be greater in London than elsewhere in the UK.

Notes on the papers:

- The information related to the search results (the 'visuals' return from BEIs does not explain what it is referring to or what the numbers are measurements of. I have taken an educated guess as to what it refers to.
 - o The reason I have included it here is that it can indicate a trend that can contextualise other, more helpful returns.

Transit/Travel.

- Tube ridership fell 76% on Friday 20/03 compared with ridership last year. (TFL)
 - o Bus ridership showed a small decrease of 48%.
- On average, unique mobile data subscribers at UK mainline stations fell 54% in London and 52% in the rest of the UK with the biggest drop in London termini like King's Cross and lower drops seen in Manchester Oxford Road and Birmingham New Street. (DCMS)
- There have been air quality improvements in London and to a lesser extent in Edinburgh, Cardiff, Birmingham and Leeds but not in Manchester. (BEIS)

Leisure.

- Visits to tourist sites has fell sharply with only 19% of usual footfall outside Westminster Abbey. (DCMS)
- Searches for 'restaurants near me' fell by over a half on this time in 2019 in England, just under a half in Scotland and one third in Wales. Only a small decrease was recorded in Northern Ireland (BEIS).
- [REDACTED]
- However, activities in London parks has increased. Activity in Hyde Park and St James has increased by 241% (DCMS)
- [REDACTED]

Shopping.

- [REDACTED]
 - o However unique mobile subscribers at Westfield White City fell by a half and Westfield Stratford fell by 1/3. (DCMS)
- [REDACTED]
- [REDACTED]
- Searches for Opening Times was up 100% on this week in 2019 (BEIS)
- Searches for Ocado were up 900% on this week in 2019. (BEIS)
- Searches for Amazon were up 25%. (BEIS)
- Searches for ASOS was down by roughly a third on 2019. (BEIS)

Jobs.

- Searches for Job Seekers Allowance rose by 300% on this time in 2019. (BEIS).
- Calls to ACAS related to COVID19 went from 87 on 09/03 to 1538 on 19/03. (BEIS)
- Searches for UK Redundancy went up 400% on 2019. (BEIS)

Appendix 3: Passenger numbers provided by TfL



