

## BRIEF REPORT

# Older adults' preferences for Internet-based services: Type and content

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**Abstract**

**Objective(s):** The aim of this paper was to report on qualitative survey responses provided by older Australian adults regarding their preferences for Internet-based services and content.

**Methods:** Two qualitative questions ('What type of Internet-based mental health and well-being (1) services, and (2) content would be of most interest to you?') from a broader survey investigating the mental and physical health of older Australians were thematically analysed for commonly occurring themes. Eighty-nine participants aged 65 years or older (mean age = 71 years,  $SD = 5.30$ ) responded to at least one qualitative question. Participants were primarily female (60%,  $n = 53$ ), born in Australia (65%,  $n = 58$ ), in a relationship (58%,  $n = 52$ ), living in the community (79%,  $n = 70$ ) and relatively well educated, with the majority having completed a university degree (38%,  $n = 34$ ).

**Results:** Themes indicated that participants were most interested in Facebook-style services ( $n = 17$ ), chat groups ( $n = 16$ ) and email-based services ( $n = 4$ ) designed specifically for older adults ( $n = 14$ ). However, some concerns were raised regarding the trustworthiness of Internet-based services, with the largest proportion of participants ( $n = 22$ ) noting that they were unlikely to use Internet- or social media-based services. The primary content-related themes were mental fitness ( $n = 34$ ), grief and loss ( $n = 20$ ), health information ( $n = 13$ ), socialisation ( $n = 11$ ) and physical fitness ( $n = 10$ ).

**Conclusions:** Participants indicated interest in tailor-made Facebook-style services for older adults that allow them to communicate with their peers and create new social networks and incorporate content relating to strategies for working on mental and physical fitness, information on coping with grief and loss, as well as health information. These findings can be used by organisations to develop Internet-based services and content for older Australian adults.

**KEYWORDS**

eHealth, Internet, Mental health, Aged, Socialisation

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## 1 | INTRODUCTION

The proportion of the Australian population aged 65 years and over is growing rapidly. This cohort comprises 16% of the total Australian population<sup>1</sup> and is projected to increase to approximately 22% by 2066,<sup>2</sup> posing significant challenges to the health-care system, aged care services and national economics. How best to reach and support this ageing population to offset these increasing pressures is a necessary consideration.

One potential means is to create Internet-based mental health and well-being services targeted to meet the needs of older adults. A recent study showed older adults to have a generally positive attitude towards Internet-based health technologies.<sup>3</sup> However, to utilise Internet-based services effectively to support the mental health and well-being of this cohort, it is important to understand their perspectives on the type of Internet-based services they would prefer, and what content they feel should be included in order to obtain the greatest benefit.

The aim of this paper was to report on the qualitative survey responses provided by older Australian adults regarding their preferences on what mental health and well-being Internet-based services and content would be of most interest to them.

## 2 | METHODS

### 2.1 | Participants

This study consisted of  $N=89$  older Australian adults. Participants had an average age of 71.3 years ( $SD=5.30$ , range = 65–88), were primarily female (60%,  $n=53$ ), born in Australia (65%,  $n=58$ ), in a relationship (58%,  $n=52$ ) and living in the community either independently or with a partner or other family member/s (79%,  $n=70$ ). This was a relatively educated sample with the majority (38%,  $n=34$ ) having completed a university degree or a certificate/diploma (33%,  $n=29$ ) and the remainder year 12 or below (29%,  $n=26$ ).

### 2.2 | Measures

This paper reports on two items from data collected as part of a larger study to trial a survey to collect cross-sectional data on the mental and physical health of older Australian adults across multiple timepoints. The survey included sociodemographic items, validated measures and items relating to the mental and physical health and well-being of the respondents. The two items under focus asked participants ‘What type of Internet-based mental health and well-being (1) **services** and (2) **content** would be of most

### Practice Impact

Older adults want a secure, tailor-made Internet-based service that facilitates the creation of new social networks and communication, and provides practical strategies to enhance mental and physical fitness and information on coping with grief and loss. However, further investigation determining how best to increase Internet-based health-related service use is required. Study findings can assist organisations to develop Internet-based services and content as preferred by older adults.

interest to you?’ An open textbox was provided for participants to respond to each question. These two questions were not mandatory.

