Rapid Synthesis

Identifying Community-based Models to Enable Older Adults to Live Independently

29 November 2022





Rapid Synthesis: Identifying Community-based Models to Enable Older Adults to Live Independently 30-day response

29 November 2022

The McMaster Health Forum's goal is to generate action on the pressing health-system issues of our time, based on the best available research evidence and systematically elicited citizen values and stakeholder insights. We aim to strengthen health systems – locally, nationally, and internationally – and get the right programs, services and drugs to the people who need them.

Authors

Téjia Bain, M.Sc., Research Coordinator, McMaster Health Forum

Peter DeMaio, Research Coordinator, McMaster Health Forum

Cara Evans, PhD (candidate), Research Assistant, McMaster Health Forum

Saif Alam, Research Assistant, McMaster Health Forum

Safa Al-Khateeb, MPH, Engagement Coordinator, McMaster Health Forum

Zaim Khan, Research Assistant, McMaster Health Forum

Sarah Soueidan, MPH, Co-lead, Evidence Synthesis, McMaster Health Forum

Austine Wang, Research Assistant, McMaster Health Forum

Adam El-Kadi, Research Assistant, McMaster Health Forum

Michael G. Wilson, PhD, Assistant Director, McMaster Health Forum, and Associate Professor, McMaster University

Timeline

Rapid syntheses can be requested in a three-, 10-, 30-, 60- or 90-business-day timeframe. This synthesis was prepared over a 30-business-day timeframe. An overview of what can be provided and what cannot be provided in each of the different timelines is provided on McMaster Health Forum's Rapid Response program webpage (www.mcmasterforum.org/find-evidence/rapid-response).

Funding

The rapid-response program through which this synthesis was prepared is funded by Healthcare Excellence Canada. The McMaster Health Forum receives both financial and in-kind support from McMaster University. The views expressed in the rapid synthesis are the views of the authors and should not be taken to represent the views of Healthcare Excellence Canada or McMaster University.

Conflict of interest

The authors declare that they have no professional or commercial interests relevant to the rapid synthesis. The funder played no role in the identification, selection, assessment, synthesis or presentation of the research evidence profiled in the rapid synthesis.

Merit review

The rapid synthesis was reviewed by a small number of policymakers, stakeholders and researchers in order to ensure its scientific rigour and system relevance.

Citation

Bain T, DeMaio P, Evans C, Alam S, Al-Khateeb S, Khan Z, Soueidan S, Wang A, El-Kadi A, Wilson MG. Rapid synthesis: Identifying community-based models to enable older adults to live independently. Hamilton: McMaster Health Forum, 29 November 2022.

Product registration numbers

ISSN 2292-7999 (online)

KEY MESSAGES

Question

• What are the features and impacts of community-based models that are designed to enable older adults to live independently?

Why the issue is important

- Canadians overwhelmingly prefer to age at home, but do not always have access to supports that allow them to live independently for as long as possible.
- Older adults often require assistance to address their care needs, keep up with daily activities around the home, ensure their home is adequately maintained and affordable, and remain meaningfully connected to their communities and social networks.
- Community-based models designed to enable older adults to live independently consist of diverse approaches that increase service provision and build capacity in the community to help older adults live healthy, meaningful lives at home.
- A better understanding of the features and impacts of these models can help identify the types of models that can best support independent living in later life, for whom, and through which financing and delivery arrangements they can be organized.

What we found

- We grouped the models we identified from the research evidence and our jurisdictional scan into three broad categories, namely place-based models, care-based models, and technology-based models.
- We identified 11 systematic reviews, one rapid review, and 25 primary studies relevant to the question.
- The evidence on place-based models, which aim to change or enhance the physical or social environments of older adults to support their independent living in the community, emphasized collaboration between housing-adaptation personnel throughout the process of making homes more accessible.
- We identified care-based models that primarily focus on coordinating and providing care services to help older adults meet their health-related and personal-care needs at home, and included home care, primary care, palliative care, and social care.
- Training and education for home-care professionals was a key feature of home-care models, and most of the identified evidence on home-based primary-care models focused primarily on care coordination, medication management, and self-management support for older adults.
- Palliative-care models that featured care coordinators, extra call-aide time, and multidisciplinary care teams
 were found to increase the likelihood of older adults dying at home when compared to usual care, and
 identified social-care models that featured paid assistance, community coordinators, social support for
 elders, and psycho-education and discussion groups for caregivers.
- Technology-based models we identified from the evidence, which aimed to increase the uptake of technologies developed to support older adults in addressing their care needs at home, featured smart homes, telecare and mobile health interventions, and the evidence highlighted that technology use is enhanced by older adults' own digital competencies and their social-support networks.
- Although we identified a wide variety of community-based models from the research evidence, very few of the included studies evaluated the impact of these models.
- Our jurisdictional scan of all Canadian provinces and territories, as well as two other countries (Australia and the United Kingdom) yielded findings on the features of place-based models, care-based models, and technology-based models, but the scan identified limited insights on the impacts of these models.
- The majority of the place-based models we found focused on adapting the physical environment, increasing community engagement among older adults, building community capacity, and improving access to affordable and appropriate housing.
- Care-based models we identified primarily focused on coordinating and providing social- and home-care supports to older adults living in the community and included programs such as the Commonwealth Home Support Programme in Australia, the Somerset Micro-enterprise programme in the United

- Kingdom, Canada's Home Opportunity People Empowerment (H.O.P.E.) Model, and numerous care programs for older adults living independently within Canadian provinces.
- Some technology-based models we identified, such as the Connected Communities program in New Brunswick, focus on increasing the uptake of or advancing innovation in technology supports, while others like the Home Opportunity People Empowerment (H.O.P.E.) Model and the Find Your Way approach in Ontario leverage technology to support broader goals such as improving care and connecting older adults to their communities and promoting social engagement.
- Evaluations of the models and programs that were identified in our jurisdictional scan to support older adults aging in place are limited.

QUESTION

What are the features and impacts of community-based models that are designed to enable older adults to live independently?

WHY THE ISSUE IS IMPORTANT

Canadians overwhelmingly prefer to age at home, but do not always have access to supports that allow them to live independently for as long as possible.(1; 2) Older adults often require assistance to address their care needs, keep up with daily activities around the home, ensure their home is adequately maintained and affordable, and remain meaningfully connected to their communities and social networks.(3) Community-based models designed to enable older adults to live independently consist of diverse approaches that increase service provision and build capacity in the community to help older adults live healthy, meaningful lives at home. A better understanding of the features and impacts of these models can help identify the types of models that can best support independent living in later life, for whom, and through which financing and delivery arrangements they can be organized.

WHAT WE FOUND

We identified 11 systematic reviews, one rapid review, and 25 primary studies relevant to the question that were identified from a targeted search for relevant literature (see Box 2 for our search strategy). In addition, we conducted a jurisdictional scan to identify experiences from all Canadian provinces and territories, as well as two other countries (Australia and the United Kingdom).

Box 1: Background to the rapid synthesis

This rapid synthesis mobilizes both global and local research evidence about a question submitted to the McMaster Health Forum's Rapid Response program. Whenever possible, the rapid synthesis summarizes research evidence drawn from systematic reviews of the research literature and occasionally from single research studies. A systematic review is a summary of studies addressing a clearly formulated question that uses systematic and explicit methods to identify, select and appraise research studies, and to synthesize data from the included studies. The rapid synthesis does not contain recommendations, which would have required the authors to make judgments based on their personal values and preferences.

Rapid syntheses can be requested in a three-, 10-, 30-, 60- or 90-business-day timeframe. An overview of what can be provided and what cannot be provided in each of these timelines is provided on the McMaster Health Forum's Rapid Response program webpage (www.mcmasterforum.org/find-evidence/rapid-response).

This rapid synthesis was prepared over a 30-business-day timeframe and involved four steps:

- submission of a question from a policymaker or stakeholder (in this case, Healthcare Excellence Canada);
- identifying, selecting, appraising and synthesizing relevant research evidence about the question;
- drafting the rapid synthesis in such a way as to present concisely and in accessible language the research evidence; and
- 4) finalizing the rapid synthesis based on the input of at least two merit reviewers.

We outline in narrative form below our key findings from the identified evidence and jurisdictional scan. We provide an overview of the features (populations served, services provided, funding model features, and delivery components) and impacts of models identified from the included evidence documents in Table 1. In addition, we provide details about features and experiences with models identified from the international and Canadian jurisdictional scan in Table 2. Additional details from the research evidence are provided in Appendices 1 and 2.

We organized our findings from the research evidence and jurisdictional scans by grouping the models we identified into three broad categories, namely place-based models, care-based models, and technology-based models, which are described in the narrative below. We iteratively developed these categories based on our findings, but recognize that the models are not mutually exclusive and may overlap across categories. However, organizing our findings in this way allowed us to provide a cohesive structure to the narrative and tables describing the models we identified.

Key findings from the research evidence

We grouped the models we identified from the research into three broad categories. Place-based models aim to change or enhance the physical or social environments of older adults to support their independent living in the community. Care-based models primarily focus on coordinating and providing care services for community-dwelling older adults to help them meet their health-related and personal-care needs. Subcategories of care-based models were created to organize the large volume of evidence in this category, and include home-care, primary-care, palliative-care, and social-care models. Lastly, technology-based models aim to increase the uptake of technologies developed to support older adults in maintaining independence at home and/or addressing their care needs. The models we identified from the evidence are described by category below.

Place-based models

One primary study we identified explored three different housing models for older adults, namely Naturally Occurring Retirement Community Supportive Services Programs (NORC-SSPs), cohousing, and villages.(4) NORC-SSPs implement supportive service programs in older-adult neighbourhoods that integrate community-based health, social recreation, and allied health services, and are financed largely by government grants. Cohousing consists of private or rental units that are funded by residents who share communal spaces that can be intergenerational or exclusively for seniors. Villages are financed and governed by residents who collectively hire staff and/or volunteers to provide older residents within the village with services like transportation,

Box 2: Identification, selection and synthesis of research evidence

We identified research evidence (systematic reviews and primary studies) by searching (on 12 & 30 September 2022) 1) ACCESSSS; 2) Health Systems Evidence; 3) Social Systems Evidence; 4) Cochrane Library; 5) the COVID-END inventory of best evidence syntheses; and 6) PubMed. In Health Systems Evidence, Social Systems Evidence, ACCESSSS, and Cochrane Library, we searched for overviews of systematic reviews, systematic reviews and systematic reviews by [(aging OR elderly) AND (support OR dignity) AND (community OR home)]. In ACCESSSS, we searched for: [(aging OR elderly) AND (support OR dignity) AND (community OR home)], in COVID-END, we searched for: [(aging OR elderly) AND (support*) AND (dignity OR respect) AND (community OR home OR independent)], and in PubMed, we searched for: [(aging OR elderly OR seniors) AND (support*) AND (dignity OR respect OR unmet needs) AND (community OR home OR independent OR dwelling)].

The results from the searches were assessed by one reviewer for inclusion. A document was included if it fit within the scope of the questions posed for the rapid synthesis.

