Since January 2020 Elsevier has created a COVID-19 resource centre with free information in English and Mandarin on the novel coronavirus COVID-19. The COVID-19 resource centre is hosted on Elsevier Connect, the company’s public news and information website.

Elsevier hereby grants permission to make all its COVID-19-related research that is available on the COVID-19 resource centre - including this research content - immediately available in PubMed Central and other publicly funded repositories, such as the WHO COVID database with rights for unrestricted research re-use and analyses in any form or by any means with acknowledgement of the original source. These permissions are granted for free by Elsevier for as long as the COVID-19 resource centre remains active.
Identifying the needs of our older community-based patients in the COVID era: A telephone survey

Danielle Ní Chróinín b, a, Carol Lu Hunter a, b, Michaela Shaw-Jones a, Esther Duruchukwu a, b, Frank Huang a, b, Amy Ngov b, Ashley Wang b, Alex Yu b, E Ní Shé c, d

a Liverpool Hospital, Liverpool, New South Wales 2170, Australia
b South Western Sydney Clinical School UNSW Sydney, Liverpool, New South Wales 2170, Australia
School of Population Health, UNSW Sydney, Kensington, New South Wales 2033, Australia
Australian Institute of Health Innovation, Macquarie University, North Ryde, New South Wales 2109, Australia

A R T I C L E   I N F O
Keywords:
COVID-19
Aged
Community care
Surveys and questionnaires
Social support

A B S T R A C T

Background: Older people’s vulnerability during a pandemic may extend to social connectedness, access to healthcare, and information delivery. We sought to identify whether and how older community-based patients are maintaining connections and accessing information during COVID-19.

Methods: We administered a telephone questionnaire to all patients (or carer/proxy answering ‘on patient’s behalf’) who previously attended our Geriatric Medicine clinic, May-December 2019.

Results: Response rate was 58.8% (151/257), carer respondents comprising 23.8% (36/151). Mean patient age was 81.8 years (SD 8.6); 59.6% were female, 15.2% lived alone. English was the preferred language for 72.9% (110/151). Almost half (46.4%, 70/151) felt COVID-related restrictions had impacted them. Thirty-eight percent (58/151) reported feelings of social isolation, most (38/58) reporting this new since COVID. Nonetheless, 92.1% (139/151) reported maintaining social connections, all with family (139/139), less often with friends (69.8%, 97/139). COVID-related information sources included television 68.9% (104/151), family/friends (54.3%), healthcare providers (24.5%), and written sources (21.2%, 32/151); 12.6% used online resources. Increasing age lowered likelihood of accessing online information, while having smartphone/computer increased. Most (82.6%) believed their healthcare needs were being met, and 76.1% had accessed their GP, 87% (100/115) in-person. Only 33.1% (50/151) agreed telehealth acceptable, more often those with smartphone/computer (OR 2.15, p=0.04).

Conclusions: Interventions to reduce isolation and optimize connectedness and healthcare- despite physical distancing- are important during COVID-19. During a rapidly evolving pandemic, healthcare delivery and information provision to our older population is likely best served by a multifaceted approach which acknowledges identified preferences, practices and barriers.

Introduction

In March 2020 the News South Wales (NSW) state government in Australia issued a stay home order, advising older people over the age of 70 to distance themselves from other people. [1] Despite a significant focus on the impact of COVID-19 on residential aged care in Australia, [2] its impact on the lives of older people living in the community is less well explored. [3] Policies created in response to COVID-19 that might increase social isolation and loneliness amongst older adults, [4,5] and engagement via digital or telehealth alone may be insufficient. [6] Telephone contact may be a suitable replacement to face-to-face contact as a means to maintain social connections. [7-9] Some older people may have difficulty accessing or understanding information, due to a variety of reasons. [10] However, in a recent UK telephone survey on the impact of COVID-19, older respondents largely reported good health and low levels of anxiety. [11] As COVID-19 lockdown commenced in NSW, as elsewhere, [12] many out-patient departments rapidly shifted towards ‘virtual’ consultations to provide remote care to patients. However, data are limited on how older people were accessing resources, staying socially connected, and how restrictions and changes in delivery impacted on healthcare access. Our hospital located in south western Sydney serves a culturally and linguistically diverse population; 43% of the population are born overseas, with 62% speaking a language other than English at home. [13]

* Corresponding author.
E-mail addresses: danielle.nichroinin@health.nsw.gov.au, audmnnic@ymail.ucc.ie (D.N. Chróinín).

https://doi.org/10.1016/j.ahr.2022.100073
Received 30 August 2021; Received in revised form 10 September 2021; Accepted 6 April 2022
Available online 8 April 2022
2667-0321/© 2022 The Authors. Published by Elsevier B.V. This is an open access article under the CC BY-NC-ND license (http://creativecommons.org/licenses/by-nc-nd/4.0/)
We sought to explore if the health information, social and health needs of our older community-based patients were being met in the COVID era, aiming to better informing service and care planning.