### 2.3 | Procedure

Following ethics approval from the Federation University Human Research Ethics Committee (Project No.: A13-133), the study was advertised Australia-wide via social and printed media, personal networks and flyers on community notice boards and in aged care residential facilities. The study was open to Australian residents aged 65 years and older and involved the completion of an anonymous survey either online (hosted by Survey Monkey®), by telephone, or by returning a paper-and-pencil questionnaire by post. The survey took approximately 25 minutes to complete.

### 2.4 | Statistical analysis

A total of 168 individuals gave consent to take part in the study, of which 91 older adults provided a response to at least one of the qualitative questions (a response rate of 54%). Two of these participants were excluded from the analysis as they resided outside Australia, leaving a sample of  $N=89$  older adults.

Responses were analysed using reflexive thematic analysis.<sup>4,5</sup> This analytic approach follows a recursive process involving familiarisation and coding of the data, searching for and reviewing themes and writing up the analytic narrative. In some cases, participants provided responses that addressed multiple themes. Where responses did not fit logically into a cohesive theme, they were categorised as ‘other’. The analysis was undertaken by an academic researcher with experience in the development and evaluation of Internet-based interventions. Qualitative data were analysed using Microsoft Excel.

## 3 | RESULTS

### 3.1 | Internet-based mental health and well-being services

A total of  $n=88$  participants provided a response regarding their preferred type of Internet-based mental health and well-being services. Of these responses, 15 could not be interpreted (e.g. entered a random sequence of letters), a further nine participants responded with 'do not know' or 'unsure' without providing any contextual detail as to whether they did not understand the question, were not sure what Internet services might be of interest to them, or other unspecified reasoning.

Of the interpretable responses, participants primarily indicated a preference for a Facebook-style service ( $n=17$ ), closely followed by an Internet-based service that integrated social interaction (e.g. chat groups) ( $n=16$ ). An email-based service that allowed people to connect was also suggested by a small number of participants ( $n=4$ ). The importance of the service being for use by 'older adults only' was also a common theme. However, the largest proportion of participants ( $n=22$ ) indicated that they were unlikely to use Internet- or social media-based services. Part of this response may be due to concerns expressed over the privacy and trustworthiness of online services. See [Table 1](#) for greater detail.

### 3.2 | Internet-based mental health and well-being content

A total of  $n=87$  participants provided a response to the type of content they would like incorporated into an Internet-based mental health and well-being service. There were 10 responses that could not be interpreted and a further seven participants who stated they 'do not know' or were 'unsure'.

Participants showed greatest interest in content related to mental fitness ( $n=34$ ). For this theme, participants wanted access to practical activities to help keep their brain active and mind agile. The next most common themes to emerge were grief and loss ( $n=20$ ), followed by health information ( $n=13$ ), of which the latter included topics relating to neurological and physically degenerative conditions, and mental ill health. Socialisation ( $n=11$ ) was also identified as a commonly occurring theme, with participants seeking opportunities to connect with peers and health professionals. Similar to mental fitness, physical fitness ( $n=10$ ) was identified as a beneficial topic to participants, with both topics often raised in the same response. Another particularly relevant theme to this study was coping with life changes ( $n=9$ ) that often come with ageing. See [Table 2](#) for further detail.

## 4 | DISCUSSION

The purpose of this paper was to report on themes derived from the qualitative responses given by older Australian adults ( $\geq 65$  years of age) regarding their preferences on Internet-based services and content.

For Internet-based services, participants identified social media style services (i.e. Facebook) and chat groups that were exclusive to- and catered specifically for the needs of older adults (e.g. design, language)- to be of greatest interest. Responses indicated that participants preferred simply presented sites that are easy to navigate, with a strong preference for jargon-free language, steering clear of more modern, informal means of communication, such as net- or chat-speak.

