

# Patients' experiences of virtual care from NSW public hospitals

Results from the 2020 outpatient survey



## **BUREAU OF HEALTH INFORMATION**

1 Reserve Road  
St Leonards NSW 2065  
Australia  
Telephone: +61 2 9464 4444

**bhi.nsw.gov.au**

© Copyright Bureau of Health Information 2021

This work is copyrighted. It may be reproduced in whole or in part for study or training purposes subject to the inclusion of an acknowledgement of the source. It may not be reproduced for commercial usage or sale. Reproduction for purposes other than those indicated above requires written permission from the Bureau of Health Information.

State Health Publication Number: (BHI) 210155

Suggested citation:

Bureau of Health Information. Patients' experiences of virtual care from NSW public hospitals, Results from the 2020 outpatient survey. Sydney (NSW); BHI; 2021.

Please note there is the potential for minor revisions of data in this report.

Please check the online version at **bhi.nsw.gov.au** for any amendments or errata.

Published August 2021

The conclusions in this report are those of BHI and no official endorsement by the NSW Minister for Health, the NSW Ministry of Health or any other NSW public health organisation is intended or should be inferred.

# Table of contents

Introduction	1
Key findings	2
<b>Overview of results</b>	<b>3</b>
Overall experience	4
Benefits and challenges	6
Virtual care environment	7
Timely coordinated care	8
Compassionate care	9
Confidence and trust	10
Engagement in care	11
<b>Appendices</b>	<b>12</b>
Appendix 1 – All survey results	13
Appendix 2 – Methodology	23

# Introduction

NSW Health has identified increased access to digitally-enabled healthcare and improving the patient experience as system-wide priorities.

Virtual care, some elements of which are referred to as telehealth, connects health professionals with patients to deliver care via technologies including telephone and video calls. The use of virtual care has continued to expand in recent years with this growth accelerating during the COVID-19 pandemic.

The Bureau of Health Information (BHI) developed the Virtual Care Survey 2020 to collect information about adult patients' experiences of virtual care outpatient appointments with NSW public hospitals. This forms the first part of a program of work that will help inform improvement in patients' experiences and outcomes of care, and support monitoring and evaluation.

Working with the NSW Ministry of Health's System Information and Analytics Branch, BHI established that 93,945 adult patients were recorded by NSW public hospitals as receiving a virtual healthcare outpatient appointment by telephone or video call during July or August 2020. A representative sample of these (25,560) was selected to receive an invitation to complete an online questionnaire between November 2020 and January 2021. This sample was stratified to be representative at NSW level and across rural and urban local health districts (LHDs), age group (18–49, 50–64, 65+), and type of virtual care consultation (telephone, video call).

Due to the lower number of patients who were recorded as having had a virtual care appointment by video call during this time, a census approach was taken to ensure enough responses to support representative analysis for this group.

The Virtual Care Survey 2020 asked a series of questions specifically about patients' most recent virtual care outpatient appointment, as well as their overall experiences of virtual care outpatient appointments with a NSW public hospital throughout 2020 (not including those with a GP/family doctor).

A total of 2,618 adult patients responded to the invitation to complete the questionnaire.

This report includes:

- Key findings
- Overview of results
- Results for all questions and response options, including additional by-group analysis for selected questions (Appendix 1)
- Technical information about sampling, response rates and analytic methodology (Appendix 2).

Information about questionnaire development is available in the development report for the Virtual Care Survey 2020 at [bhi.nsw.gov.au](https://bhi.nsw.gov.au)

# Key findings

## When reflecting on their overall experiences of virtual care as an outpatient with a NSW public hospital during 2020:



More than nine in 10 patients rated their virtual care as 'very good' or 'good' (91%), and said the virtual care they received helped them (94%).



The more virtual care appointments a patient had, the more positive they were likely to be about their overall experiences.



The benefits most frequently cited by patients were convenience (73%), saving time (60%), feeling at ease in their own home/surroundings (37%) and saving money (30%). A quarter of patients said virtual care gave them more timely access to healthcare (26%) and that they did not have to take as much time off work (25%).



However, almost one-third of patients (31%) said their virtual care experience was not as good as in-person appointments. These were most likely to be younger patients or patients with fewer virtual care experiences. Patients responding to this survey received virtual care at a time when its use increased rapidly during the pandemic. Due to COVID-19 restrictions, they may not have had the option to choose between in-person and virtual appointments.

## When asked to reflect on their most recent virtual care outpatient appointment with a NSW public hospital:



Almost all patients (94%) said they did not experience any problems with the connection or technology during their appointment. A little more than one in 10 (14%) received their virtual care online.



More than nine in 10 patients said health professionals were 'always' kind and caring (91%) and 'always' treated them with respect and dignity (94%).



Patients who had seen the same health professional(s) before (73%) were more likely to report high levels of confidence and trust in them and more likely to rate their overall care as 'very good'.



More than eight in 10 patients said health professionals 'always' explained things in a way they could understand (86%) and 'definitely' listened carefully to their views and concerns (85%). Almost eight in 10 (77%) said they were 'definitely' involved as much as they wanted to be in decisions about their care and treatment.

# Overview of results

# Overall experience

## Most patients had a positive experience with virtual care

Overall ratings of care reflect general measures of patient satisfaction with virtual care.

When asked to reflect on all of their experiences of virtual care as a public hospital outpatient during 2020, most patients gave high ratings of care:

**91%** rated the virtual care they received as 'very good' (69%) or 'good' (22%)

**94%** said the care and treatment they received in their virtual care appointments helped them 'definitely' (67%) or 'to some extent' (27%)

**90%** said, if given the choice, they would use virtual care again 'definitely' (38%) or 'in some circumstances' (52%)

**70%** said they would 'speak highly' of their experience to family and friends

The more virtual care appointments a patient had in 2020, the more positive they were likely to be on each of these overall experience questions. A little under half (46%) of respondents had three or more virtual care appointments as a public hospital outpatient in 2020.

Patients who had an online appointment tended to rate their overall experiences slightly more positively than those who had a telephone appointment.

In general, older and rural patients tended to be more positive about their experiences of virtual care than younger and urban patients. It is important to note this pattern is not unusual in our patient surveys. The results of this survey do show that older and rural patients were less likely to say their virtual care experience was better than an in-person appointment.

Differences between overall experiences on the basis of age, rurality, number of virtual care appointments in 2020, whether they had seen the health professional(s) before and virtual care type are provided in Appendix 1 (beginning page 17).