For each systematic review we included in the synthesis, we documented the focus of the review, key findings, last year the literature was searched (as an indicator of how recently it was conducted), methodological quality using the AMSTAR quality appraisal tool (see the Appendix for more detail), and the proportion of the included studies that were conducted in Canada. For primary research (if included), we documented the focus of the study, methods used, a description of the sample, the jurisdiction(s) studied, key features of the intervention, and key findings. We then used this extracted information to develop a synthesis of the key

home maintenance, and healthcare. The study suggested that all three models positively influence physical and mental health of residents, lower the demand for formal care, and enhance residents' knowledge of health promotion and disease prevention. However, each housing model's funding structure presents unique limitations in terms of funding security. A medium-quality scoping review offered recommendations for improving multicomponent community-based models for older adults to live independently. The review emphasized that considerations for all models should include fostering meaningful social relations both within living spaces and the broader community, ensuring the availability of inclusive social activities and communal programming, and improving the availability of on-site staff to support residents' access to relevant social, leisure, and health services.(3)

Two of the included primary studies explored home-modification services to improve accessibility for seniors living in the homes. The <u>Adaptation System for Independent Living</u> in the U.K. incorporates the input of housing officers, social workers, occupational therapists (OTs), staff from other agencies, and older service users when providing housing adaptation support for older homeowners, but several inconsistencies and inequities were identified throughout the adaptation process.(5) The study recommended the use of a liaison across departments or organizations, standardized referral forms and policies, and home-improvement

agencies to organize and manage time and costing of adaptation work. A <u>primary study</u> assessed a Finnish communal housing project that employed a part-time community coordinator to support residents living in the housing project's low-maintenance apartments with accessible common spaces, amenities, green spaces, and public transportation. (6) The residents of the housing project said that it provided opportunities for socializing as well as maintenance-free apartments and outdoor areas, and generally preferred personal assistance over other types of services. In addition, we found that the <u>Existing Multifamily Dwellings</u> <u>Elevator Retrofit (EMDER) policy</u> in China enables older adults living in multifamily dwellings to access elevator retrofitting services that are funded by government subsidies and out-of-pocket payments from building residents. (7) However, the study did not report on the impact of this policy on older residents. Lastly, a <u>primary study</u> that provided insights into the impacts of the pandemic on the eight domains of the Age-Friendly Cities framework indicated that a focus on creating opportunities for social engagement and civic participation, economic and food-security supports, and strengthening community-based organizations is critical for enabling older adults to stay at home. (8)

Care-based models

Most of the models we identified from the evidence were categorized as care-based models. We grouped the models into subcategories based on the type of care that a model primarily provided, namely home care, primary care, palliative care, and social care.

Home care

Home-care models of care typically deliver rehabilitative or restorative-care services and support for community-dwelling older adults through health professionals who specialize in home care. A high-quality systematic review investigated the approach of restorative or 'reablement' care to provide time-limited (typically six to 12 weeks), multidisciplinary, goal-directed, person-centred home-care services for older adults 65 years or older.(9) The review found that reablement care may be slightly more effective than usual care in improving function of older adults at nine to 12 months, but may make little or no difference to mortality after the first 12 months, or to rates of unplanned hospital admission at 24 months. The 'Stay Active at Home' program in the Netherlands provides knowledge, skills, and social and organizational support for home-care professionals to deliver day-to-day rehabilitative services to older adults, according to a primary study we found. (10) The program requires six months of training for home-care professionals that includes an initial kick-off meeting, regular team meetings, and booster meetings two to three months following the training period, and is funded by municipalities while nursing care is financed by public-health insurance. We also identified a primary study that evaluated the existing working processes and improvement plans of 14 integrated care sites for older adults in Europe. (11) Services provided through the integrated care sites included self-management and decision support from multidisciplinary teams, needs and home-safety assessments, joint care planning, access to equipment, and client education. While improvement plans created by the sites improved capabilities for coordination and collaboration, challenges with implementation of the different types of care and support services included difficulties collaborating across organizations and care settings, barriers to communication flow, inadequate resources, high workloads for staff, and limited provision of person-centred care.

A <u>medium-quality rapid synthesis</u> by McMaster Health Forum on health professionals providing home-based restorative care recommended that programs that train health professionals to engage caregivers in restorative care should be flexible and driven by pre-training learning needs assessment, draw on multiple data sources such as literature and engagement of persons with lived experience, and include a clear statement of principles and goals of restorative care.(12)

Primary care

We identified six models or programs in six primary studies that provide home-based primary care for older adults living independently. The <u>Chronic Care Model (CCM)</u> proactively finds frail older adults in the Netherlands and provides them with case management, medication review, and self-management support.(13)

Implementation challenges of the CCM that were identified included a lack of aligned financing, human resources, and information and communication technology. In the Staying at Home (SAH) Program, care coordination, medication management, and advance planning services are provided for older adults living in subsidized housing by a team of healthcare professionals.(14) SAH participants had positive health outcomes, cost-savings, and were found to have fewer nursing-home transfers and inpatient admissions. Those participating in the inpatient Geriatric Evaluation and Management program, which is a geriatrician-led, interdisciplinary model for restorative care and discharge planning, were found to describe care transitions as chaotic, and self-care in the community as precarious, while care providers experienced pressure to discharge and unclear referral pathways as barriers to coordinated care.(15) The SPRINTT project, a multicomponent intervention for community-dwelling older adults (70+ years) with physical frailty and sarcopenia, incorporates moderate-intensity physical activity twice weekly at a centre, up to four times weekly at home, and also personalized nutritional counselling.(16) The SPRINTT project was found to lead to a reduction in the risk of incident mobility disability and greater improvements in physical performance, and it did not have an effect on mortality or other major outcomes, such as risk of severe illnesses and admission to hospital.

The 'Staying Active-Staying Independent (SASI) program that was implemented in Australia helped to reduce five aspects of functional decline in community-dwelling older adults (mobility, skin integrity, cognitive/emotional mental health, nutrition, and continence) through collaborative care planning between health professionals and patients.(17) The relationship-focused care provided through the program was found to improve functionality (e.g., losing weight) and quality of life for seniors. It was also found to contribute to the professional development of community support workers (CSWs) and increased satisfaction with their role. Comprehensive healthcare consultations (i.e., comprehensive assessment, preventive advice, and referral to other healthcare providers if appropriate) for adults 60 years and older were provided by nurses in the Community Health Consultation Offices for Seniors program in the Netherlands.(18) While participants in the program had higher odds than those who had usual care of transition to a worse health profile, changes in physical morbidity were not found to be significant. Lastly, the House Calls program in the U.S. uses advanced practice nurses (APNs) to provide home-based evaluation and care for homebound seniors and to staff satellite clinics to offer health promotion and prevention in communities found to have low utilization of these services.(19)

A <u>low-quality systematic review</u> found that while home-based primary care in the U.S. provides access to high-quality routine and urgent primary care, this model does not reach many homebound patients, especially for specialized care.(20) The review also found that telehealth in combination with the use of community health navigators and in-home nursing may be innovative solutions to expand care and access to home-based primary care.

Palliative care

Models focused on providing palliative care offer supports to community-dwelling older adults with serious illness who need specialized medical care. Two high-quality systematic reviews we identified examined the effectiveness of home-based palliative care and determined that palliative care that is home-based increased the likelihood of dying at home when compared to usual care.(21; 22) The LIVE@Home.Path program, which provides dementia and coping skills and education for patients and their caregivers, was described in a primary study we found. (23) The program entails a coordinator making at least two home visits and monthly phone calls over six months, connecting participants to local courses about dementia and coping skills, facilitating the initiation of end-of-life advance care planning, and providing information about resources to support effective use of technological supports. Personal alarm models of care in Australia offer extra careaide time and personal alarms that link terminally ill, home-dwelling adults to the service-provider call centre. (24) Patients can also be provided with an extra 10 hours per month of care. The personal alarm imparted a sense of security and peace of mind in patients dealing with feelings of isolation, and the extra care-aid time allowed participants to manage their daily household tasks, allowing them to continue to live in their familiar homes. Finally, an in-home palliative care intervention in Colorado and Hawaii, U.S. that was examined in one primary study was found to provide patients with a prognosis of one year or less to live and at least one past-year emergency department visit with a core team of a palliative-care physician, nurse, and

social worker to develop a care plan that coordinated and continually reassessed care, and provided home visits and 24-hour on-call nursing.(25) Patients that participated in the intervention were less likely to go to the emergency room and be hospitalized.

Social care

We identified three programs that specifically focused on providing social-care services that improved socialization for older adults living independently. The use of paid assistants supporting older adults with tasks of daily living as part of personal-assistance programs was explored in a <a href="https://high.goognet.org/hig

An <u>evidence brief</u> by McMaster Health Forum that explored approaches for organizing a care system for older adults in Ontario suggested enhancing support for older adults and their families, coordinating integrated healthcare services, and integrating community resources as approaches for addressing care-system inefficiencies.(29)

Technology-based models

Three systematic reviews, a scoping review, and four single studies we identified described technology-based models or approaches that incorporate the use of technology to support older adults living in communities to address their care needs and maintain their independence. The Personal Emergency Response System (PERS) explored in a low-quality systematic review, delivers urgent, on-call care by providing an alarm that can be integrated with other devices (e.g., a blood pressure monitor) to trigger a call to an emergency contact or public or private call centre.(30) PERS has proven to be helpful for those living in isolation, those with mobility issues, and those concerned for personal safety. According to a medium-quality systematic review, eHealth services that provided virtual access to healthcare services for older adults in rural and remote areas were enhanced by adults' own digital competencies, social-network support, such as face-to-face support, and non-social support, such as written or video instructions.(31) Another medium-quality systematic review evaluated the evidence on smart homes and home-based health monitoring technologies for older adults living at home who have complex care needs.(32) Although home health technology was found to have some benefits for older adults with daily living, cognitive decline, mental health, and heart conditions, the review concluded that there is limited evidence that smart homes and home health monitoring help address disability prediction and health-related quality of life or fall prevention. A medium-quality scoping review highlighted that successful implementation of mobile health solutions, in particular, should consider feasibility in relation to organizational and system readiness, acceptability of the mobile health (mHealth) solution, and usability in relation to the different end users.(33)

In a <u>primary study</u> that examined smart environments and social robots for managing polypharmacy and social and cognitive activity in older adults, it was suggested that care functionalities of assistive technologies can improve activity, safety, comfort, and social functionality in older adults, but these functionalities can be limited by the preference of older adults for personalized target support and by factors correlated with technology, such as costs, usability, and privacy implications. (34) <u>Telecare</u> services offered to older citizens of England and Spain and <u>mobile health</u> (mHealth) interventions provided for older adults in Sweden were affected by the resistance of users to learn how to use the services. (35; 36) Although the studies exploring telecare and mobile health highlighted benefits of the technology-based interventions, such as communication, a sense of security, support recall in memory, and health monitoring during illness, more comprehensive evaluations of the interventions were identified as being needed. Lastly, another <u>primary study</u>

focusing on technology packages valued at up to \$4,000 for older adults in southern Australia explained that the packages gave participants confidence to use technology and purchase additional devices that they had not used before. (33) The technology package consisted of installation of health monitoring, security alarms, and communication and entertainment devices, as well as six hours of technology coaching.

Key findings from the jurisdictional scan

Place-based models

Among the community-based models identified in our jurisdictional scans, placed-based models included those that aimed to change the physical or social environments in which older adults live. Some place-based approaches focused on adapting the physical environment, increasing community engagement among older adults, and building community capacity to support aging in place. For example, Age-Friendly Communities (AFCs) constitute an approach to improving the physical and social environment to ensure that older adults are able to better manage their needs and thrive while living at home. The Public Health Agency of Canada (PHAC) champions this approach, and provides guidance about potential funders of AFC initiatives as well as supports such as Age-Friendly Checklists that describe essential features of AFCs across eight domains. In Canada, funding is typically provided through grant programs administered by provincial governments (see Table 2) and a "milestones approach" is adopted to guide the planning, development, implementation and evaluation of initiatives. Building off the AFC framework, some efforts have been taken to develop dementia-friendly community approaches. Examples include Dementia Friendly Alberta which provides a Guide for Developing Dementia Friendly Communities in Alberta and the New Brunswick Dementia Friendly Initiative, which is funded through the Government of Canada's Dementia Community Investment and administered by PHAC.

Other models focused specifically on improving older adults' social engagement and access to available community supports. The <u>Ageing well in Victoria</u> strategy in Australia aims to engage diverse groups of older adults to help seniors become more resilient and connected in the community, as well as increasing their digital literacy and improving their health-related self-care. The <u>Seniors Connected Program</u> targets older Australians living in the community, and uses <u>Village Hubs</u> to provide members with an informal peer-support network to help connect them with their community and improve their well-being, as well as the <u>FriendLine</u> to provide an opportunity for older adults to engage socially with volunteers. In Alberta, the <u>Seniors' Centre Without Walls</u> initiative aims to better connect community-dwelling seniors to the community through free, phone-based recreational activities, interactive information sessions, and friendly conversation.