A preference for in-person or telephone-based services over that of Internet-based services was indicated. Two recent studies conducted in Australia<sup>6</sup> and Canada<sup>7</sup> during the pandemic similarly found older adults preferred in-person or telephone-based services due to their familiarity and comfort with using telephones, and the social interaction afforded to them in-person. Haase et al.<sup>7</sup> also identified a general disinterest and lack of knowledge of computers among older adults to be a barrier to the use of Internet-based services. This finding aligns with a recent scoping review<sup>8</sup> that identified a reduced responsiveness to technological changes among older adults. This is an important consideration for Internet-based services targeting older adults, as they may initially require more support and time to become comfortable and efficient users of any new technology and subsequently gain maximum benefit. Furthermore, the results of the study by Ienca et al.<sup>3</sup> noted that the perceived need for digital health technologies may be less among older adults who are physically and cognitively healthy. This suggests the development of preventative Internet-based services for older adults may also be warranted, which may serve a number of benefits, such as improving their digital literacy by increasing their familiarity with, and use of Internet-based services while they are cognitively agile, and thereby decreasing the potential risk of social isolation and mental ill health as they age.

Interest in using Internet-based services was also somewhat mitigated by mistrust, with concerns of confidentiality and privacy raised, a barrier to the use of Internet-based services among older adults which has been identified in other studies.<sup>3,7,9,10</sup> Some participants needed greater assurance that the service was safe to use, with issues such as the use of fake profiles minimised. For Internet-based services that incorporate a social component, allowing older adults to use video-chat technologies may partially alleviate such trust and confidence concerns as seeing the other person would allow them to verify with whom they are speaking.

**TABLE 1** Themes derived from qualitative responses regarding Internet-based mental health and well-being services of interest to older Australian adults.

Theme (n), description and illustrative quotes
<p><b>Facebook-style service (n = 17)</b>            Participants most frequently indicated interest for a Facebook-style service. The importance of designing the service with the needs of this cohort in mind was raised:  <i>A Facebook for Seniors would interest me, with proper words. I've stopped at my grandchildren's site. I do not understand the jargon.</i> (Female, 81, P77)  <i>Seniors only with very simple settings on website – clearly presented.</i> (Female, 76, P31)</p>
<p><b>Chat group (n = 16)</b>            Participants were similarly interested in an Internet-based service that integrated a social component (whether one-on-one or group-based) that would allow older adults to connect with each other:  <i>...online seniors chat anything designed for seniors with the ability to meet others online and communication.</i> (Female, 66, P37)  <i>... a web site, where chat groups could take place ... not FB [Facebook], more private than that.</i> (Female, 67, P152)</p>
<p><b>Email (n = 4)</b>            Email-based services were identified as a means of connecting people or distributing information, particularly for older adults that are less tech-savvy:  <i>I know that most oldies are very computer-savvy. I'm one of the others, as you may have realised by now. I would therefore prefer chatting through emails. I'm happy with the written word.</i> (Female, 73, P41)  <i>Perhaps newsletters distributed regularly by email.</i> (Male, 65, P64)  <i>A central information "Help" service where I can email a question and receive an emailed response relevant to Australians. It should include referrals to appropriate organisations or groups if the answer is not known and should be multilingual.</i> (Female, 73, P138)</p>
<p><b>Older adults only (n = 14)</b>            Participants frequently stated that the service should explicitly be for seniors only:  <i>Space for seniors!!!!</i> (Female, 73, P160)  <i>Any programs for seniors only would be beneficial.</i> (Female, 66, P150)</p>
<p><b>None (n = 22)</b>            The largest proportion of participants stated that they were not likely to use Internet- or social media-based services. For these participants, they typically indicated a preference for telephone or in-person services, and if they were to use the Internet, it would primarily be to find in-person services:  <i>I would only use face-to-face or telephone services.</i> (Male, 68)  <i>I am unlikely to use internet ones. I am interested in community-building and face-to-face engagement.</i> (Female, 69, P24)  <i>I do not think that internet-based services are the best option for seniors, they are useful only as a portal and after first contact an appropriate referral should be made to a "live" service.</i> (Female, 85, P95)</p>
<p><b>Trust concerns (n = 5)</b>            Participants expressed concern over the privacy and trustworthiness of Internet-based services. Some participants felt unsure that they could trust that people were being honest:  <i>Personally, I do not trust personal Facebook type of communication, it is too easy to fake...</i> (Female, 88, P109)            While others needed greater certainty that they could trust Internet-based services if they were to use them:  <i>I wish one could trust online chat groups as this would be ideal, likewise with FB [Facebook], you would need some sort of checkpoint.</i> (Female, 71, P39)</p>
<p><b>Other (n = 6)</b>            The responses from a small number of participants did not fit into a theme. For example, some responses related to the design element of the service, or alternate website, while other responses related to content rather than services or using the Internet purely for referrals.</p>