“

**My virtual care was part of my rehabilitation after being treated for a heart attack. The virtual care backed up and complemented the in-person care I received ... The whole level of care was outstanding.**

”

# Overall experience

However, it is also important to note that some patients were less positive about their virtual care experiences during 2020:

- 3%** rated the virtual care they received as 'poor' or 'very poor'
- 5%** would be 'critical' of the experience if asked by friends and family
- 10%** would not use virtual care again, given the choice
- 31%** said their virtual care experience was 'not as good' as in-person appointments

Patients responding to this survey received virtual care at a time when its use increased rapidly during the pandemic. Due to COVID-19 restrictions, they may not have had the option to choose between in-person and virtual appointments.

Given that 31% of people said their virtual care experiences were not as good as in-person appointments, advanced analytics were used to determine the characteristics of people who held these views. After accounting for age, rurality, sex, number of recent virtual care appointments, whether the patient had previously seen their health professional(s) and type of virtual care (online or telephone), it was found that younger people and people who had fewer virtual care appointments were most likely to hold this view.

**I found the experience less than satisfactory. My condition needed physical examination and I didn't feel well served over the phone.**

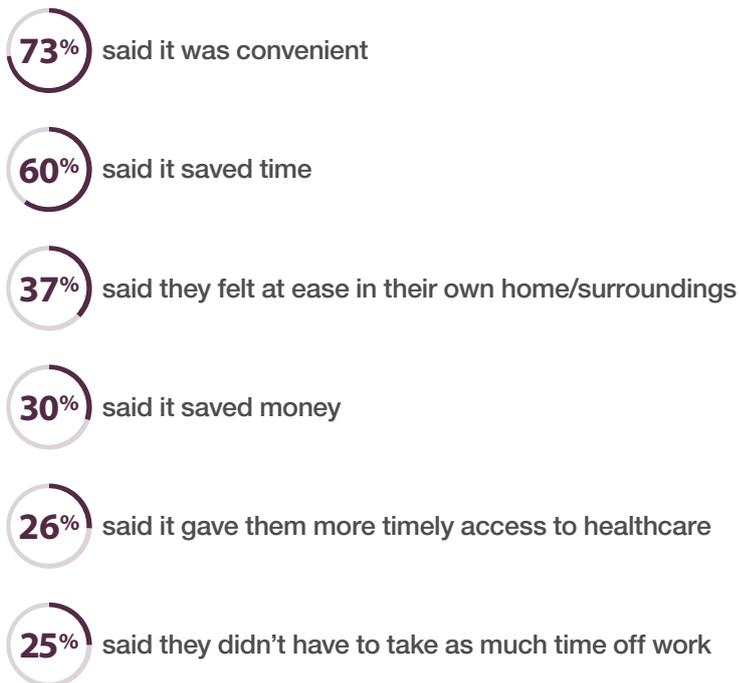
**Not having to attend appointments at hospital that were able to be done over the phone ... gave me peace of mind, especially with COVID and being pregnant.**

# Benefits and challenges

## Patients say convenience and time-savings are standout advantages

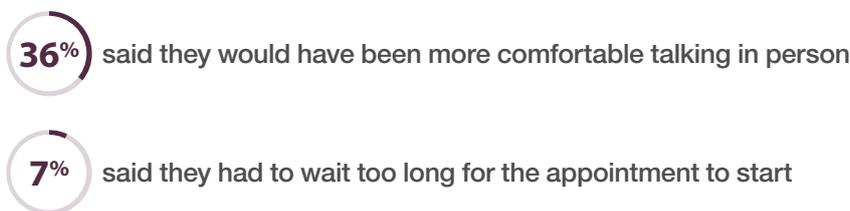
Healthcare professionals have been using technology to deliver care to patients for decades but this option has more recently become increasingly available.

When asked to reflect on all their experiences of virtual care as a public hospital outpatient during 2020, patients told us about the range of benefits and challenges they experienced.



Fewer than one in 10 patients (8%) said their virtual care experience offered no benefits.

Patients also told us about the more challenging aspects of virtual care:



Around half of patients (51%) said they experienced no challenges with their virtual care.

“  
It saved time. I could do it from the comfort of my home and I did not have to worry about parking. It almost felt like a face-to-face consultation.  
”

# Virtual care environment

## Almost all patients said the technology operated effectively

Virtual care offers a distinct experience as compared with in-person appointments. The facilitating technology and patients' freedom to choose the physical environment where they receive care are key to the experience.

When patients were asked about their most recent virtual care outpatient appointment:

**72%** said they received their virtual care via telephone

**14%** said they received their virtual care online

**94%** did not experience any problems with the connection or technology during their appointment

**85%** of those who needed it, received technical support from staff

When asked to select from a range of benefits of virtual care, patients also told us that feeling at ease in their own home and surroundings (37%), and being able to stay closer to home and/or family (29%) were key contributors to a positive experience. When it came to challenges, 36% of patients would have been more comfortable talking in person. For more detailed information on benefits and challenges, see page 6 of this report.

“

**It was easy to see and hear the doctor.  
I understood them clearly and they were  
very friendly and professional.**

”

“

**I sought technical help but they were  
not much help getting me connected  
to virtual operations. We ended up  
communicating via mobile phone.**

”

# Timely coordinated care

## Most patients said appointments were timely and staff were well prepared

Care that is provided in a timely fashion and supported by effective coordination from healthcare providers can help ensure a positive experience for patients throughout their journey of care.

When patients were asked about their most recent virtual care outpatient appointment:

**95%** were able to get a suitable appointment time

**84%** of patients said the health professionals were 'definitely' prepared for the appointment

**81%** of patients said they were themselves 'definitely' prepared for the appointment

Time-saving was one of the most frequently cited benefits by patients (60%). They also identified having timely access to healthcare (26%) and having to take less time off work (25%). In terms of challenges, 7% of patients said they had to wait too long for the appointment to start. For more detailed information on benefits and challenges, see page 6 of this report.

“

The benefit is being able to meet the whole team in one single consultation. The collaboration of the doctors and allied health in one sitting is very helpful.

”

“

It forced me to be much better prepared with documents, understanding test results and focusing the discussion on specific aspects of my condition.

”

# Compassionate care

## Patients were overwhelmingly positive about the compassion shown to them

The respect and kindness offered to patients by healthcare professionals is a fundamental part of the delivery of patient-centred care.

When patients were asked about their most recent virtual care outpatient appointment:

**94%** said health professionals 'always' treated them with respect and dignity

**91%** said health professionals were 'always' kind and caring

“

I was still able to speak to my psychiatrist about my mental health issues even though we were going through COVID.

”

“

I was treated with respect and also listened to ... When I wanted to know anything it was clearly explained by the health professionals in a way that I was able to understand.