Other place-based approaches focused more on ensuring appropriate housing and supports to help older adults finance, maintain, and live in their homes for longer. Many of these models focused on supporting older adults financially and providing information to ensure that they have access to and can afford necessary home maintenance and modifications. In Queensland, Australia, the Home Assist Secure program helps adults 60 and older or those with a disability unable to undertake or pay for critical maintenance services of their homes receive safety-related information, referrals, and subsidized assistance for home maintenance or modifications necessary to help Queenslanders remain in their home. Similarly, in <a href=Quebec, the Residential Adaptation Assistance Program, which provides financial assistance of up to \$16,000 for older adults and those living at home with disabilities for specialized equipment and home modifications. Clients register through their local community centres and an occupational therapist provides a report based on the client's needs. Other examples of similar programs supporting home assessments, maintenance, and modifications to support aging in place, usually provided free of charge or through a subsidized rate for those in financial need, have been implemented in Alberta, Ontario, Nova Scotia, and Newfoundland and Labrador.

Finally, a variety of community-based housing models supporting aging in place were identified in our jurisdictional scans. These models variously aimed to improve access to affordable and appropriate housing and/or aimed to better integrate formal or informal supports or services into community settings. For example, several cross-Canada initiatives include <u>Canada HomeShare</u>, <u>Seniors Cohousing</u>, and the <u>Naturally Occurring Retirement Communities with Social Service Program (NORC-SSP). <u>Canada HomeShare</u> is a</u>

program that connects older adults living at home with a spare bedroom and in need of assistance and social support at home with students looking for subsidized rent (\$400-\$600) and private living accommodations. Students assist with household tasks or provide companionship, but cannot perform activities of daily living, such as bathing, feeding, dressing, medication management, and monitoring. Seniors Cohousing allows residents to leverage an initial capital investment upfront to develop a community that is physically accessible and financially and environmentally sustainable, as well as mutual care support from neighbours (co-care). Residents may hire caregivers to provide additional home care or health-related services and often include infrastructure for leisure and social activities. The NORC-SSP aims to integrate a variety of health and social and recreational services through a mix of publicly funded and fee-based services to serve areas that naturally consist of 30-60% of adults who are 60 years and older. In the U.K., Manchester Urban Villages are funded by the Manchester City Council, Manchester Health and Social Commissioning, and the University of Manchester to offer health-promotion initiatives such as exercise interventions and healthy eating programs, as well as other programs to help older adults connect with the environment and their communities.

Care-based models

Care-based models we identified primarily focused on coordinating and providing services for community-dwelling older adults to help them meet their health-related and personal-care needs. Some models primarily focused on providing social and home-care supports to older adults living in the community, such as for assisting with activities of daily living.

The Commonwealth Home Support Programme in Australia supports frail older adults with daily tasks, home modifications, transport needs, social support and some nursing care. Many similar models that include a combination of support with daily activities of daily living, minor home maintenance or modifications, and transportation or social activities can be seen across Canada in Table 2. In the U.K., innovative commissioning models have helped both providers and older residents ensure that older adults living in the community receive the support they need. The Somerset Micro-enterprise programme uses a combination of municipal council and NHS funds to help establish 'micro-providers' by supporting the launch and operation of small businesses that offer services such as social visits and personal care that support independent living. The program is thought to have saved an estimated 2.9 million British pounds compared to traditionally commissioned home-care services, and showed positive user feedback. For users, Personal Budgets and Direct Payments provide a flexible way for individuals to manage their own care needs by selecting a package of social-care services such as housekeeping, home adaptations, grocery shopping, and assisting with dressing.

In Canada, care-based models focusing on personal care are common. For example, the Better at Home program in British Columbia provides non-medical supports to eligible community-dwelling older adults such as housekeeping, social visits, seasonal house care (e.g., lawn and snow removal), groceries, and transportation. In New Brunswick, Nursing Homes Without Walls received some funding through the \$75-million Healthy Seniors Pilot Project to help support long-term care facilities providing services and outreach to those living in the community, including personal care and assistance with transportation, counselling services, and services to promote engagement in social activities at long-term care facilities and in the community. Similar models supporting activities of daily living include Alberta Aids to Daily Living (AADL) and Eimeg Tan Tleiaoltieg (We Are Home Where We Belong) which supports Elsipogtog First Nation older adults in New Brunswick.

Several models focused on health promotion and rehabilitative or preventive care to help older adults maintain their health to allow them to live independently in the community for longer. In B.C., for example, the <u>Choose to Move</u> program connects older adults 65+ who are not regularly active with a certified fitness instructor or kinesiologist to create an action plan to help increase physical activity. Follow-ups and additional supports can include monthly meetings, consultations, and check-ins. Additionally, many of the place-based models mentioned above also incorporate health promotion services to help prevent disability and illness. One example of a <u>NORC-SSP</u> described earlier includes <u>OASIS Senior Supportive Living</u> in Ontario, which promotes better nutrition and physical activities.

Finally, some of the care-based models we identified focused on improving the coordination and provision of primary- and acute-care services for community-dwelling older adults. For example, Canada's Home Opportunity People Empowerment (H.O.P.E.) Model employs self-managing teams of nurses to support older adults living at home in meeting their care needs by coordinating their care and connecting them with both formal and informal care services, as well as providing integrated and holistic care services (e.g., nursing, therapy, personal support work (PSW)). In Québec, the Program of Research to Integrate the Services for the Maintenance of Autonomy (PRISMA) coordinates services ranging from in-home nursing, personal care, home support, day centres, and provision of meals, equipment, supplies, and domestic care. PRISMA clients are assigned a case manager in collaboration with a multidisciplinary team of providers to develop individualized service plans using a standardized assessment tool. Saskatchewan's Connected Care Strategy similarly uses community-based teams working collaboratively to help community-dwelling older adults and other patients ensure care transitions between hospital and community settings are as safe and seamless as possible. The strategy aims to help prevent hospital admissions, long-term care admissions, and minimize time spent in hospital. Additionally, some models are embedded in broader health and social-service efforts that cross-cut personal care, health promotion and rehabilitative or preventive care, and efforts to improve care coordination. In Quebec, Integrated Health and Social Services Centres (CISSS) and Integrated University Health and Social Services Centres (CIUSSS) are responsible for providing health and social services for a particular region. The West-Central Montreal CIUSSS has a Program for the Autonomy of Seniors (SAPA), which engages staff and providers to evaluate seniors' home situation and needs, develop a service plan, and coordinate primary, specialist, and social-care services to support their autonomy, health and well-being.

Technology-based supports

Finally, some community-based models focused on increasing the uptake of or advancing innovation in technology supports to help enable older adults maintain independence at home and/or address their care needs. In New Brunswick, the <u>Connected Communities</u>: Smart Home for Independence, Social Interaction, Safety and Comfort in Aging Individuals aims to improve the uptake of technology to support aging in place by providing a program of six classes addressing concerns such as social isolation, aging at home, and supports for daily living. In Canada, <u>AGE-WELL</u> (Aging Gracefully across Environments using Technology to Support Wellness, Engagement and Long Life) is a federally funded initiative that provides research funding to incentivize the development of innovative technologies to support independent living and improve the health, well-being and social participation of older adults. Twenty-five teams of researchers across Canada have been funded by AGE-WELL to conduct research on and evaluate <u>core research projects</u> supporting the development of innovative technologies, many of which focus on helping older adults remain in the community longer and/or remain socially connected to their communities.

Many other community-based models supporting aging in place leverage technology to support broader goals such as improving care and connecting older adults to their communities, and promoting social engagement. For example, The Home Opportunity People Empowerment (H.O.P.E.) Model received funding to test emerging technologies that can augment the model, and the model uses electronic medical record software and tablets for nurses and patients. The Find Your Way approach in Ontario leverages locating technology along with education and support for communities about how to respond effectively to persons with dementia who may wander off or get lost. Many of the age-friendly community approaches, such as in Nova Scotia, emphasize the role of technology in keeping older adults socially connected. Similarly, Ageing well in Victoria strives to get older adults more familiar with technology to improve their access to information and services, and keep them socially engaged. Overall, even when not a focus of the model, technologies used to help monitor and coordinate care or to help keep seniors connected and socially engaged often play an important role in community-based models supporting aging in place.

Table 1: Overview of the evidence on the features and impacts of community-based models to enable older adults to live independently

This table provides details of the features (populations served, services provided, funding model features, and delivery components) and impacts of the models and related programs that were identified from the included evidence documents.

Models identified from	Features of the models identified	Impacts identified from evaluations of the
evidence documents		models identified
Place-based models – aim	to change or enhance the physical or social environments of olde	er adults to improve their ability to live independently
Housing Models: Naturally Occurring Retirement Community Supportive Services Programs (NORC-SSPs), Cohousing, and Villages (4)	 Older adults Services provided Naturally Occurring Retirement Community Supportive Services Programs (NORC-SSPs) Funding model features Run largely on government funding and grants, which allows them to be staffed by support workers, but limits long-term funding security Delivery features (i.e., coordination, providers, settings and other supports) NORC-SSPs are models of supportive service programs that are formed in neighbourhoods with a majority of older adults that integrate community-based health, social recreation, and allied health services 	 The study suggested that all three models (cohousing, villages, and NORC-SSPs) positively influence physical and mental health, lower the demand for formal care, and enhance residents' knowledge of health promotion and disease prevention NORC-SSPs were found to be inclusive of older adults from different ethnic backgrounds and lower socio-economic status Designing flexible volunteer positions can improve participation in NORC-SSPs
	 Population served Older adults Services provided Cohousing Funding model features Rental units are funded by residents Self-developing cohousing projects help to offset the costs of building the common areas and augmenting energy efficiency of the buildings used Delivery features (i.e., coordination, providers, settings and other supports) 	 The study suggested that all three models (cohousing, villages, and NORC-SSPs) positively influence physical and mental health, lower the demand for formal care, and enhance residents' knowledge of health promotion and disease prevention Some cohousing projects were found to be inclusive of older adults from different ethnic backgrounds and lower socio-economic status Having group discussions and sharing activities in cohousing can help to promote spontaneous social interaction

	 Consists of private or rental units for each resident and shared communal spaces that can be intergenerational or exclusively for seniors Population served Older adults Services provided Villages Funding model features Financed by membership dues, which has led to challenges in securing funding and prompted expansions of membership recruitment Delivery features (i.e., coordination, providers, settings and other supports) Villages are governed by residents Paid staff and/or volunteers provide older residents within the village with services like transportation, home maintenance, and healthcare 	 The study suggested that all three models (cohousing, villages, and NORC-SSPs) positively influence physical and mental health, lower the demand for formal care, and enhance residents' knowledge of health promotion and disease prevention While some cohousing projects and NORC-SSPs were found to be inclusive of older adults from different ethnic backgrounds and lower socio-economic status, villages were not found to facilitate the inclusion of residents with diverse backgrounds
Community-Based Housing Models (3)	 Population served Older adults aging in place Services provided Community-based housing Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Settings included villages, naturally occurring retirement communities, congregate housing and cohousing, sheltered housing, and continuing-care retirement communities 	 Impacts of these housing models were not specifically discussed in the scoping review Four key themes emerged from the review: social relations, health and well-being, sense of self and autonomy, and activity participation Broad considerations applicable to all models included providing for fostering meaningful social relations both within living spaces and the broader community, ensuring the availability of inclusive social activities and communal programming, and improving the availability of on-site staff to support residents' access to relevant social, leisure, and health services
Adaptation System for Independent Living (5)	Population served Older clients who are homeowners and private tenants in the U.K. Services provided	Several inconsistencies and inequities were identified across local authorities, and significant delays were found at all five stages of the adaptation process