In respect to content, the main themes of interest were mental and physical fitness, grief and loss, health information and socialisation. The topics showed a clear alignment with the experiences faced by an ageing population. The theme of socialisation closely aligned with the participants' interest in services that offered a means of communication and connection, along with information on how to deal with loneliness and building new social connections. In the development of effective

Internet-based services, the importance of understanding the related but distinct concepts of social isolation (objective state) and loneliness (subjective state) has been highlighted.<sup>11</sup> Determining what Internet-based services and content may best suit these two groups would benefit from further investigation. Furthermore, we encourage future research to use a co-design approach, involving both older adults and service providers, in developing appropriate Internet-based services

**TABLE 2** Themes derived from qualitative responses regarding Internet-based mental health and well-being *content* of interest to older Australian adults.

Theme (n), description and illustrative quotes
<p><b>Mental fitness (n = 34)</b>            Participants were primarily interested in access to practical activities (i.e., trivia and puzzles) to help keep their brain active and mind agile:  <i>Information on keeping mentally fit, perhaps easily accessible trivia questions, crosswords, etc.</i> (Female, 71, P56)  <i>Information on keeping mentally fit, such as the “brain training” that was recently featured on TV.</i> (Female, 75, P92)</p>
<p><b>Grief and Loss (n = 20)</b>            Participants frequently stated that they were seeking guidance on coping with grief and loss, as well as easy access to grief counselling:  <i>How to cope with the loss of a close relative/friend.</i> (Female, 79, P52)</p>
<p><b>Health information (n = 13)</b>            Responses indicated that participants were interested in health information pertaining to topics such as degenerative conditions (neurological and physical), medication, prevention and incontinence:  <i>... information on those degenerative conditions (body and mind).</i> (Female, 66, P102)  <i>Medication limitations and alternative ways of addressing issues.</i> (Female, 76, P31)            This theme also included information on understanding and managing mental ill health, such as depression, anxiety, stress and sadness:  <i>Helpful information on rising above depression.</i> (Female, 66, P51)  <i>Information on what is available for mental illness.</i> (Male, 72, P79)  <i>... the facts that you can be feeling down without it always meaning you are depressed or in need of pills.</i> (Female, 67, P45)</p>
<p><b>Socialisation (n = 11)</b>            Responses indicated that participants felt unsure how to connect with others and build new friendships as one ages and following significant life changes, such as the loss of a partner, with loneliness raised as an issue of notable concern for older adults:  <i>... My own biggest hurdle when my husband died after 22 years of gradual decline, was trying to make friends in the community we'd only lived in for 3 years. When he died the loneliness was overwhelming.</i> (Female, 73, P41)  <i>Building your social networks in your 60s, 70s, 80s and beyond.</i> (Female, 69, P132)            The desire for access to ‘someone’ or services allowing participants to connect with others was also raised:  <i>Pen Pal services for ‘shut ins’.</i> (Female, 76, P31)  <i>... just someone to express feelings to and receive empathy.</i> (Female, 65, P81)</p>
<p><b>Physical fitness (n = 10)</b>            Participants were interested in inexpensive strategies for maintaining physical fitness that are appropriate for older adults, particularly for those experiencing declining or limiting health problems where it may not be possible to get to external amenities, such as gyms and pools. The topics of physical and mental fitness were often raised in concert with each other:  <i>... mental health requires bodily health, so keeping mentally fit, must also be combined with keeping bodily fit...</i> (Male, 77, P34)  <i>Strategies on everything from physical to mental on how to remain active and engaged regardless of health situation.</i> (Male, 78, P26)  <i>Get fit/exercise programs for the older people that is not expensive – can be done in the home. There are some programs now on the internet but a lot apply to USA. We need our own information, according to the Australian people.</i> (Female, 66, P88)            This theme also incorporated topics relating to nutrition, diet and weight management:  <i>Information on nutrition and keeing [sic] mentally and physically fit.</i> (Female, 81, P77)</p>