”

# Confidence and trust

## Most patients had confidence in staff and felt their privacy was maintained

Confidence and trust in health professionals and the care they provide is vital for patients at a time when many can feel vulnerable and uncertain.

When patients were asked about their most recent virtual care outpatient appointment:

**85%** 'definitely' had confidence and trust in the health professionals treating them

**90%** said their privacy was 'definitely' maintained during their virtual care appointment

**73%** had previously seen the health professionals who delivered their care

Older patients were more likely to say they 'definitely' had confidence and trust in the health professionals (91% among 65+ age group, compared with 78% among 18–49 age group; data not shown).

When asked to select from a range of challenges regarding their virtual care experience, just 4% of patients had concerns about privacy or the security of their health information. For more detailed information on benefits and challenges, see page 6 of this report.

“

**The confidence my healthcare needs were being attended to without the stress of leaving my own home.**

”

“

**It was quick and easy and I felt comfortable because I have known the specialist for a few years now. A virtual appointment with a health professional I was not familiar with would have been a whole different ball game.**

”

# Engagement in care

## Patients rated their engagement with healthcare professionals highly

Informing and involving patients is essential in enabling them to engage fully with their care.

When patients were asked about their most recent virtual care outpatient appointment:

- 86%** said health professionals 'always' explained things in a way they could understand
- 85%** said health professionals 'definitely' listened carefully to any views and concerns about their care
- 77%** were 'definitely' involved, as much as they wanted, in decisions about their care and treatment
- 79%** were 'definitely' given enough information to manage their care between appointments
- 88%** were told who to contact if they were worried about their condition or treatment after their appointment

A small proportion of patients felt less informed and involved:

- 4%** said they were not involved, as much as they wanted, in decisions about their care and treatment
- 5%** said they were not given enough information to manage their care between appointments
- 12%** said they were not told who to contact if they were worried about their condition or treatment after their appointment

“

My care nurse was friendly, answered any questions I had with knowledge and explained things in a way I understood.

”

# Appendices

# Appendix 1

## All survey results

This section includes results for all performance questions from the Virtual Care Survey 2020, along with selected contextual questions.

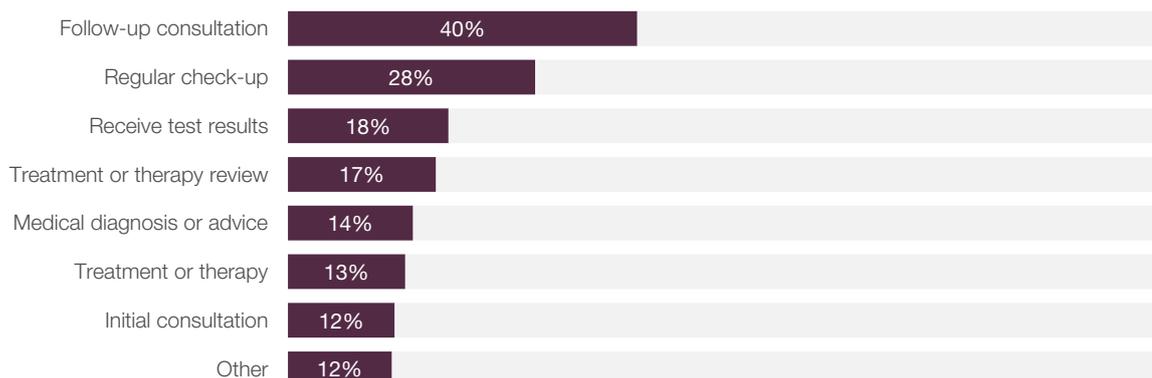
Other than the first four questions, which describe respondents' virtual care appointments and have been organised together based on their common multi-response format, questions appear in the same order, and under their respective headers, as in the questionnaire.

Results are presented for each response option for all questions. For those overall experience questions where BHI's analyses identified insights could be gained from further by-group breakdowns, results are also presented by age, rurality (according to LHD), number of virtual care appointments in 2020, whether they had seen the health professional(s) before and type of virtual care (telephone or online).

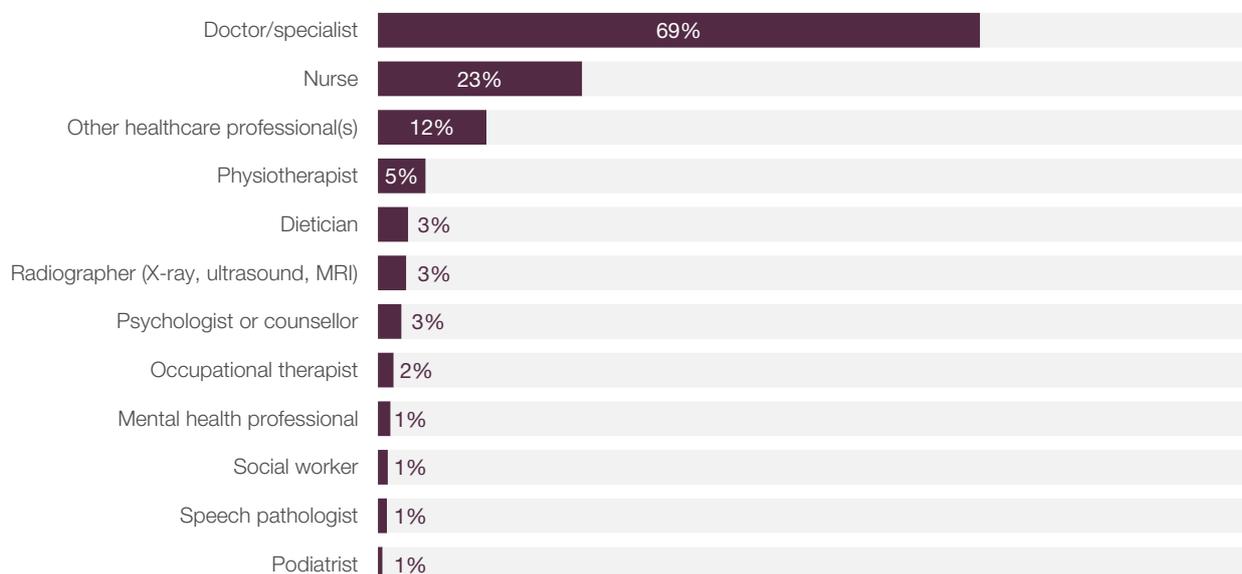
Results for questions from the 'About you' section of the questionnaire are not included in this report.