Materials and methods

In May/June 2020, we administered a telephone questionnaire (Appendix A) to all patients (or carer answering 'on patient’s behalf') who previously attended Liverpool Hospital geriatric medicine clinic, May–December/2019. Survey development was guided by literature review and stakeholder consultation with aged care clinicians (medical, nursing, consumer representative). Pilot testing was conducted with a small number of consumers prior to finalization.

The list of eligible patients was identified through the clinic database. Patients were contacted by telephone, and offered the opportunity to participate. Researchers obtained verbal consent to proceed. If the patient themselves was unable to partake, and did not decline participation, the carer was asked if they might answer questions on the patient’s behalf.

We anticipated that some respondents may need additional supports during COVID-19 and provided a contact number for the clinical research team in case they had concerns. Data were deidentified.

This Quality Improvement project was approved by the district Human Research Ethics Committee (LIV114/2020/20).

Statistical analysis

In addition to descriptive summary statistics, we investigated whether patient characteristics were associated with pre-determined outcomes of interest: information sources, finding telehealth acceptable, and feeling socially connected/isolated. Rather than employ a more restrictive model, factors that were potentially associated with outcomes of interest on univariate analyses (p<0.10) were included in the initial multivariable logistic regression models, but excluded from subsequent models if statistical significance (p<0.05) was then not observed. Numerical data were analysed using Stata® v13.0 (StataCorp®, USA). Additional thematic analysis of open free-text answers captured frequencies of terms used. [7]

Results

Response rate and patient characteristics

Amongst 257 patients potentially eligible for inclusion, final response rate was 58.8% (151). Of 106 excluded, commonest reasons were failure to contact (67%, 71/106), and patient declining participation (11%; 12); at least 9% (10) had died.

Respondents comprised patients (76%; 115/151), or carer answering on patient’s behalf (36/151; 33 family ‘carer’, 3 ‘other carer’). Patient mean age was 81.8 years (SD 8.6 years); 60% (90/151) were female, 15% (23) lived alone, 19% drive. Preferred language was English for 73% (110), followed by Spanish, Vietnamese (both 9/41) and Italian (7/41); 85% (128) were able to answer in English, the remaining 15% (23) having an English-speaking carer assist.

Information resources

Where were older people accessing information relating to COVID-19? Television was commonest, followed by family/friends (Table 1). Older people were less likely to access online information (OR/year increase 0.93, CI 0.88–0.98, p=0.006), while having smartphone/computer increased odds (OR 4.44, CI 1.164–12.01, p=0.003). Men less often sourced information from healthcare professionals (OR 0.38, CI 0.17–0.88, p=0.025) than women.

Overall, 86.7% reported the level of information was ‘just right’ (Table 1). In terms of difficulty understanding information, amongst 47 free-text responses, 19 reported (impaired) cognition contributing to difficulties; other themes included lack of clarity in information especially regarding quarantine/restrictions, misinformation/speculation, language barriers and medical jargon.

Maintaining social connections

Only 22% (33) reported using a smartphone and 16% a computer (28% having ≥1 of these). Almost half (45%, 68/151) reported having felt some impact of COVID-19 restrictions. Commonest themes amongst free-text responses included limitations of social activities (29/97), visitors (23/97), and essential services (10/97), the need for ‘social distancing’, and loss (routine, freedom). Frequently used words indicated restriction and perhaps disempowerment: ‘cannot’ (go out/exercise/hug), ‘stuck’ (indoors/in house), ‘staying’ (in home/indoors).

Thirty-eight percent (58) reported feeling isolated, two thirds of these (38/58) reporting this was new since COVID-19. However, 92% felt they had maintained social connections, more often with family (139/139) than friends (70%, 97/139); Table 2 details means used. Patient characteristics or technological resources were not associated with feeling socially connected or isolated (all p>0.1).