	 Housing adaptation support <i>Funding model features</i> Not specified <i>Delivery features (i.e., coordination, providers, settings and other supports)</i> Providers involved include housing officers, social workers, occupational therapists (OTs), staff from other agencies, and older service users 	 These included different routes for making referrals, delays in client contributions towards adaptation costs, and added administrative procedures for choosing contractors and making major adaptations The study recommended that an effective liaison across departments or organizations could consist of regular meetings, joint trainings, and mutual procedures Local authorities can make use of agencies like home improvement agencies (HIAs) in organizing and managing time and costing of adaptation work Introducing standardized referral forms, using ancillary assessments for OT, and clear policies on timelines for installation work were also recommended for addressing the inconsistencies that were identified
Multifamily Dwelling Elevator Retrofit Projects (7)	 Older adults living in multifamily buildings Services provided Elevator retrofitting to improve accessibility in multifamily dwellings with no elevator Funding model features The Existing Multifamily Dwellings Elevator Retrofit (EMDER) policy requires funding arrangements that include government subsidies and out-of-pocket payments from building residents Delivery features (i.e., coordination, providers, settings and other supports) Implementation of EMDER policy requires consent of two-thirds of families in a building Policy is implemented in China 	 Adoption of elevator retrofitting policies was more likely following adoption in neighbouring provinces, which may be due to increased legitimacy of the policy Provinces that are more dependent on financial transfers from the central government were more likely to adopt the policy, which may be due to increased pressure to comply with central government policy goals
Senior Housing living environment (6)	Population served	Residents highlighted the importance of having a choice in terms of relocation and everyday

	 Residents (55+ years) of a Finnish communal housing project Services provided A part-time community coordinator to support residents of the housing project Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Features of the housing project were low-maintenance apartments and accessible common spaces, amenities, green spaces, and public transportation 	seniors communal hous represented, with some and foremost a place the opportunities for socialithat the most important was maintenance-free apareas	omplex was a safe and nt that is supportive for d responses on what the sing complex saying that it was first at provided tzing while others said benefit of the complex partments and outdoor
home care, primary care, palliati	 Population served Older adults living in communities Services provided Not specified Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) The Age-Friendly Cities framework consists of eight evidence-based domains: outdoor spaces and buildings transportation housing social participation respect and social inclusion civic participation and employment communication and information community support and health services support older adults living independently to meet their health-we care, and social care 	Impacts of implementing Cities approach were not The findings provided in of the pandemic on the Age-Friendly Cities frandirection for service prosocial determinants of he for older adults. A focus on creating oppengagement and civic pand food security support community-based organidentified as critical for estay at home, especially pandemic.	ort discussed insights into the impacts eight domains of the nework and provided oviders supporting health and aging in place cortunities for social articipation, economic orts, and strengthening hizations, were enabling older adults to in the context of the
Home care Integrated care sites in	Population served	The expanded chronic o	car model (ECCM)
Europe (11)		framework was used in	` ,

	 Older adults living at home with complex needs Services provided Interdisciplinary health and social care for older adults in Europe Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Services provided through the integrated care sites encompassed self-management support, delivery-system design, decision support, and clinical-information systems to include prevention and health promotion Features of these services included self-management and decision support from multidisciplinary teams, needs and home safety assessments, joint care planning, access to equipment, and client education The 14 care sites are located in seven European countries 	 the existing working processes and improvement plans of the 14 integrated care sites participating in the SUSTAIN project The study found that different types of care and support services were provided across the care sites evaluated, including proactive primary care, home nursing and rehabilitative care, dementia care, and palliative care Some care sites exclusively engaged medical professionals while others involved equal numbers of health and social-care professionals Challenges with implementation included difficulties collaborating across organizations and care settings, barriers to communication flow, inadequate resources, high workloads for staff, and limited provision of person-centred care (for reasons including lack of knowledge and time for staff) Improvement plans created by the sites addressed improving capabilities for coordination and collaboration or improving
Restorative/reablement care (9)	 Population served Older adults (65 years+) Services provided Intensive (i.e., multiple visits), time-limited (typically six to 12 weeks), multidisciplinary, goal-directed, and person-centred home-care service Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Involves multiple visits of professionals to a person's home over a limited period of time 	 specific care-delivery processes The review found that reablement may be slightly more effective than usual care in improving function of older adults at nine to 12 months, according to very low-quality evidence Reablement may make little or no difference to mortality after the first 12 months or to rates of unplanned hospital admission at 24 months The effectiveness of reablement services could not be adopted nor refuted due to limited evidence

	Typically provided by a team of health and social care professionals		
'Stay Active at Home' program (10)	 Population served Older adults Services provided Knowledge, skills, and social and organizational support for home-care professionals to deliver day-to-day rehabilitative services to older adults Funding model features In the Netherlands, this program is funded by municipalities and nursing care is financed by public health insurance Delivery features (i.e., coordination, providers, settings and other supports) Program requires six months of training that includes an initial kick-off meeting, regular team meetings, and booster meetings two to three months following the training period A manual is provided to home-care professionals with interventions and materials, and a weekly newsletter, that were available in Dutch The personal experiences of the program's participants are discussed at team meetings 		The impact of the Stay Active at Home program was not discussed
Empowering Caregivers to Deliver Home-based Restorative Care (12)	 Population served Caregivers of adults in need of restorative care; regulated and unregulated health professionals Services provided Training of caregivers in restorative care by health professionals Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) 	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Programs that train health professionals to engage caregivers in restorative care should be flexible and driven by pre-training learning needs assessment, draw on multiple data sources such as literature and engagement of persons with lived experience, and include a clear statement of principles and goals of restorative care These programs may involve didactic, interactive, experiential, "just-in-time," and mentorship-based approaches

	Training programs can use small groups and a combination of digital and in-person approaches	
Primary care		
The Staying at Home (SAH) Program (14)	 Population served Residents of 11 high-rise buildings for low-income older adults Services provided Care coordination, medication management, and advance planning services provided by an intervention team of healthcare professionals Funding model features Program implemented in subsidized housing for older adults Delivery features (i.e., coordination, providers, settings and other supports) A team of healthcare professionals maintain a healthcare diary in collaboration with participants 	 The study found that positive health outcomes and cost-savings were achieved by SAH participants when compared to non-participants SAH participants were also found to have fewer nursing home transfers and inpatient admissions
Community Health Consultation Offices for Seniors (18)	 Population served Seniors (60+ years) who were frail, overweight, or smokers Services provided Nurse-led healthcare consultation Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Consultation included a comprehensive assessment, preventive advice, and referral to other healthcare providers if appropriate Nurses received training in motivational interviewing, as well as training in healthcare consultation and a one-hour discussion with a dietitian The study occurred in the Netherlands 	 The intervention group was similar to the careas-usual group in terms of gender and physical morbidity, but differed in other respects (the intervention group was younger and frailer) The increase in participants with self-rated good health did not significantly differ between groups, and changes to health-related behaviours and prevalence of overweight, hypertension, and hyperglycemia within the intervention group were not statistically significant The intervention group had higher odds than the care-as-usual group of transition to a worse health profile

Geriatric Evaluation and	Population served	Geriatric Evaluation and Management was
Management program (15)	 Patients participating in the inpatient Geriatric Evaluation and Management program, and their caregivers Services provided Geriatric Evaluation and Management is a geriatrician-led, interdisciplinary model for restorative care and discharge planning	 Genatic Evaluation and Management was considered to be holistic and supportive, but primary-care providers may not have knowledge of the program Participants described care transitions as chaotic, and self-care in the community as precarious; care transition experiences were affected by the quality and timeliness of communication and information exchange, patient and carer attitudes towards seeking help, and system pressure Providers experienced performance targets, pressure to discharge, and unclear referral pathways as barriers to coordinated care
Chronic Care Model (CCM) (13)	 Population served Frail community-dwelling older adults whose GPs use the Finding and Follow-up of Frail older persons (FFF) approach Services provided Proactive finding of frail older adults Case management, medication review, and self-management support Multidisciplinary teamwork within primary care for older adults Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Ongoing self-management support is provided to patients through proactive education by health professionals The study occurred in the Netherlands 	 The implementation of interventions in the Chronic Care Model (CCM) dimensions were analyzed, as well as the quality of primary care perceived by healthcare professionals that use the FFF approach GPs valued the proactive and interdisciplinary nature of the FFF approach Implementation challenges included a lack of aligned financing, human resources, and information and communication technology Practices implementing FFF were more aligned with the Chronic Care Model than controls, including through greater use of proactive case finding and monitoring, individual care planning, multidisciplinary care, and medication reviews FFF was associated with better quality care as scored by GPs using a standardized tool (the Assessment of Chronic Illness Care Short version)

Staying Active-Staying Independent (SASI) program (17)	 Population served Community-dwelling older adults who participated in the 'Staying Active-Staying Independent (SASI) program Services provided Care that helped to reduce five aspects of functional decline: mobility, skin integrity, cognition/emotional mental health, nutrition, and continence Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Areas of care are documented in a care plan Program occurred in Australia 	 The evaluation found that the relationship-focused care provided through the program led to improvements in functionality and quality of life for seniors Clients reported losing weight and the subsequent improvement in physical function, improved confidence from being able to complete exercises and seeing improvements in their skin integrity, and the willingness of community support workers (CSWs) to listen to them and consider their individual situations There were different levels of involvement in care planning, according to clients The evaluation also found that the program contributed to the professional development of CSWs and increased satisfaction with their role
APN House calls program (19)	 Population served Older adults (65 years+) Services provided House-call program provides home-based evaluation and care for homebound seniors, and a satellite primary-care office in a senior's housing development Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) An initial home visit is conducted by an advanced practice nurse (APN) and social worker and includes several assessments An individualized care plan is developed with the patient and caregiver Advance practice nurses follow the Shuler Nurse Practitioner Practice Model and provide episodic visits as well as comprehensive visits with and without identified health problems 	 The program maximized the use of APNs to provide quality, cost-effective care to older adults and their families The study did not provide specific details on the impact of the house calls program

Palliative care	 Satellite clinics are staffed by APNs and offer health promotion and prevention in communities found to have low utilization of these services This program is implemented in the U.S. 	
LIVE@Home.Path program (23)	 Population served People with dementia who participated in the LIVE@Home.Path program Services provided Dementia and coping skills and education for patients and their caregivers Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) A coordinator makes at least two home visits and monthly phone calls over six months The coordinator connects participants to local courses about dementia and coping skills The coordinator provides information about resources to support effective use of technological supports such as smart homes The coordinator facilitates the initiation of end-of-life advance care planning and medication review with general practitioner The study took place in Norway 	 A feasibility study found that coordinators helped caregivers to find, coordinate, and make use of support, and provided emotional support "Empowerment" (i.e., initiation of advance care planning and medication review) was found to be difficult to achieve The full study has yet to be completed The primary outcomes of the larger study to come in the future will be resource utilization and caregiver stress, and secondary outcomes will include quality of life, functional status, and symptom measures (e.g., depression, agitation)
In-home palliative care intervention (25)	 Population served Patients with a prognosis of one year or less to live, and at least one past-year emergency-department visit Services provided In-home palliative care Funding model features Not specified 	 At 30 and 90 days, intervention-group participants were more satisfied with care than control-group participants (although there was no difference at baseline or 60 days) Intervention-group participants were less likely to go to the emergency room (20% versus 33%) and be hospitalized (36% versus 59%)

	 Delivery features (i.e., coordination, providers, settings and other supports) The core team included a palliative care physician, nurse and social worker The team developed a care plan that coordinated and continually reassessed care, as well as engaged in advance care planning and self-management training Physicians provide home visits and nursing is available 24 hours on-call Patients did not have to forego curative care and the frequency of contact is determined by patient need The study took place in Colorado and Hawaii, U.S. 	 Costs were reduced for those who received home care, who incurred average costs of \$95.30 per day, compared to \$212.80 for the control group 71% of intervention-group participants who died during the study passed away at home, compared to 51% of controls
End-of-life/palliative care (general)(22)	 Population served People aged-18 years and older Services provided End-of-life care Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Active treatment by health professionals at the patient's home for continuous periods of time 	The review found that end-of-life care that is home-based increased the likelihood of dying at home when compared with usual care, and that home-based end-of-life care may improve patient satisfaction at one-month follow-up
Palliative care services (general)(21)	 Population served Adults no longer responding to curative or maintenance treatment Services provided Holistic physical and psychosocial interventions that enable patients to stay at home Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) 	 The results of the study showed increased odds of dying at home and significantly beneficial effects of home palliative-care services compared to usual care on reducing symptom burden for patients with cancer, but had no effect on caregiver grief The evidence on cost-effectiveness of home palliative care was inconclusive