## My virtual care appointment

### Q1 What was the purpose of your most recent virtual care appointment?



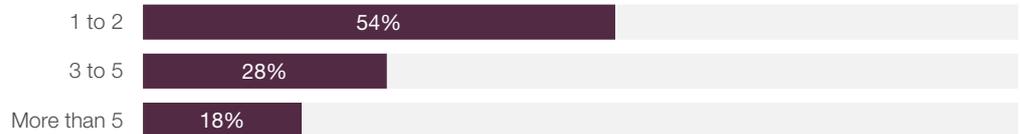
### Q3 Who did you see during this virtual care appointment?



**Q5** What kind of virtual care did you use at your most recent appointment?

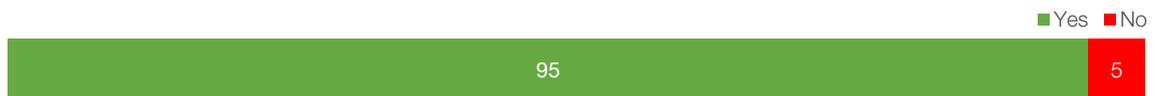


**Q10** How many virtual care appointments have you had in 2020 with a hospital or outpatient centre (not counting any appointments with your general practitioner/family doctor)?



For the following questions in the ‘My virtual care appointment’ section, respondents were asked to think about their most recent virtual care outpatient appointment with a public hospital, not with their general practitioner/family doctor.

**Q2** Were you able to get an appointment time that suited you?

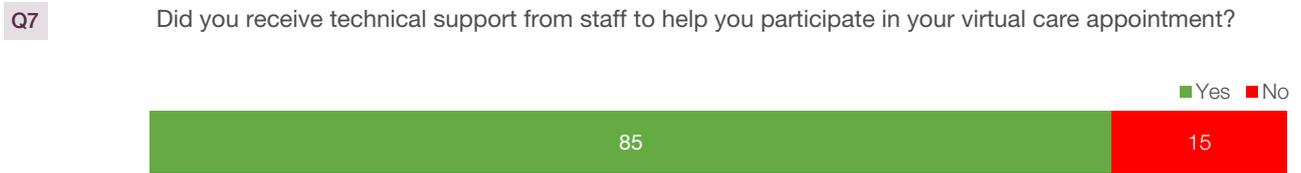


**Q4** Had you seen this/these health professional(s) before, either in person or via telephone or video?



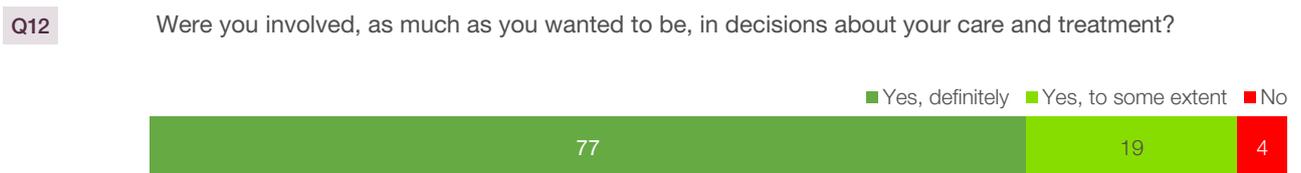
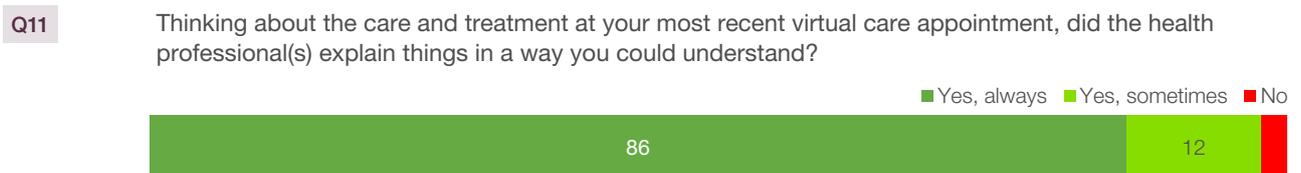
**Q6** Did you experience any problems with the connection or technology during this virtual care appointment?

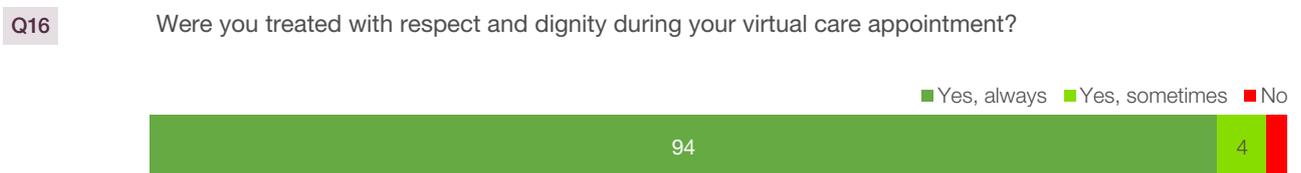
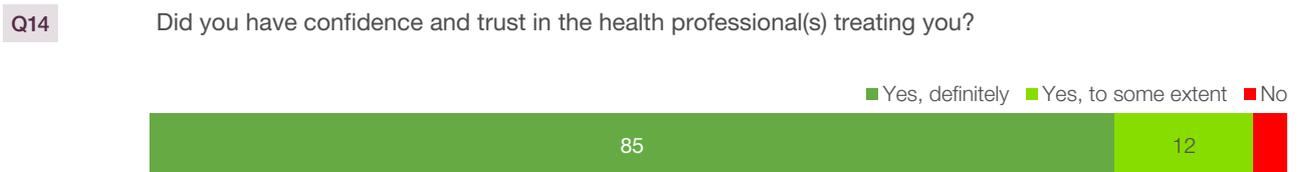
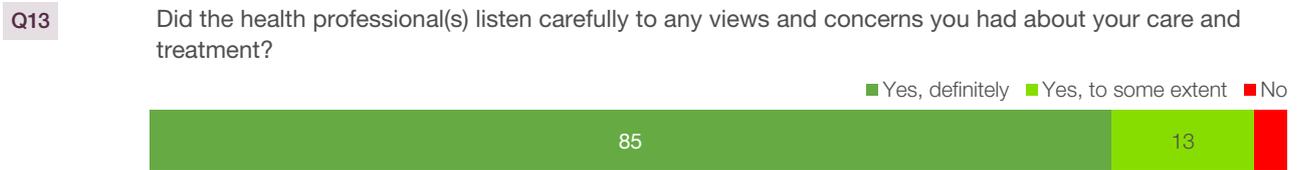




## My care and treatment

For questions in the 'My care and treatment' section, respondents were asked to think about their most recent virtual care outpatient appointment with a public hospital, not with their general practitioner/family doctor.