Healthcare needs

Most (83%, 123/151) believed their healthcare needs were being met, and 76% (115) had accessed their GP, 87% (100/115) in-person. Only 33% (50/151) agreed telehealth acceptable, more commonly those with smartphone/computer (OR 2.15, 95% CI 1.02–4.51, p=0.04).

Table 1

| Sources of information                  | N (%)  |
|----------------------------------------|--------|
| Television                             | 104/151 (69) |
| Family/friends                         | 82/151 (54) |
| Written resources                      | 32/151 (21) |
| Newspapers (English or other,)         | 18/32 (56% of subgroup) |
| Government flyers                      | 4/32 (13% of subgroup) |
| Information from aged care providers    | 4/32 (13% of subgroup) |
| Unspecified                            | 2/32 (6% of subgroup) |
| healthcare providers                   | 37/151 (25) |
| GP                                     | 23/37 (62% of subgroup) |
| Other                                  | 14/37 (32% of subgroup) |
| Radio                                  | 28/151 (19) |
| Online resources                       | 19/151 (13) |
| Named specific site                    | 8/19 (42% of subgroup) |
| News website/app                       | 5/19 (26% of subgroup) |
| Facebook/social media                  | 2/19 (11% of subgroup) |
| Government website                     | 1/19 (5% of subgroup) |
| National helpline                      | 1/151 (<1) |

Table 2

| Means of maintaining social connections | N (%)  |
|----------------------------------------|--------|
| Telephone                              | 113 (75) |
| In-person                              | 100 (66) |
| Video-conferencing                     | 32 (21) |
| Other social media was infrequent      | 5 (2)  |
| Shopping                               | 11 (7)  |
| Exercise                               | 5 (3)   |

47 free-text responses, 19 reported (impaired) cognition contributing to difficulties; other themes included lack of clarity in information especially regarding quarantine/restrictions, misinformation/speculation, language barriers and medical jargon.
tive/language/sensory barriers). Within 65 free-text responses suggesting additional helpful resources needed, community physiotherapy (15/65), home services (7) and technological enhancements (7; 3/7 suggesting dementia-specific technologies) featured; 25/65 reported nil additional resources were required.

Excluded patients

Excluded patients were of similar age (mean 82 years; p=0.86) and sex (67% female, p=1.0) to included patients.

Discussion

In this survey of community-based older patients during the COVID-19 pandemic, we identified that many older persons felt they had maintained social connections and that healthcare needs were being met. However, almost one fifth reported their healthcare needs were not adequately met, and new social isolation was not uncommon.

Telephone and in-person interactions enabled social connections more than social media or digital technology. Patients partaking in this study reported deriving COVID-19 information mostly from television and family/friends, which may be important when looking to disseminate information about COVID, vaccines and other healthcare topics. Cognitive difficulties, language barriers, misinformation and medical jargon all featured as concerns with available information. Standardised information from NSW Health and other health services has been made available not just through online resources, but also through liaison between the department’s media team and journalists, and interdepartmental collaboration to deliver advertising campaigns targeting diverse NSW communities and populations. [14] However, we acknowledge that information obtained elsewhere via media or family/friends may not be subject to similar rigorous controls and quality assurance.

Telehealth was not popular, with lack of rapport, technological issues and cognitive, sensory and language barriers featuring as concerns. Telemedicine ‘unreadiness’ is not a specifically Australian issue—a 2018 survey of >4000 US adults indicated that, based on their data, an estimated 13 million older US adults were telemedicine ‘unready’ [15].

While the internet has been mooted to be a human right, [16] not all older persons may use a device, or wish to. Almost three-quarters of our respondents reported not using a smartphone/computer. This is higher than that in a large US study of adult Medicare beneficiaries, where 40% lacked access to both computer and phone, but they noted this figure was influenced by age, educational attainment, disability and ethnicity. [17] It is important that technological privilege not dictate healthcare information, access and social inclusion. While state-wide easing of restrictions has seen some return to usual out-patient clinic practices, the unpredictability of COVID-19 surges means contingency plans must ensure that older vulnerable people are not disadvantaged if the situation changes.

While most patients reported maintaining social connections, especially with family, many reported social isolation and/or negative themes in relation to the impact of COVID. Isolation is strongly linked to depression, anxiety and cognitive decline, and reduces resilience factors—self-worth, sense of purpose and feeling valued. [18] Longer term outcomes of COVID-related restrictions on the mental health and quality of life of older persons— and indeed the impact of easing restrictions and re-engagement with ‘normality’- [19] are yet unknown.