	Care is provided by a team of health professionals with specialist training in palliative care	
Social care		
Personal assistance program (26)	 Population served Older adults (65+ years) living in community Services provided A paid assistant (other than a healthcare professional) provides individualized support for at least 20 hours per week Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) The paid assistant supports the older adult with tasks of daily living (e.g., bathing) 	 In general, personal assistance was preferred over other types of services The review also found that paid personal assistance most likely substitutes for informal care, but may cost governments more than alternative care options
Meeting Centres Support Programme (MCSP)(27)	 Population served Individuals with mild-to-moderate dementia who live at home Services provided Meeting Centres Support Programme (MCSP) offers a social club, psycho-education and discussion groups for caregivers, social activities, and coordination of home-care services Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Services offered three times per week Program implemented in Poland 	 People with dementia in the intervention group reported a decrease in unmet needs at six months, compared to an increase in the usual-care group Carers similarly reported a decrease in unmet needs in the intervention group, and an increase in the usual-care group Those in the intervention group had a greater increase in formal support while those in usual care had a greater increase in informal support
Adult day centres (28)	Population served Older clients who attend adult day centres Services provided Offers a variety of comprehensive services to support social care of older adults	Themes related to quality of life for ADC clients were aging in place, physical health and well-being, social networks/relationships, activation, safety, respite, respect and inclusion, and adequate health-care services

	 Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) The types of services provided by ADCs were not explicitly described The backgrounds, qualifications, and professions of the staff at ADCs varied considerably The study location was B.C., Canada 	Adult day centres offered opportunities for social support and respite for caregivers, enabled activation through participation in activities, and were perceived as respectful, inclusive, and safe (e.g., low risk of falls)
Care System for Older Adults in Ontario (29)	 Population served Older adults in Ontario, Canada Services provided Not applicable Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Not applicable 	 This evidence brief explored approaches for organizing a care system for older adults Three approach options were presented to address the problem: Option 1 – Support older adults and their families to enable healthy aging by providing self-management supports, education for patients and their families, specialist outreach to improve access to care, and telehealth options to reduce unnecessary hospital visits and service use Option 2 – Coordinate integrated healthcare services including discharge planning, endof-life care in home, rehabilitative care, and respite care for caregivers Option 3 – Coordinate integrated community resources by using case-management models to support integrated home-care community programs and electronic medical records when possible
Technology-based models independently	s – aim to increase the uptake of or enhance technology that ca	n assist in meeting the care needs of older adults living
Personal alarm models of care (24)	 Population served Terminally ill, home-dwelling adults Services provided Extra care-aide time and personal alarms 	The personal alarm model of care was beneficial for imparting a sense of security and peace of mind and dealing with feelings of isolation

	 Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) The personal alarm consists of a pendant with a button that the patient can press in an emergency; pressing the button links them to the service-provider call centre Patients can also be provided with an extra 10 hours per month of care Study was conducted in Australia 	 In addition, the personal alarm provided reduced anxiety of social isolation and comfort that they can connect with someone with a press of a button The extra care-aid time allowed participants to manage their daily household tasks, allowing them to continue to live in their familiar homes Similar to the personal alarm, the additional care comforted and reduced isolation for the participants by providing an added layer of attention
eHealth in rural and remote areas (31)	 Population served Older adults (60+ years) living in rural and remote areas Services provided Virtual access to healthcare services Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Common technologies used are apps, monitoring platforms, and web-based platforms Population of interest lives in rural and remote settings 	 Support for enabling eHealth use was mainly comprised of adults' own digital competencies which were shared and expanded through their social networks; training sessions were also provided by health professionals or technical staff Reported enablers to older adults learning to use eHealth included providing support, including social-network support, such as face-to-face support, and non-social support, such as written or video instructions Reported barriers related to older adults' learning to use eHealth technologies were health-related difficulties, such as cognitive impairment or impaired hearing
The Personal Emergency Response System (PERS)(30)	 Population served Fragile older adults Services provided Urgent, on-call care Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) An alarm, which may be integrated with other devices (e.g., a blood pressure monitor) to 	 Identified benefits of PERS were the possibility of receiving urgent help when needed, including being helpful for those living in isolation, those with mobility issues, and concern for personal safety Resistance and non-use of PERS was shown to be due to the change in caring practices and the way users experience the technology as changing their lives and homes

	trigger a call to an emergency contact or public or private call centre	
Smart homes and home health monitoring technologies (28)	 Population served Older adults living at home who have complex care needs Services provided Home health monitoring Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Automation of devices or appliances, and/or devices for remote monitoring of the occupant's health 	 The level of technology readiness among older adults was low and there is limited evidence that smart homes and home health monitoring help address disability prediction and health-related quality of life or fall prevention Home health technology was found to have some benefits for older adults with daily living, cognitive decline, mental health, and heart conditions
Smart Environments and Social Robots (34)	 Population served Older adults living independently Services provided Integrated care services that use assistive technologies for management of polypharmacy and social and cognitive activity in older adults Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) The polypharmacy management service combines objective monitoring to assess medication use and to better inform interventions Social assistive robot-based systems stimulate the physical, social and cognitive conditions of older adults, and can be personalized to make the user experience more social 	 Specific challenges with use of social-assistive robot systems by older adults that were identified were the preference of older adults for personalized target support as opposed to general-purpose information, and factors correlated with the acceptance of technology included costs, usability, and privacy implications The study suggests that care functionalities such as monitoring daily activities, behavioural monitoring, medical reminders, and virtual coaching can improve activity, safety, comfort, and social functionality It also claims that these functionalities can lead to delayed admissions into care institutions and reduced use of professionalized care services
Telecare (35)	 Population served Older citizens of England and Spain Services provided Telecare 	Some participants actively engaged with telecare devices as they facilitated increased action and freedom and proved to be important during emergency scenarios

	 Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Not specified 	 Some participants refused to use telecare systems and rejected the idea of being someone who needs extra attention through telecare Additionally, other participants who resisted using telecare services displayed a lack of understanding of the system Telecare services were also misused by some participants and telecare managers suggest that those misusing the system should have the system removed Proper evaluation of telecare systems requires learning from users on how the services are unleashed and used
Mobile Health (36)	 Population served Older adults (70+ years) with cognitive impairment Services provided Mobile health interventions Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Interventions not described Site located in Sweden 	 This study focused on gathering patient perceptions on mobile health Some participants feared usage of mobile technology, found themselves lacking technical skills, and many even displayed a lack of need or interest in mHealth Others believed mHealth facilitated communication, created a sense of security, and would allow them to stay informed Some also found that mHealth could support recall in memory, create feelings of well-being, and allowed for health monitoring during illness
Technology packages (37)	 Population served Older adults (65+ years) Services provided Technology package: consisted of installation of health monitoring, security alarms, and communication and entertainment devices, with six hours of technology coaching Funding model features The technology package had a value of up to \$4,000 	 After the intervention, many participants purchased additional devices that they had not used before, including compensatory aids and safety devices For those who were less confident in technology usage or worried about security risks, they benefited greatly from the technology coaching Cost barriers, low digital literacy, physical limitations, technology ambivalence, and social

	Delivery features (i.e., coordination, providers, settings and other supports)	stigma were all factors that contributed to hesitancy regarding technology usage
Mobile health (mHealth) technologies (33)	 Study participants located in Southern Australia Population served Older adults with chronic conditions Services provided Health interventions using mHealth technologies Funding model features Not specified Delivery features (i.e., coordination, providers, settings and other supports) Mobile devices are used to deliver healthcare 	 The impact of mHealth technologies was not discussed in this scoping review A focus on user-centred design and interdisciplinary/collaborative team approaches are two themes that emerged pertaining to the practices and considerations in designing mHealth solutions Successful implementation of mHealth solutions should consider feasibility in relation to organizational and system readiness, acceptability of the mHealth solution, and usability in relation to the different end users

Table 2: Experiences from other countries and Canadian provinces and territories with community-based models or programs that enable older adults to live independently

This table provides details about features and experiences of community-based models and programs identified from the international and Canadian jurisdictional scan, organized by jurisdiction.

Jurisdiction	Model identified	Population served (e.g., demographics of older adults, number of older adults)	Services provided (e.g., health, social)	Funding model features	Delivery features (i.e., coordination, providers, settings and other supports)	How is the program monitored and evaluated?
			Other countr	ies		
Australia	Commonwealth Home Support Programme	Frail older adults aged 65 and older (50 and older for Aboriginal or Torres Strait Islander peoples) and older adults aged 50 and older (45 and older for Aboriginal and Torres Strait Islander peoples) who have a low income or housing insecurity are eligible for this program	Supports provided include help with daily tasks, home modifications, transport, social support, and nursing care	This program is funded by the Australian Government through grant agreements and client contributions 10% of the total Commonwealth Home Support Programme funding in 2020-2021 was made through client contributions	Commonwealth home support program services are provided by trained assessors who work out what support each person needs during a face-to-face assessment in the home There are around 1,400 service providers in Australia, with 68% of them being not-for-profit organizations	 This program is managed by the Department of Health The Department of Social Services manages the program grants and the Data Exchange where service providers submit reports The Aged Care Quality and Safety Commission assesses the services to make sure providers meet quality standards
	• Queensland Community Support Scheme	Adults aged 65 and older (or 50 and older for	• Support in community activities such as	• The <u>Queensland</u> <u>Government</u> , through the	• QCSS supports can be delivered on a face-to-face,	The QCSS has an outcome measurement

	Torres Strait Islander people) with a disability, chronic illness or mental health condition, or other circumstances that have an impact on their abilities to live independently in their communities	recreational activities, using the library and visiting the doctor, and home activities such as meal preparation, household chores, personal care and basic home maintenance are provided	Communities, Disability Services and Seniors (the department), is responsible for funding and administering the Queensland Community Support Scheme (QCSS) • A process for determining an individual's eligibility for these services helps providers in determining who is eligible to receive QCSS- funded supports • This scheme is block funded, meaning that funding is not allocated to an individual and is not transferrable from one service outlet to another • The QCSS outlines a set of fee principles that service outlets are required to adhere to, to ensure a fair	on a face-to-face basis in smaller group settings; on a technology-based basis; or by other methods that achieve the identified service-user goals The setting in which the support is provided depends on the service support type, with inhome supports being delivered in an individual's home while community-connection supports are provided to individuals in the community	outlines its objectives and data about the individual and the service provided to be collected Objectives of the outcome measurement system include to facilitate the collection of performance data for organizations and service outlets funded by the QCSS, to provide QCSS with the data required for policy development, strategic planning and performance monitoring, to assist QCSS- funded organizations to provide high- quality supports, and to enable QCSS contract management
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• Home Assist Secure	 Queenslanders aged 60 years and over, or people of any age with a disability, who are unable to undertake or pay for critical maintenance services to their homes without assistance Participants in this program must be a Pensioner Concession Card holder 	Safety-related information, referrals and subsidized assistance Individuals can receive financial contributions towards labour costs for minor home maintenance or modifications that relate to health, safety or security and that need to be done so one can remain in their home	and equitable approach to people who access QCSS supports This program is funded by the Government of Queensland and administered by Housing Services, Department of Housing and Public Works This program follows a subsidized assistance model which outlines the fees covered by the program and the fees that an individual needs to contribute	A "First Interview" must be conducted by trained staff to determine a client's needs and to advise the client about services available to them This program will then connect clients to skilled tradespersons to carry out the work needed	Program providers must submit quarterly performance reports Objectives of this program include better-informed clients about home maintenance and safety, improvements in the health and safety of clients' homes, and the referral of clients to reputable tradespersons and other relevant community services
National Disability Insurance Scheme	• The program is available to individuals who live in an area where the insurance scheme is available, meet the residency requirements, meet the disability or early	• This program helps participants fund supports they might need, including assistance with daily life, home modifications, supported independent living and short-term accommodations	The NDIS costed \$21.6 billion in 2019-2020 The Australian Government was responsible for just over half (\$11.2 billion) of the annual cost of the scheme, while state and territorial governments were	 Supports are provided by registered providers Under the objects and principles of the NDIS Act, participants are entitled to exercise 'choice and control in the pursuit of their goals and the 	• The NDIS provides quarterly reports with information about participants in each jurisdiction and the funding or provision of supports by the NDIA in each jurisdiction