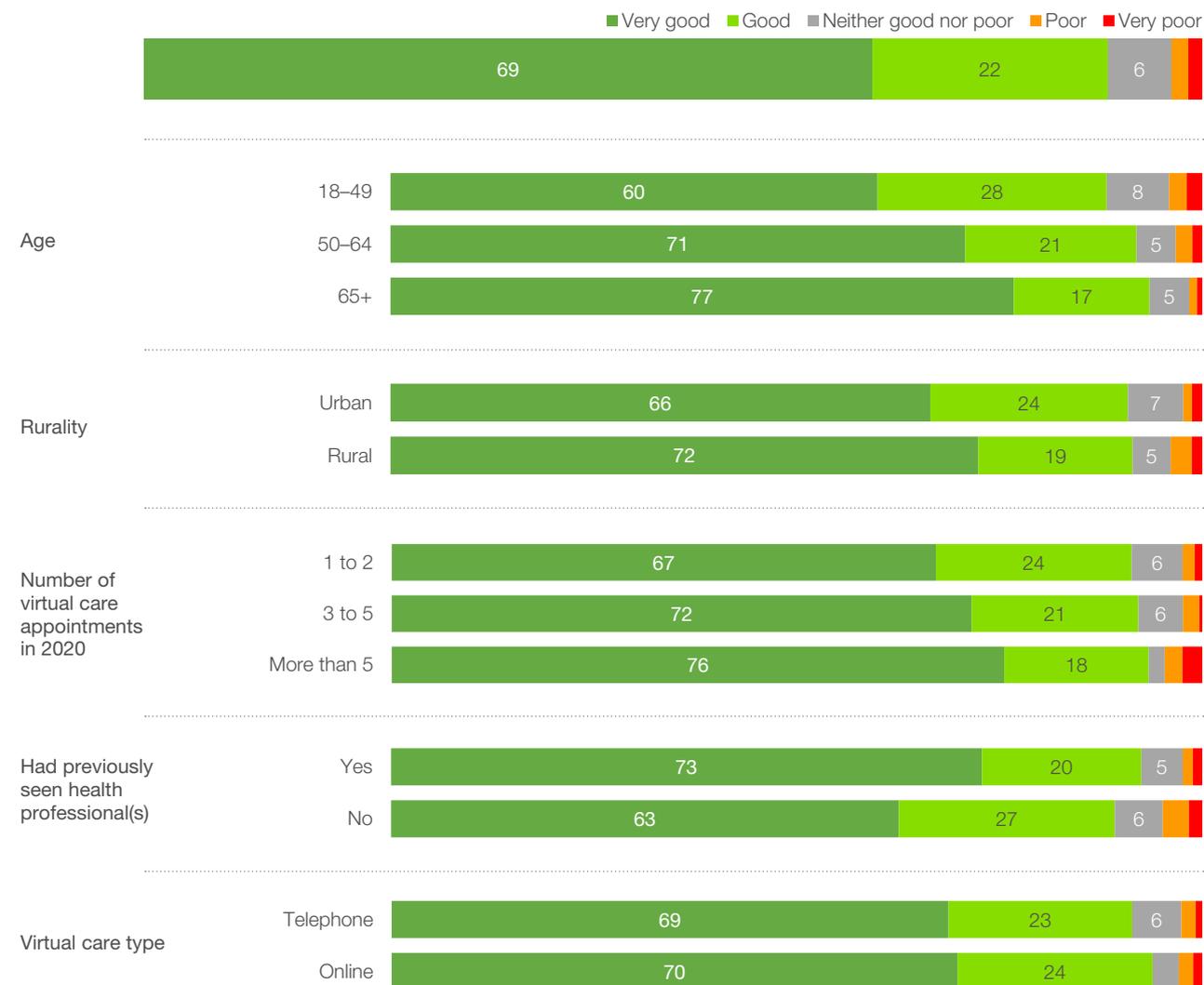




## My overall experience

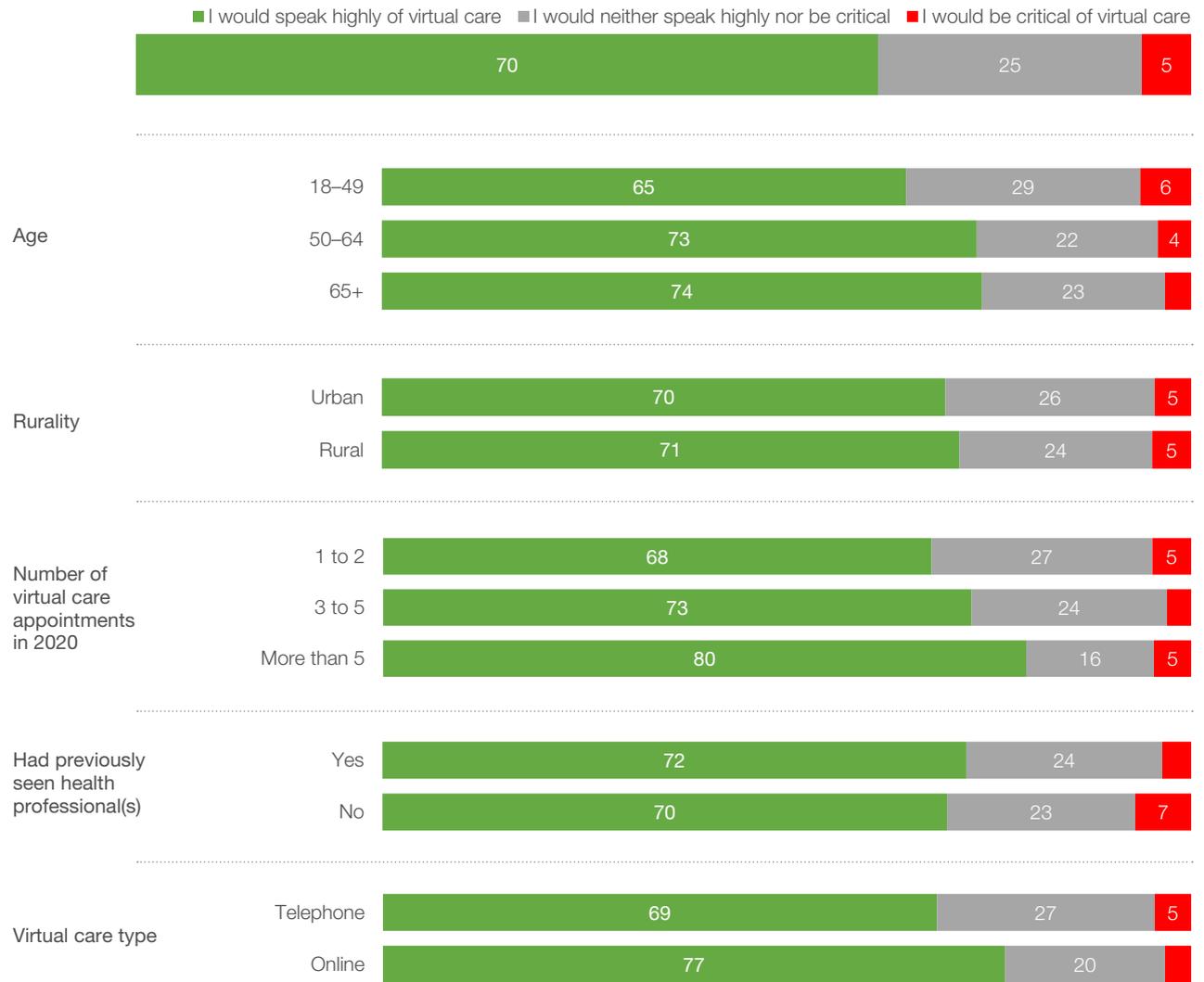
For questions in the 'My overall experience' section, patients were asked to think about all of their experiences of virtual care outpatient appointments with a public hospital in 2020, not with their general practitioner/family doctor.