<p><b>Life changes (n = 9)</b>            Older adults often face a myriad of issues revolving around making necessary changes, whether by choice or requirement. Responses indicated that information and assistance in coping with changes to one’s life circumstances and the ageing process in general would be beneficial, including finding meaning and purpose in life, coping with changing family dynamics and practical information on topics such as downsizing and will preparation:  <i>Support to negotiate change – accommodation, living circumstances, relationships, managing finances...</i> (Female, 66, P102)  <i>... maybe check lists for preparation for downsizing housing, will preparation and similar.</i> (Female, 71, P56)  <i>... finding meaning in life; maintaining self-esteem; changes in family relationships and where the older person fits in.</i> (Female, 66, P51)</p>
<p><b>Information and referrals (n = 8)</b>            Participants were interested in a website that allowed them to ask questions, obtain general information and referrals to services and programs:  <i>... general information such as what free services were available.</i> (Female, 67, P45)  <i>Information on how to locate a good GP or psychologist who has an interest in mental health problems. This would need to be reliable and done on an opt-in basis by the relevant practitioners, not just something like TripAdvisor.</i> (Female, 68, P126)  <i>Information accessible by topic-cover as much as relevant. I would go to the site to search a topic of immediate interest. Then I may or may not follow up other topics if they looked interesting, if they were visible. [I mean maybe in a list down the side of the webpage – I doubt I would scroll right through an A-Z listing just aimlessly looking at what else was on the site] NOTE for years I’ve used Vic Health’s Better Health Channel <a href="http://www.betterhealth.vic.gov.au">www.betterhealth.vic.gov.au</a> and find it extremely well set out and easy to use. Occasionally I cannot find what I want on it, but I send an email to them asking them to consider putting up an article and they have always followed up with a new addition.</i> (Female, 73, P43)</p>
<p><b>Other (n = 3)</b>            There were three responses that did not fit into a theme. The responses discussed the difficulty of using technology and the Internet among older adults and the need for increasing basic skills in this area and providing help and advice on technologies. Of note, one response indicated that introductory courses in using the Internet and varying technologies may be too advanced for many older adults.</p>

and content. Here, key stakeholders can best determine how to integrate these services within the community, particularly within rural areas where services are often scarce, with long waiting lists.

## 5 | CONCLUSION

Overall, the responses indicated a preference for tailor-made social media style services for older adults that allows them to communicate with their peers and create new social networks. In addition, responses indicated the benefit of including content that provides practical strategies to work on mental and physical fitness, information on coping with grief and loss and general mental health information. However, some mistrust of Internet-based services was expressed. These findings can be used by organisations to develop Internet-based services and content preferred by older adults.

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## CONFLICT OF INTEREST STATEMENT

No conflicts of interest declared.

## DATA AVAILABILITY STATEMENT

The unidentified raw data supporting the conclusions of this study will be made available upon reasonable request to the corresponding author and ethical approval committee. This study received ethical approval from the Federation University Human Research Ethics Committee (Project No.: A13-133).

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