	intervention requirements and are under 65 years of age when the access request is made	This program also helps fund assistive technologies to help individuals maintain their independence	responsible for the rest of the cost This program is uncapped, meaning that participants will receive funding based on need rather than monetary value This program considers the necessity of the technology, the product risk and product cost when providing funds	planning and delivery of their supports • Funds allocated to an individual may be managed by that individual, a registered planmanagement provider or a nominee of the participant	
Aged Care Diversity Framework	Older Aboriginal and Torres Strait Islander peoples, senior Australians from culturally and linguistically diverse backgrounds, and LGBTI elders	• This framework identifies that older people are a group with diverse needs which can be shaped by individual characteristics, life experiences and barriers that are faced. This group faces specific care needs which could be influenced by one's social background	Activities under the Diversity Framework will be funded by the Australian Government	 The government has the role of collecting data, identifying barriers, ensuring the diversity of older people are embedded in care design Peak organizations and representative groups have the role of including diversity in publications and information that promotes best-practice models, engaging their 	 The Diversity Framework will be subject to evaluation every three years Reporting on the framework will be captured through annual reporting to the Aged Care Sector Committee, an annual report on the Operation of the Aged Care Act, an annual report on Government Services and as part of future data collection against

		This framework seeks to embed diversity in the design and delivery of aged care and to support actions to address perceived or actual barriers in accessing safe, equitable and quality aged care		members and communities to inform best practice, and developing and evaluating innovative partnerships and models to overcome barriers faced by older people • Aged-care providers have the responsibility to provide information in user-friendly formats, engaging consumers in a culturally safe and supportive environment, and collaborating with stakeholders • Consumers and their families have the responsibility to provide feedback, and engage as active partners	special-needs groups The main outcomes for consumers that are the objective of this plan include making informed choices, adopting systemic approaches to planning and implementation, accessible care and support, supporting a proactive and flexible system, respectful and inclusive services, and meeting the needs of the most vulnerable
Ageing well in <u>Victoria</u>	• The <u>Victorian</u> <u>government</u> also aims to support diverse communities by	This action plan includes actions to support older Victorians to achieve and live	The Government of Victoria funds partnerships with community-based organizations to	The services suggested under this framework will be provided by community-	The Commissioner for Senior Victorians and the Senior Victorians Advisory Group

	partnering and consulting with a diverse range of older people, including LGBTIQ+ and First Nations peoples	with eight attributes of aging well, including: a positive attitude; the idea that life has purpose and meaning; being respected and respectful; being connected to family, friends and society; staying in touch with a changing world; a safe and secure home and finances; the ability to manage health issues, including mental health; and the ability to get around The main priority areas of this action plan include helping seniors to become more resilient and connected, more familiar with technology, valuing senior Victorians and	provide services to improve older adults' connection within society and their qualities of life	organizations such as Aboriginal Elders Cultural Wellbeing, the Chatty Café Scheme and Universities of the Third Age Individual service providers such as bilingual health workers, libraries and neighbourhood houses will also be engaged	will be responsible for reporting on the progress of the initiatives outlined by this framework
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	• Seniors Connected Program	Australians aged 55 and older (or Indigenous Australians aged 50 and older) living in the community	 The two activities run by this program include the FriendLine and Village Hubs Village Hubs provide members with an informal peer support network to help them age well in their communities for as long as possible, by enabling them to realize their potential for physical, social and mental wellbeing There are currently 12 Village Hubs throughout Australia 	 This program is funded by the Government of Australia This program runs from 2019-20 to 2023-24 with a total budget allocation of \$10 million. Funding is split evenly between the two activities 	 The FriendLine program is run through telephone by volunteers Village Hubs were selected by Independent Living Assessment by the Department of Social Services The Village Hubs are independent centres with services catering to a diverse range of older adults including Aboriginal and Torres Strait Islanders, culturally and linguistically diverse individuals, and LGBTIQA+ individuals 	Methods of monitoring or reporting on this program have not been specified
United Kingdom (U.K.)	An alternate commissioning model: Somerset Micro-enterprise programme	• With 867 micro-providers that offer care to 6,000+ individuals, this initiative totals over 26,000 hours of support delivered per	This model helped establish the microprovider initiative, which enables individuals to launch and operate small businesses that	• An initial investment of 75,000 British pounds per year was pooled together through Somerset council and NHS funds	Although the initiative received support from Community Catalysts in its early stages, it is currently only managed by the Somerset Council	• A 2020 survey of micro-providers found that this new model resulted in an estimated 2.9 million British pounds in savings when compared to traditional commissioned

	week to older adults and others who require home- care services to support aging in place	offer local support to older adults; examples of services include social visits and personal care to support independent living			home-care services; an evaluation of the program further revealed positive outcomes among users • A service quality feedback form is available to clients to describe their experiences and suggest improvements to the program
Personal Budgets and Direct Payments	 This initiative is available for those requiring support due to health concerns that have had a significant impact on their well-being and ability to perform daily activities (e.g., eating, cleaning, and toilet needs) Services are only available in England and Wales 	Funds are used towards social-care services, which include but are not limited to housekeeping, home adaptations, groceries, and dressing	• The following three options are how finances are commonly managed under this program: 1) the council can manage one's personal budget; 2) the council can make payments to a third-party organization that is providing care for the client; or 3) the council can provide funding to the client directly or to a designated contact (i.e., direct payments)	The social services department of local councils are involved in the assessment and onboarding process	None identified

<u> </u>	<u>Urban Villages</u>	 Participants involved in this program included adults aged 50 years and above in the Brunswick Estate and Levenshulme communities A particular focus was on migrant women, men living with mental health difficulties, or those facing isolation 	• There is a wide array of services offered through the 'Village' model, such as improving mobility through exercising interventions, promoting healthy eating habits through the 'Meal Buddies' initiative, and reconnecting with the environment through the	 A combination of the disbursement options is available and known as 'mix and match' This program was funded by the Manchester City Council, Manchester Health and Social Commissioning, and the University of Manchester 	Program and service delivery was carried out through the recruitment of local volunteers	• An initial evaluation of the program revealed that the Men's Art group was effectively helping to bridge the social isolation gap among older men in the community, and the Women's Footprints group was able to successfully engage migrant women (many of whom were facing challenging
		those facing	the environment			were facing

Pan-Canadian	Age-Friendly	• Seniors in	Canadian provinces ar • There are eight	ed territories • PHAC provides a	• A "milestones	mental and physical health interventions in low-income communities, as well as better integrating the role of anchor institutions • One of the
	Communities (AFCs)	Canadian provinces where AFC initiatives are being implemented AFCs have been or are being established in all 10 provinces Age restrictions may vary by province or program	domains of the physical and social environment that AFCs should address: 1) outdoor spaces and buildings, 2) housing, 3) transportation, 4) social participation, 5) respect and social isolation, 6) communication and information, 7) civic participation and employment, and 8) community support and health services The Public Health Agency of Canada (PHAC) provides Age-	list of potential funders for AFC programs at both the federal and provincial level, including Employment and Social Development Canada and the Canadian Mortgage and Housing Corporation Funding for AFCs is typically provided through grant programs administered by provincial governments	approach" is adopted to guide the implementation progress as communities become age-friendly The milestones are: 1) establish an advisory committee; 2) secure a local municipal council resolution; 3) establish a plan of action; 4) demonstrate commitment to action by publicly posting the action plan; and 5) commit to measuring activities, renewing action	"milestones" of AFCs is to measure activities of the initiatives and to publicly report on progress

		Friendly Checklists that describe the essential features of each of the eight domains		plan, and reporting on them publicly	
• Canada HomeShare	 Any adult 55 years and older with a spare bedroom in their home or in the home of their caregiver(s) Canada HomeShare is serving senior populations in Ontario, B.C., and Alberta 	 In exchange for subsidized rent and private living accommodations, students provide up to seven hours of companionship and/or assistance to seniors Students cannot perform any activities of daily living, such as bathing, feeding, dressing, medication management, or monitoring All students studying at a post-secondary institution are eligible Given the rise in cost of living in 2022, the Canada HomeShare program is growing and expanding across 	Students participating in a Canada HomeShare program pay a subsidized rent of \$400-\$600 in exchange for carrying out activities to support the older adult in the home A Canada HomeShare agreement is agreed to and signed by the student and the home provider that specifies the cost of rent to the student, expected contributions to the household, and shared spaces of the home	 Canada HomeShare is facilitated by a team of social workers who provide ongoing support and conduct regular follow-ups and mediation with clients Canada HomeShare plans and arranges matches of students and home providers through a thorough application process of background checks, personal reference checks, and interviews An in-person match meeting between the student and home provider is required before 	None identified

• The Hor Opporture People Empower (H.O.P.I Model	living within a neighbourhood where the model is being implemented The H.O.P.E. Model has been piloted in at least two neighbourhoods in Ontario since 2019	provinces as students return to in-person university programs • Teams of nurses provide integrated and holistic care services (e.g., nursing, therapy, PSW) to support clients and their caregivers in their self-management capabilities	AMS Healthcare and SE Health have partnered to pilot the H.O.P.E. initiative over four years within select neighbourhoods in Ontario Funding to test emerging technologies to augment the H.O.P.E. model was provided by CanHealth Network, and EMR software and tablets for nurses and patients were funded by AlayaCare and Samsung, respectively	the Canada HomeShare agreement can be signed • Self-managing teams of nurses support clients in meeting their care needs by coordinating their care and connecting them with both formal and informal care services	None identified
• Seniors Cohousi	Many seniors cohousing communities have no age restrictions, but some require at least one household	• Residents benefit from a community design that is physically accessible and financially and environmentally	Cohousing residents invest initial capital upfront to develop the community's infrastructure	Cohousing communities are typically made up of 20 to 30 homes that combine private dwellings with shared spacious amenities	None identified

	member be 55+ years	sustainable, as well as mutual care support from neighbours (co- care) Resident caregiver(s) are hired by the residents Harbourside Senior Cohousing in B.C., a primary example of seniors cohousing in Canada, offers a wide range of social activities, including group yoga, book clubs, and gardening and boating opportunities	Residents may hire caregivers to provide additional health services	such as large dining rooms, kitchens, and recreation spaces Residents of Harbourside Senior Cohousing in B.C. all sit on council and are welcome to council meetings Harbourside has been built according to Built-Green Canada Gold standards	
• Naturally Occurring Retirement Communities with Social Service Program (NORC-SSP)	• A geographic designation is considered a NORC if 30-60% of adults are 60 years and older	Residents are provided with health and home-care workers (government services) while social and recreational programs are offered by private organizations	Health services (e.g., healthcare workers, coordinators) are publicly funded and fees for private social and recreational services are calculated on a sliding scale based on income In 2021, the Oasis Senior Supportive Living Inc.	• At the Oasis Senior Supportive Living program, the primary example of an NORC-SSP in Canada, a partnership has been established between residents of Bowling Green Apartment Complex, Homestead Landholdings (the	• In 2021, the Canadian Institute of Health Research (CIHR) funded an ongoing longitudinal evaluation of the Oasis Senior Supportive Living Inc. program from 2021 to 2025 to better understand the effectiveness of the program