**Q20** Overall, how would you rate the virtual care you received?



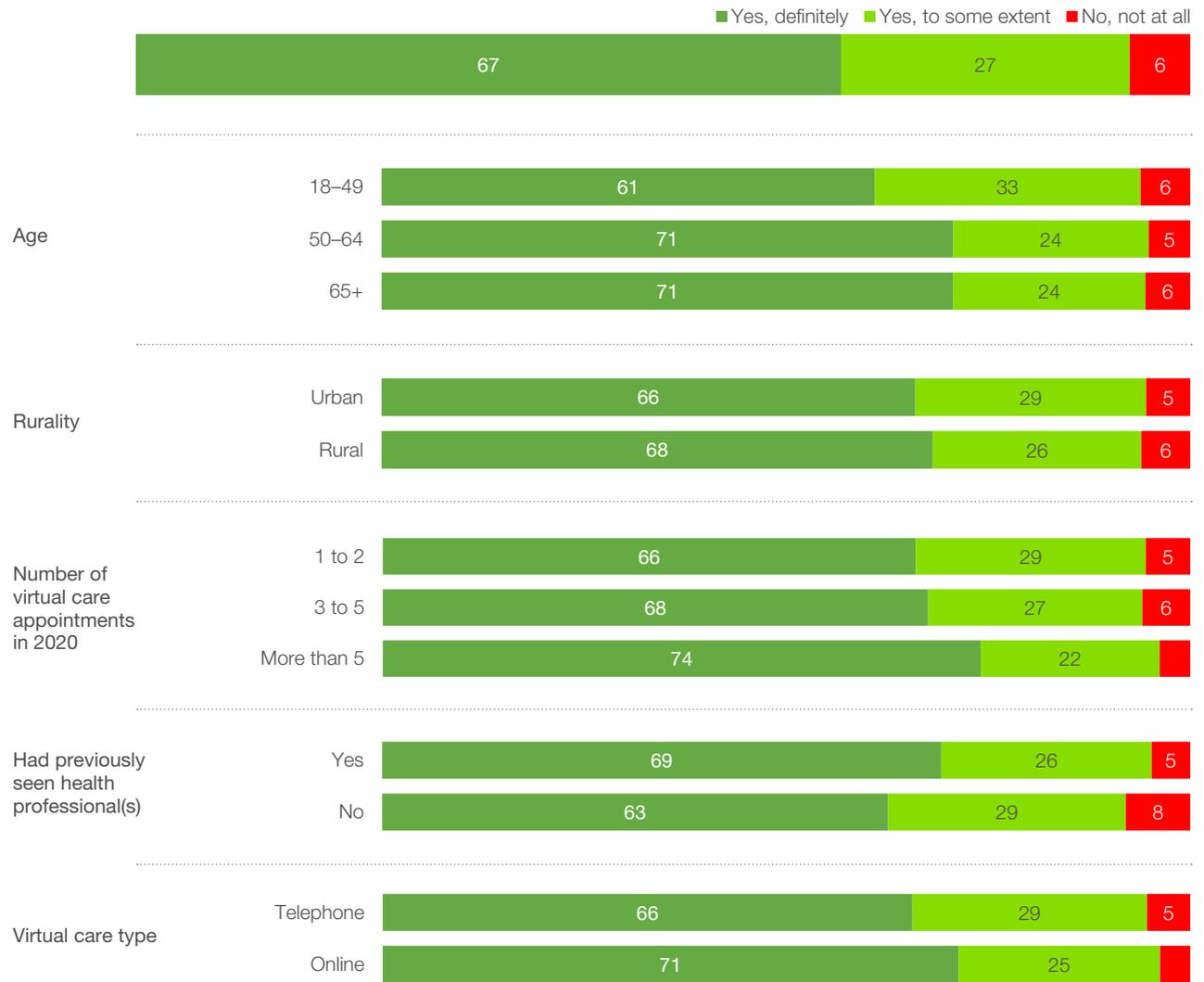
**Q21**

If asked about your virtual care experience by friends and family, how would you respond?