Limitations of this study include that being drawn from a single center study and that patients were recruited from geriatric medicine clinic lists, meaning that data may not be representative of all older persons. We acknowledge the possibility of selection bias. Those unable to partake may be even more vulnerable. Our response rate of 59% was modest, but telephone surveys may trump other survey types, and our response rate was higher than some groups have reported. [20] The sample size precluded in-depth investigation of subpopulations and has limited power to detect associations between variables. This study was undertaken in mid-2020, a few months into the COVID-related constraints; prolonged social restrictions may have even more profound effects, and we cannot speak to practices and preferences during the most recent wave of the pandemic. Finally, while we endeavored to explore patient viewpoints, we did not delve into themes in detail. However, these data provide some insight into experiences and preferences of community-dwelling older Australians, at least within the population surveyed.

Moving forward, in addition to longitudinal follow-up of outcomes to assess longer-term sequela, and studies sampling a broader sample of the population, further work might concentrate on overcoming difficulties with available information, and exploring concerns regarding telehealth in-depth, to investigate if acceptability to older patients can be improved and/or appropriate alternatives identified.

We conclude that in the rapidly evolving context of a pandemic, healthcare delivery and information provision to our older population is likely to be best served by a multifaceted approach, cognizant of identified preferences, practices and potential barriers. Policy responses should focus on co-designing interventions with older people to reduce isolation and maximize means to maintain social connectedness— despite physical distancing.

Conflicts of Interest

No conflicts of interest to declare.

Funding/financial support

No specific funding received.

Declaration of Competing Interests

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

CRediT authorship contribution statement

Danielle Ni Chróinín: Conceptualization, Investigation, Formal analysis, Supervision, Writing – original draft, Writing – review & editing. Carol Lu Hunter: Investigation, Writing – review & editing. Michaela Shaw-Jones: Investigation, Writing – review & editing. Esther Duruchukwu: Investigation, Writing – review & editing. Frank Huang: Investigation, Writing – review & editing. Amy Ngov: Investigation, Writing – review & editing. Alex Wang: Investigation, Writing – review & editing. E Ni Shé: Formal analysis, Writing – original draft, Writing – review & editing.

Acknowledgments

We thank the patients and carers who participated in this study.

Appendix A. Telephone survey

[Introduction, consent and contact details for team if queries/concerns]

Respondent details

Respondent (circle): Patient or carer (family/other) Preferred language (circle): English/other (specify) Able to answer questions in English (circle): yes/no Sex (circle): male/female [If carer answering questions, they are to answer on behalf of the patient, not themselves]

Information sources

Where have you been getting most of your information about Coronavirus and COVID-19 (the illness due to Coronavirus)? Online (which
With 19/Coronavirus? What, have you found social restrictions (social distances, isolation, business closures) impacted on you?

Do you feel socially isolated? If yes: is this new since COVID-19?/Coronavirus? Yes/No

Have you been able to maintain social connections? with family? With friends? How? e.g. telephoning, video-conferencing (Whatsapp, Skype, Facetime), other social media (Facebook, Whatsapp, similar), in-person visits (e.g. for family to provide necessary care), exercise, someone taking you shopping?

Helpful resources

What resources would you find helpful at this time?

Which of the following would be helpful: More health information, better technology, structured exercise programs, transport options, improved access to health providers (in-person or tele-health), more entertainment options, other (specify)?

Meeting healthcare needs

Do you feel your healthcare needs are being met at this time? If not, in what way?

Have you attended your GP in the past month? In-person or telehealth?

Would you find specialist tele-health consultation (talking to your specialist over the computer, with video) an acceptable alternative to in-person clinic reviews? Why/why not?

Do you have any other comments?

Do you have any questions?

References

[1] Hazzard B. Minister for health, NSW government. COVID-19 update - News, Australia: NSW Health; 2020. https://www.health.nsw.gov.au/news/Pages/20200318_01.aspx [Accessed 19 April 2022].

[2] Royal Commission into Aged Care Quality and Safety. Aged care and COVID-A special report, 2020. https://agedcare.royalcommission.gov.au/publications/aged-care-and-COVID-19-special-report/; 2020 [Accessed 8 June 2021]

[3] Berger E, Reupert A. The COVID-19 pandemic in Australia—Lessons learnt. Psychol Trauma Theory Res Pract Policy 2020;12(5):494–6. doi:10.1037/tra0000722.