				program, which implements the NORC model, received funding to support the expansion of the program to 12 communities across Canada	property owner), and the Home and Community Support Services, which funds a full-time program coordinator and personal-support worker for the residents	
	AGE-WELL (Aging Gracefully across Environments using Technology to Support Wellness, Engagement and Long Life)	Older adults who can benefit from technology to support independent living and improve their health, well- being and social participation	AGE-WELL research projects are organized into eight Workpackages, supported by four Crosscutting themes Many of the projects consist of community-based supports to help older adults remain in and connect to their communities	AGE-WELL is federally funded through the Networks of Centres of Excellence (NCE) program	The program is coordinated through the Networks of Centres of Excellence (NCE), which funds research projects to develop technologies to help older Canadians maintain their independence, health and quality of life	Twenty-five teams of researchers across Canada have been funded by AGE-WELL to conduct research on and evaluate core research projects supporting the development of innovative technologies to improve the lives of older adults, including to help support independent living
British Columbia	Home and Community Care: Home Care Supports	• Individuals eligible to receive home care supports include those who: 1) have newly been discharged from an acute care hospital; 2)	Many health and social services are offered to clients, including: caregiver services, personal care and home supports (e.g., grooming, toileting, dressing, mobility, laundry,	The Ministry of Health subsidizes a portion of the program, and services can be free of charge, offered at a reduced rate based on income, or	Home and Community Care office coordinators in each health authority within the province are responsible for arranging service delivery and can	 On 19 June 2019, a Home Support Review was published by the Office of the Seniors Advocate British Columbia The evaluation noted several recommendations

	necessitate care services to avoid hospital or long-term care admission; or 3) are living with a 'life-limiting' illness • It is estimated that over 43,000 individuals utilized these services, totaling over 8.7 million hours of home support services	and food preparation), rehabilitative care, and nursing care (e.g., disease management, post-operative care)	cost no more than \$300 per month	help guide older adults through the process	to help improve the accessibility of the program for older adults
Better at Home (community-based program)	Older adults residing in communities offering the Better at Home program; demographics for each community in the province are reported in the program's Community Profiles Through 2019/2022, there were nearly 12,000 active users and approximately	Non-medical supports are offered to eligible individuals, including housekeeping, social visits, seasonal house care (e.g., lawn and snow removal), groceries, and transportation	 The Ministry of Health funds the Better at Home program, and enables United Way British Columbia to operate the program; additional funding may come from donations and funds raised by not-for-profit organizations Program fees are charged to older adults based on their annual income (i.e., low- 	Service delivery is undertaken by volunteers, contractors, and staff members of local not-for-profit organizations, while program management is overseen by United Way British Columbia Healthy Aging	 Older adults who participate in the program are involved in the evaluation of the program An evaluation of the program revealed that 90% of older adults were content with the program's features, and also found that a majority of users reported increased feelings of safety, connectedness, and independence

	192,000 services delivered through this program		income seniors may be offered free services, while others may have to pay a fee, which is reinvested into the program to expand its care services for the community) • Funding allocation for each community is based on community characteristics, including the number of older adults in the region and their income		
• Choose to Move	This program is intended for individuals aged 65 years and older who are not regularly active	• In conjunction with a certified fitness instructor or kinesiologist, an action plan is developed to help increase the physical activity of the older adults; additional supports may include monthly meetings, consultations, and check-ins)	This program is managed through a partnership between the British Columbia Recreation and Parks Association and the YMCA	Based on their ability to adapt and deliver a sustainable physical-activity program, delivery partner organizations were identified and selected	An evaluation of the program revealed many positive impacts on physical activity, mobility, and social connectedness among older adults participating in the program

Alberta	Age-Friendly Alberta Affiliates include Age-Friendly Edmonton and Age-Friendly Calgary	Any seniors living in an age-friendly community	Services provided for an age-friendly community are determined based on an age-friendly assessment	• The Age-friendly Alberta Recognition Award grants successful age- friendly communities an award of \$1,000 to support celebration of the community's success, as well as entry into the WHO Global Network of Age- Friendly Cities through PHAC's affiliation	 The Alberta Government developed a guide for local action to build age-friendly communities that includes: 1) establishing an Age-friendly Committee; 2) having a resolution passed by local government; 3) conducting an age-friendly assessment of the community; and 4) developing and implementing an action plan • Age-friendly Alberta communities may include features such as fully accessible public buildings, maintained and well-lit sidewalks, clean and accessible public toilets, and integrated housing that accommodates the changing 	None identified
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• <u>Dementia</u> Friendly Alberta	Persons with dementia in	Initiatives largely consist of	• Funding and support to	needs of older residents • Government of Alberta advisors are available to provide guidance and assistance in identifying and forming strategic partnerships for mobilizing agefriendly community action • While the guide provides advice	None identified
Friendly Alberta	Alberta, their caregivers, and communities	education, community capacity building, and social programs to support the care- related and social needs of persons living with dementia in the community Some of the specific initiatives that were implemented as part of the pilot project included PowerPoint and e-learning presentations to communities about dementia,	develop the Guide for Developing Dementia Friendly Communities in Alberta was provided by the Government of Alberta (Seniors and Housing), Alberta Health Services, and Alberta Innovates	provides advice for assessing financial resources, community stakeholders involved in the initiatives are responsible for securing funding (e.g., through fundraising, donations or applying to relevant grants which are not directly administered by Dementia Friendly Alberta)	

• Seniors' Centre Without Walls • Alberta Aids to	Adults 55 years and older living anywhere in Alberta Alberta	dementia awareness training for local organizations, schools, and first responders, intergenerational programs and conversation cafes to minimize loneliness and social isolation of those affected by dementia, and distributing "dementia-friendly" checklists • Free, phone-based services that provide interactive information sessions, recreational activities, and friendly conversations • New topics and programs are added regularly • Basic medical	 Seniors' Centre Without Walls is sponsored by the Edmonton Southside Primary Network Phone services for the program are free of charge to callers AADL is a cost- 	Seniors' Centre Without Walls is sponsored by the Edmonton Southside Primary Network, which provides a toll- free number to call and inquire about the program and its services To be eligible for	Edmonton Southside Primary Care Network has a Seniors' Centre Without Walls Toolkit that provides a step-by- step guide for establishing, running, and evaluating telephone-based programming for seniors None identified
Daily Living (AADL)	residents that require assistance because of a	equipment and supplies are provided for eligible program	share program in which Albertans pay 25% of the benefit cost up to	AADL, a <u>clinical</u> <u>assessment must</u> <u>be conducted by a</u> <u>health</u>	

	chronic illness, long-term disability, or terminal illness (six months or longer)	participants through an approved AADL vendor	a maximum of \$500 per individual or per family annually • Albertans receiving income assistance and low-income Albertans do not pay the cost-sharing portion	professional to determine the equipment and supplies that can be provided through the AADL program • Medical equipment and supplies must be bought from an approved AADL vendor	
Seniors Home Supports Program	Seniors in the city of Edmonton	 The Seniors Home Supports program is a referral service for Edmonton seniors to access screened service providers Six seniors' organizations in six districts of the city of Edmonton coordinate programs and services for seniors, including yard help, snow removal, housekeeping, and personal-care services 	 Seniors that access the referral service cover the cost of services through direct contact and agreement with the service provider Businesses can register with the Seniors Home Supports Program as a referral service at no administrative cost 	 The seniors' organizations that run the program recruit and screen service providers before referring them to seniors A minimum of three referrals are provided for each service (if available) Seniors are responsible for contacting the service provider and discussing costs and service needs The district organization follows up with seniors to check if they contacted 	• To support evaluations of Seniors Home Supports Programs, organizations in the six districts keep track of basic program usage information

					and used one of their referrals	
Saskatchewan	Connected Care Strategy	• Saskatchewan's Connected Strategy aims to help support those living in the community by preventing hospital admissions, long-term care admissions, and minimize time spent in hospital	Community-based teams work collaboratively to help manage patients' care in the community and ensure care transitions between hospital and community settings are as safe and seamless as possible	The initiative is funded by the Ministry of Health as part of broader efforts to improve primary-care supports	The initiative is delivered by community-based care teams and overseen by the Health Quality Council and Ministry of Health	None identified
Manitoba	Active Aging in Manitoba	Older Manitobans living in the community	• The initiative aims to provide programs such as exercise classes and walking programs, and provide education through volunteer peer leaders to promote health, well-being, and social integration	The initiative is part of a broader network called Aging Well Together, which is funded by the Government of Canada's New Horizons for Seniors Program	Active Aging in Manitoba, a non- profit, provides training and oversight for volunteer peer leaders, who implement initiatives across Manitoban communities	None identified
Ontario	• Find Your Way	• For families, caretakers, and seniors with dementia	Educate the community about how to respond appropriately and effectively to dementia patients who may wander off or get lost	• Funded by the Government of Ontario	Information provision via website that includes technological support and safety registries	The program is run and monitored by the Alzheimer's Society, which may make changes as necessary

Community & Home Assistance to Seniors (CHATS)	 Seniors (65 years and older) Seniors (65 years and older) 	OASIS promotes social events, better nutrition (reducing malnutrition from loneliness), and physical activity CHATS provides a central website where seniors can access a range of supports to help age in place	Funded by the Canadian Institute of Health Research, Centre for Aging + Brain Health Innovation, Ministry for Seniors and Accessibility, and Ministry of Health and Ministry of Long-term Care CHATS is a charitable foundation accepting donations from citizens, and is funded by the Central Local Health Integration Network, Ontario ministries of Health and Long-Term Care, and the United Way of Toronto & York Region	OASIS uses existing resources and facilities within each city (apartment complexes or homes where there is a notable population or seniors) CHATS provides a variety of services ranging from community-based, in-home services, homesafety services, caregivers support, transportation services, and interpretation services	OASIS includes a research team that provides the program with updated research and improvements for its services Partnering universities include McMaster University, Queens University, and the Western University No specific information on monitoring and evaluation
Age-friendly communities	• <u>Seniors</u> (65 years and older)	The Ontario Government is looking to integrate the eight domains identified by the World Health Organization as	 The initiative is funded by the Ontario Government In 2017 it pledged to provide \$7 million over three years to support 	Community organizations and other stakeholders are responsible for applying for grants and carrying out planning and	 No specific information on monitoring and evaluation Programs are run and organized by organizations and municipalities,

	ones that affect individual wellbeing and independence in the community across three overarching domains: physical, social and personal well-being • In the physical, emphasis is placed on improving outdoor spaces, public buildings and transportation to be more accessible, and housing to be more affordable • On the social level, increasing respect and social inclusion in the community to encourage social participation, and civic engagement to aid in efforts • Lastly, on the personal wellbeing level, increasing access to and	age-friendly communities	program activities supporting age-friendly communities	therefore, monitoring is done at the organizational level
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Québec	Program of Research to Integrate the Services for the Maintenance of Autonomy (PRISMA)	• Seniors with chronic conditions living in the three areas of the Estrie region of Québec: Sherbrooke, Granit and Coaticook	information provision for programs that support mental and physical health • Services provided through the project ranged from in-home nursing, personal care, home support, day centres, provision of meals, equipment, supplies, and domestic care	• Funding for the project comes from the Ministry of Health and Social Services, health and social services agencies in the Estrie region, and Université de Sherbrooke's Geriatrics Institute	 A case manager in collaboration with a multidisciplinary team of providers is assigned to a client to develop an individualized service plan based on an assessment tool A management plan is developed for each provider Case managers are assigned 45 to 60 clients and 	To monitor clients' situations, periodic re-assessments are conducted by case managers Data from computerized client charts are available for research studies to assist in monitoring program operational activities Evaluation of the
					responsible for referring clients to services and making adjustments to the client service plan	project followed clients and their principal caregivers in the three areas of the Estrie region (Sherbrooke, Granit, and Coaticook) and three comparison areas for four years • The evaluation indicated that the PRISMA model produced significant