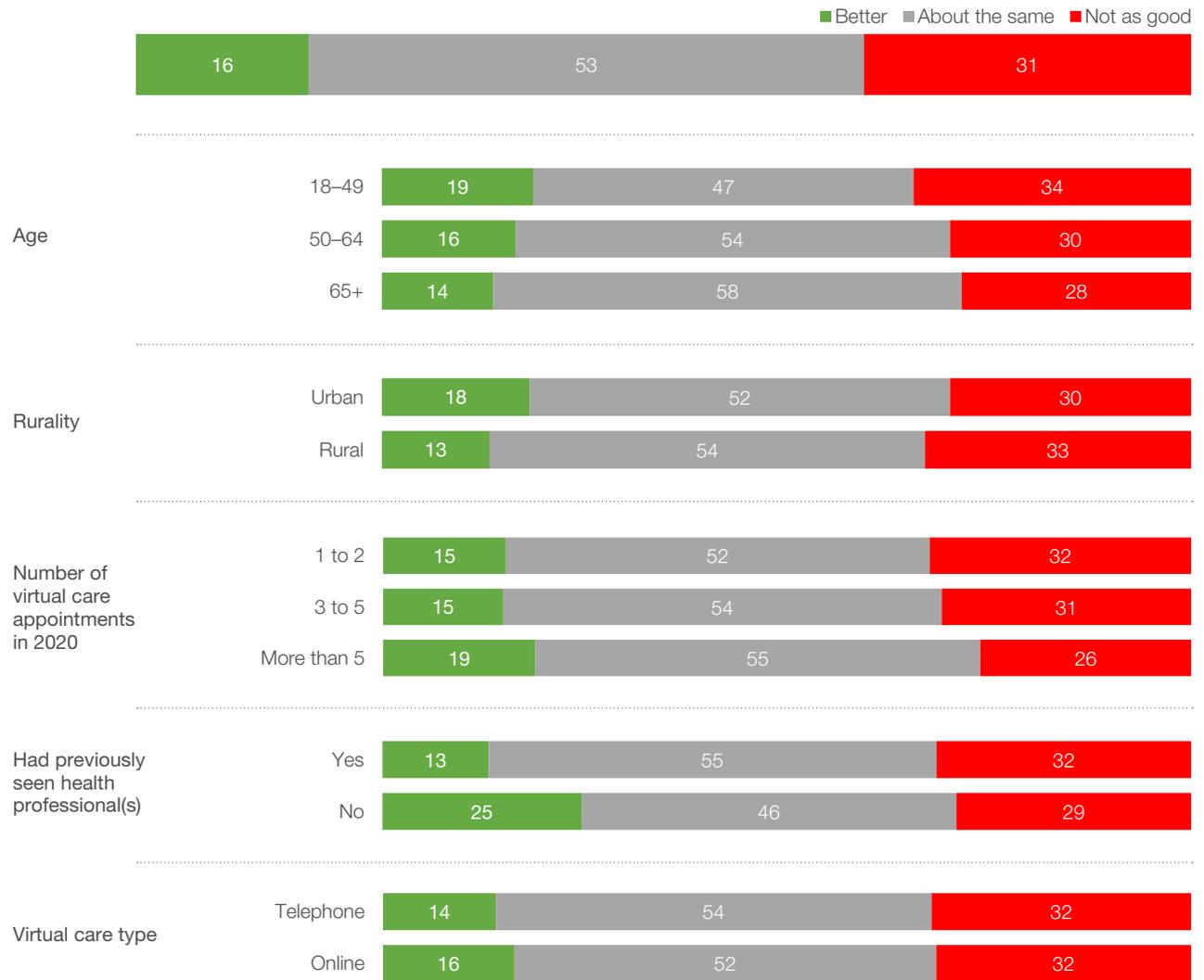
Q22

Did the care and treatment received through virtual care help you?



Q23

Compared to in-person appointments, was your virtual care experience...?



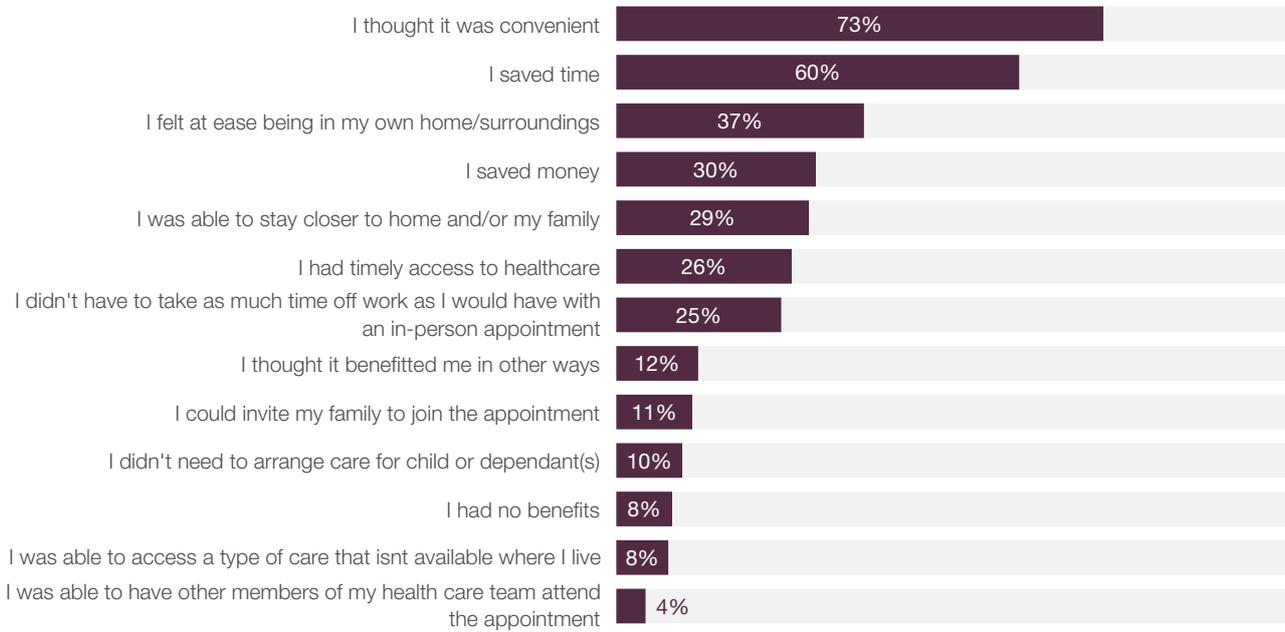
Q24

If given the choice, would you use virtual care again?



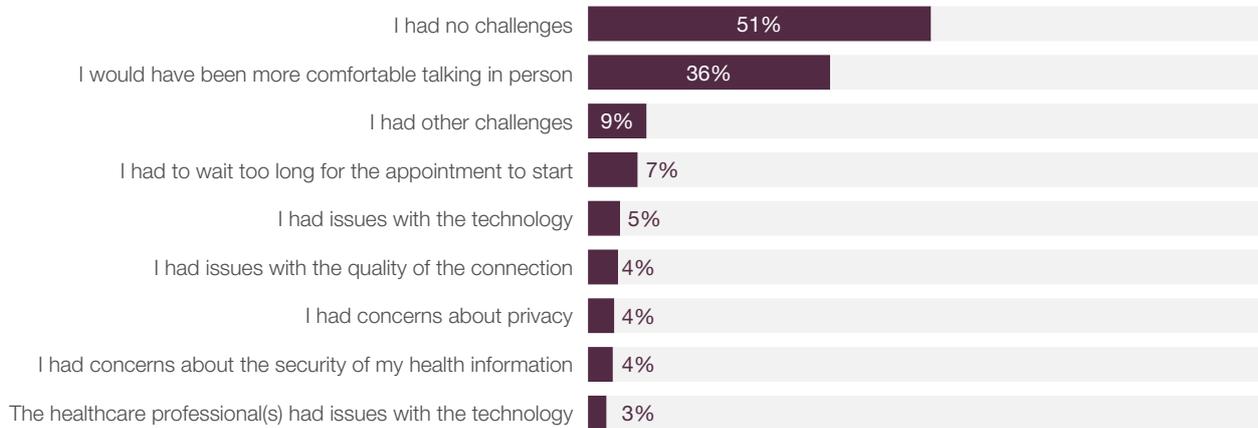
Q25

Thinking about your experiences of virtual care, what have been the benefits for you?