[4] Ward M, May P, Normand C, Kenny RA, Nolan A. Mortality risk associated with combinations of loneliness and social isolation. Findings from The Irish Longitudinal Study on Ageing (TILDA). Age Ageing 2021;50(4):1329–35 [published online ahead of print];doi:10.1093/ageing/afab004.

[5] Armitage R, Nellums LB. COVID-19 and the consequences of isolating the elderly. Lancet Public Health 2020;5(5):e256. doi:10.1016/S2468-2667(20)30061-1.

[6] Xie B, Charness N, Fingerman K, Kaye J, Kim MT, Khrushid A. When going digital becomes a necessity—Ensuring older adults’ needs for information, services, and social inclusion during COVID-19. J Aging Soc Policy 2020;32(4–5):460–70. doi:10.1080/0895942202101711257.

[7] Nï Shé É, O’Donnell D, O’Shea M, Stokes D. New ways of working? A rapid exploration of emerging evidence regarding the care of older people during COVID19. Int J Environ Res Public Health 2020;17(18):6442. doi:10.3390/ijerph17186442.

[8] Page A, Sperandei S, Spittal MJ, Pickles J. Ensuring older Australians remain socially connected during the COVID-19 isolation period. Aust N Z J Psychiatry 2021;55(3):326–7. doi:10.1177/0004867420945780.

[9] Kotwal AA, Holt-Lunstad J, Newmark RL, et al. Social isolation and loneliness among San Francisco bay area older adults during the COVID-19 shelter-in-place orders. J Am Geriatr Soc 2021;69(1):20–9.

[10] Souza RD, Ahmed S, Souza RD, Ahmed S. I am a people person. I want my family to visit: Stories of older Australian migrants during COVID / Ruth De Souza and Safdar Ahmed. The Guardian, 2021.

[11] Brown L, Mosaabir R, Harrison N, Brundle C, Smith J, Clegg A. Life in lockdown-A telephone survey to investigate the impact of COVID-19 lockdown measures on the lives of older people (72 years). Age Ageing 2021;50(2):341–6. doi:10.1093/ageing/afa225.

[12] Mehrota A, Ray K, Brockmeyer DM, Barnett MJ, Bender JA. Rapidly converting to ‘virtual practices’-Outpatient care in the era of COVID-19. NEJM Catal 2020(April 1) https://catalyst.nejm.org/doi/full/10.1056/CAT.20.0091/ [Accessed 8 June 2021].

[13] South Western Sydney Local Health District/South Western Sydney Primary Health Network South West Sydney–Our health in 2019, Campbelltown, NSW: South Western Sydney Local Health District/South Western Sydney Primary Health Network, 2019. https://www.swshld.health.nsw.gov.au/pdf/OurHealth-2019.pdf [Accessed 1 April 2022].

[14] NSW Government, Australia. COVID-19 News and Media [Online]. https://www.nsw.gov.au/COVID-19-news-and-media/. Accessed 8 June 2021.

[15] Lam K, Lu AD, Shi Y, Covinsky KE. Assessing telemedicine unreachability among older adults in the United States during the COVID-19 pandemic. JAMA Intern Med 2020;180(10):1389–91. doi:10.1001/jamainternmed.2020.2671.

[16] Berners-Lee T. It’s time to recognize internet access as a human right. World Wide Web Foundation, 2020 [Online]. https://webfoundation.org/2020/10/its-time-to-recognize-internet-access-as-a-human-right/ [Accessed 8 June 2021].

[17] Roberts ET, Mehrotra A. Assessment of disparities in digital access among medicare beneficiaries and implications for telemedicine. JAMA Intern Med 2020;180(10):1386–9. doi:10.1001/jamainternmed.2020.2666.

[18] Webb L. COVID-19 lockdown—A perfect storm for older people’s mental health. J Psychiatr Ment Health Nurs 2021;28(2):300. doi:10.1111/jmhn.12644.

[19] Talbot CV, Briggs P. Getting back to normality seems as big as a step as going into lockdown.—The impact of the COVID-19 pandemic on people with early to middle stage dementia. Age Ageing 2021;50(3):657–63. doi:10.1093/ageing/afab012.

[20] Sinclair M, O’Toole J, Malavazarakachi M, Leder K. Comparison of response rates and cost-effectiveness for a community-based survey—Postal, internet and telephone modes with generic or personalized recruitment approaches. BMC Med Res Methodol 2012;12:132. doi:10.1186/1471-2288-12-132.