Q26

Thinking about your experiences of virtual care, what have been the challenges for you?



# Appendix 2

## Methodology

This document outlines the sampling methodology, data management and analyses of the results of the first NSW Virtual Care Survey.

The Virtual Care Survey 2020 asked a representative sample of patients a series of questions specifically about their most recent virtual care outpatient appointment, as well as their overall experiences of virtual care outpatient appointments with a NSW public hospital throughout 2020.

### Sampling

Sampling for the NSW Patient Survey Program is a collaboration between BHI and the NSW Ministry of Health's Systems Information and Analytics (SIA) Branch.

The non-admitted patient (NAP) data is the only state-level data source that currently includes information on service contact mode, which is necessary to distinguish a virtual care consultation type from an in-person appointment.

Patients were eligible for sampling if they:

- received virtual healthcare in service contact modes 2 (Audio), T (Audio), N (Audiovisual), P (Audiovisual) or C (Audiovisual), and
- the service took place in July and August 2020 for patients who received audiovisual services.

Patients were ineligible for sampling if they:

- were under the age of 18 at the time of their virtual care appointment
- had been sampled in any other BHI survey in the past 6 months
- received care by a contracted service provider or through a self-service without the involvement of a clinician
- attended clinics determined to be out of scope, including sexual health, palliative care, specialist mental health and dental

- had invalid contact information
- were on the 'do not contact' list
- were recorded as deceased at the time of sampling.

Sampling for the Virtual Care Survey 2020 was designed to be representative at NSW level, stratified by consultation type (telephone or video), local health district (LHD) type (rural or urban) and age (18–49, 50–64 and 65+).

Of the 93,945 patients eligible for sampling, 25,507 were invited to complete a survey. Due to the low number of patients who were recorded as having a virtual care appointment by video during this time, a census approach was taken to ensure enough responses to support representative analysis for this group. As such, all of these patients received an invitation to participate in the survey.

A breakdown of the eligible and sampled patient populations by strata is shown in Table 1.

### Data collection and statistical analysis

An invitation with a QR code and link to an online questionnaire was mailed from 9 November 2020, with responses received between November 2020 and January 2021. One reminder letter was sent. This approach was adopted both for speed and because it was decided that a paper questionnaire was not the appropriate format for a virtual care survey (note that the invite had to be mailed in the absence of a reliable source of email and mobile contact details for patients).

This approach did, however, mean that the response rate was expected to be lower than usual, and sampling numbers were adjusted accordingly. The target response rate for the survey was 10% (or ~2,500 patients). A total of 2,618 patients responded to the invitation to complete the survey questionnaire, a response rate of 10.3%.

Patients' responses were weighted according to the survey's sampling design using the weights listed in Table 1. Weighting survey responses in this way reduces response bias and improves representativeness of the results to better reflect the overall population of interest.

For this survey, the weights enable a better representation of the opinions of NSW adults who had one or more virtual care outpatient appointments with a NSW public hospital in 2020. As such, the results in this report are representative at NSW level for those patients across rural and urban LHDs, age groups and type of virtual care appointment.

## Additional advanced statistical analysis

Additional advanced statistical analysis using GEE modelling was applied to the results of Question 23, which asked patients about their experiences of virtual care in comparison with in-person appointments. Around three in 10 patients (31%) said virtual care was 'not as good' as in-person appointments.

After accounting for the stratified sampling design, the proportion of patients who said that their virtual care experience was 'not as good' as an in-person appointment was modelled as a function of age (18–49, 50–64, 65+), LHD rurality (rural, urban), number of previous consultations in 2020 (1–2, 3–5, more than 5), whether they had previously seen their health professional (yes, no) and gender (male, female).

Table 1 Responses, mailings, response rate, eligible population and weights applied by population group, Virtual Care Survey 2020

Mode	LHD rurality	Age	Responses	Mailings	Response rate	Eligible population	Weight
Telephone	Rural	18–49	103	2,100	4.9%	11,959	116.1
		50–64	258	2,100	12.3%	7,174	27.8
		65+	217	2,100	10.3%	14,361	66.2
	Urban	18–49	146	2,091	7.0%	19,012	130.2
		50–64	236	2,093	11.3%	10,326	43.8
		65+	226	2,093	10.8%	18,153	80.3
Video	Rural	18–49	103	1,250	8.2%	1,250	12.1
		50–64	149	917	16.2%	917	6.2
		65+	191	1,596	12.0%	1,599	8.4
	Urban	18–49	308	4,784	6.4%	4,802	15.6
		50–64	331	2,244	14.8%	2,249	6.8
		65+	350	2,139	16.4%	2,143	6.1
<b>Total</b>	<b>All</b>	<b>All</b>	<b>2,618</b>	<b>25,507</b>	<b>10.3%</b>	<b>93,945</b>	<b>-</b>

## About the Bureau of Health Information

The Bureau of Health Information (BHI) is a board-governed organisation that provides independent information about the performance of the NSW healthcare system.

BHI was established in 2009 and supports the accountability of the healthcare system by providing regular and detailed information to the community, government and healthcare professionals. This in turn supports quality improvement by highlighting how well the healthcare system is functioning and where there are opportunities to improve.

BHI manages the NSW Patient Survey Program, gathering information from patients about their experiences and outcomes of care in public hospitals and other healthcare facilities.

BHI publishes a range of reports and information products, including interactive tools, that provide objective, accurate and meaningful information about how the health system is performing.

BHI's work relies on the efforts of a wide range of healthcare, data and policy experts. All of our assessment efforts leverage the work of hospital coders, analysts, technicians and healthcare providers who gather, codify and supply data. Our public reporting of performance information is enabled and enhanced by the infrastructure, expertise and stewardship provided by colleagues from NSW Health and its pillar organisations.

**[bhi.nsw.gov.au](http://bhi.nsw.gov.au)**