	Staying in Your Home: Help for Seniors and their Caregivers	• Seniors living independently at home and in their communities	Provides services, including home-care support services, Meals on Wheels, and financial assistance for domestic help services that reduces the hourly rate charged for home services (e.g., light and heavy	The financial assistance for domestic help services program is funded through grants by the Régie d'assurance maladie du Québec (RAMQ), the provincial health insurance board	None identified	reduction in the prevalence and incidence of functional decline of clients, reduced hospitalization, and saw a significant increase in client satisfaction and empowerment The PRISMA model was found to be cost-effective as it produced significant improvement to results at no additional cost None identified
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		housework, meal preparation, errands) by social economy businesses that are accredited by the Ministère de la Santé et des Services sociaux (Ministry of Health and Social Services)	Amount of variable financial assistance is determined based on the age, income, and family situation of the client		
• Residential Adaptation Assistance Program	People, including seniors, with a disability living at home	• Specialized equipment and home modifications that adapts the residence of the client with a disability (e.g., remodelling of a bathroom)	• Financial assistance may be up to \$16,000 per person based on health needs	The Société d'habitation du Québec delegated responsibilities to municipalities and regional county municipalities to manage the program Clients register for the program through their local community centres, in which an occupational therapist will produce a report based on the client's health needs A representative from the municipality or regional county municipality will	None identified

				visit the client's home and assess the situation and the recommendations produced by the occupational therapist	
Senior-Friendly Municipality approach	Any seniors living in an age- friendly community	Community support and home services provided for an age-friendly community are determined based on an age-friendly assessment and in collaboration with existing home service cooperatives (e.g., lawn mowing services)	Financial support is variable or fixed, depending on whether a municipality develops a seniors' policy and associated action plan on an individual basis or jointly with the regional county municipality	 The program is geared towards municipalities and regional county municipalities to develop a seniors' policy and associated action plan The Government of Québec published a guide to implementing the age-friendly municipality initiative in 2013 that includes: Ways to adapt municipal policies, services and structures; Adoption of a comprehensive and integrated approach; Promotion of older adults' 	None identified

	• Integrated Health and Social Service Centres (CISSS) – Support Program for the Autonomy of Seniors (SAPA)	Seniors covered by the West- Central Montreal CIUSSS	SAPA constitutes a collection of long-term care, home care, specialist, and respite services supporting older adults and their caregivers	Integrated health and social services centres (CISSS) and integrated university health and social services centres (CIUSSS) are funded by the the Ministère de la Santé et des Services sociaux (MSSS), which allocate financial, human and material resources fairly across the province and monitor their use	participation; and Promotion of collaborative partnerships and mobilization of communities SAPA professionals evaluate seniors' home situation, including the capacity and resources of those around them, to develop a service plan that may involve nurses, health and social-services auxiliary nurses, psychosocial workers, occupational therapists, physiotherapists, and nutritionists If necessary, nurses and/or psychosocial workers coordinate the care plans across providers and	None identified
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New					direct caregivers to respite services Telehomecare services are also available for chronic disease patients	
Brunswick	Nursing homes without walls	Seniors with loss of independence living in the community	Personal care and assistance with transportation, counselling services, and services to promote engagement in social activities at long-term care facilities and in the community	• In partnership with the federal government, this model was funded through the \$75-million Healthy Seniors Pilot Project in 2019	• Participating long-term care facilities (LTCs) hired 'seniors navigators' who reach out to people 60 and older to make home visits, provide personal support, connect them to social programs provided by the LTCs, and help them apply for federal and provincial services available to them	Results from studies conducted on the pilot phase of the program suggested that the program was acceptable to seniors and LTC administrators, helped meet the needs identified by seniors, and provided a costeffective approach to address those needs
	• Eimeg Tan Tleiaoltieg (We Are Home Where We Belong): Home for Life	Elsipogtog First Nation older adults living in the community	• This pilot project resulted in a 'Meals to Go' program and a long-term care education program called 'Eva's Vision' to better manage dementia and end-of-life care	The research and program development involved in this program was supported by the Healthy Seniors Pilot Project	A research team applied a Home for Life Assessment Tool to identify needs among older Elsipogtog residents, informing the development of the services	None identified

		Long-term goals for service development include culturally appropriate continuum of long-term care program model for First Nations Communities		described earlier and building strong community relationships	
One Stop Community Support Services for Aging at Home	Seniors wishing to continue living in their homes and community	This project aims to create a single organization through which seniors can get in touch with services available in their region and help develop services to address their unmet needs	The program was supported by the Healthy Seniors Pilot Project	The project operates through a one-stop shop to connect seniors to services supporting their needs and helping them stay living in their home for longer	None identified
• Connected Communities: Smart Home for Independence, Social Interaction, Safety and Comfort in Aging Individuals	Older adults living in the community and their caregivers who can benefit from technologies available to support their daily living and facilitate aging in place	• The project aims to improve the uptake of technology use to support aging in place by providing a program of six classes addressing concerns such as social isolation, aging at home, and supports for daily living	The program was supported by the Healthy Seniors Pilot Project	The program is delivered by an occupational therapist	None identified

	New Brunswick Dementia Friendly Initiative	Community-dwelling persons living with dementia	The initiative supports New Brunswick communities to better support people living with dementia through education and implementation of dementia friendly approaches in their local context	The initiative is funded through the Government of Canada's Dementia Community Investment, administered by the Public Health Agency of Canada	• The initiative is led by the Collaborative for Healthy Aging and Care, in partnership with the New Brunswick Association of Nursing Homes, the Alzheimer Society of New Brunswick, the New Brunswick Continuing Care Safety Association, and the Department of Social Development — Seniors Healthy Aging Secretariat	None identified
Nova Scotia	Age-friendly communities grant	Communities planning and implementing projects to improve the lives of older adults living at home	• The initiative funds the design and implementation of interventions and services supporting the social participation and inclusion of older adults, addressing social isolation and loneliness, developing community	• Grants of up to \$25,000 administered by the Nova Scotia Department of Seniors and Long-Term Care support the planning and projects streams	Grant applicants carry out program design and delivery	None identified

Prince Edward Island	• Seniors Independence Initiative	Seniors living independently at home Frail seniors	supports for persons with dementia, advancing health promotion and injury prevention, and supporting older adults' adoption of technology to help them stay socially connected and access virtual programming • A suite of services to financially support seniors in daily activities and living who are unable to complete the tasks independently, including home maintenance, housekeeping, snow removal, transportation, etc.	• Funded by the Province of Prince Edward Island and administered through the Department of Social Development and Housing	A Social Supports Coordinator identifies funded supports and works collaboratively with the senior to identify support needs and determine the appropriate funding to meet those needs within the benefit cap	None identified None identified
	Caring for Older Adults in the Community and at Home (COACH)	Frail seniors with in-home support for complex health needs	Five days a week home-care assistance and support with daily living and activities	Funded by the government of Prince Edward Island and administered through Health PEI	A specialized team of health-care professionals (i.e., Geriatric Program Nurse Practitioner, primary-care	None identified

Newfoundland	• Age-friendly Prince Edward Island	Older adults living in the community Older adults	• A planning guide to help communities become more age-friendly by improving outdoor spaces and buildings, transportation, housing, social participation, respect and social inclusion, civic participation, and community support and health services for older adults living in the community	None identified (no additional grants or financial support programs provided by the government of Prince Edward Island)	provider and a Home Care Coordinator) lead the program, conduct home assessments and work with three partner programs: Home Care, Primary Care, and the provincial Geriatric Program Community organizations and leaders use the guide to work towards building more age-friendly communities	None identified None identified
and Labrador	Friendly Newfoundland and Labrador Communities Program	living in the community	Community organizations, leaders and other stakeholders apply for funding via grants to	• Grants of up to \$10,000, or \$15,000 for those demonstrating collaboration across	by the government of Newfoundland and Labrador, and the projects are	- Ivone identified

			support age- friendly planning and project implementation	communities, are available for planning and projects streams	carried out by grant recipients and other community stakeholders	
	Provincial Home Support Program	Older adults living in the community	 Includes the provision of personal and behavioural supports, household management,, and respite to help maintain independence The Special Assistance Program also helps provide basic medical equipment and supplies to older adults living in the community 	Services are purchased privately or subsidized by the province to a maximum financial ceiling	Services are coordinated by Regional Health Authorities	None identified
Yukon	Community Day Program	• The program targets older adults living in the community with mild to moderate cognitive decline who require physical, social, psychological, emotional or recreational	• The program includes therapeutic group programming, activities in maintaining independence, reacreational activities, socialization and peer support, hairdressing, lunch, snacks and	The program is supported by the Government of Yukon and costs \$5 per day for participants The program is supported by the Government of Yukon and costs \$5 per day for participants	• The program is run in Whitehorse by service providers between 8:30 a.m. and 4:30 p.m. from Monday to Friday, excluding statutory holidays	None identified

		support as well as caregiver respite	beverages, supports with daily living activities such as bathing, and supports to caregivers such as through the Shine a Light on Dementia program which provides education and training			
Northwest Territories	Home and Community Care Services	Individuals who require nursing care and support for personal care and daily living activities living at home	• The services provided include home support such as for bathing and making meals, nursing care for wounds and health checks, assistance with medications, palliative care, loan of equipment such as bathroom supports or walkers, and respite care to support caregivers	The program is funded by Health and Social Services (HSS)	The program is administered through the Seniors and Continuing Care Services Department of Health and Social Services	None identified
Nunavut	Home and Continuing Care	• Seniors (aged 55+) with long-term illness or	Home-care services including homemaking	An <u>agreement</u> with the Government of	The <u>Single Entry</u> <u>Access</u> system places individuals	The main <u>outcome</u> <u>indicators</u> of the Home and

support daily live		regional waiting list until a place becomes available in a facility providing the needed level of care This program is delivered by the Government of Nunavut's Department of Health Family and friends are indicated by the government to be the first providers of care in the home, with government-provided services supplementing existing care The interRAI tool will be used to improve access and service delivery of home and continuing services by ensuring services are allocated to individuals based on their assessed
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REFERENCES

- 1. IPSOS. Nearly All Canadians 45+ Years Want to Age at Home, But Only 1 in 10 (12%) Say They Can Afford the Cost of a Personal Support Worker. 18 October 2022:[3 p.]. Available from: https://www.ipsos.com/en-ca/news-polls/Nearly-All-Canadians-45-Want-Age-Home-But-Only-1-in-10-Afford-Cost-PSW.
- 2. Statistics Canada. Unmet home care needs in Canada. 2018.
- 3. Chum K, Fitzhenry G, Robinson K, et al. Examining Community-Based Housing Models to Support Aging in Place: A Scoping Review. *Gerontologist* 2022; 62(3): e178-e192.
- 4. Mahmood A, Seetharaman K, Jenkins HT, Chaudhury H. Contextualizing Innovative Housing Models and Services Within the Age-Friendly Communities Framework. *Gerontologist* 2022; 62(1): 66-74.
- 5. Zhou W, Oyegoke AS, Sun M, Zhu H. Older Clients' Pathway through the Adaptation System for Independent Living in the UK. *International Journal of Environmental Research and Public Health* 2020;17(10).
- 6. Jolanki OH. Senior Housing as a Living Environment That Supports Well-Being in Old Age. *Frontiers in Public Health* 2020; 8: 589371.
- 7. Chu Y, Shen S. Adoption of Major Housing Adaptation Policy Innovation for Older Adults by Provincial Governments in China: The Case of Existing Multifamily Dwelling Elevator Retrofit Projects. *International Journal of Environmental Research and Public Health* 2022; 19(10).
- 8. DeLange Martinez P, Nakayama C, Young HM. Age-Friendly Cities During a Global Pandemic. *Journal of Gerontological Nursing* 2020; 46(12): 7-13.
- 9. Cochrane A, Furlong M, McGilloway S, Molloy DW, Stevenson M, Donnelly M. Time-limited home-care reablement services for maintaining and improving the functional independence of older adults. *Cochrane Database of Systematic Reviews* 2016(10).
- 10. Metzelthin SF, Zijlstra GA, van Rossum E, et al. 'Doing with ...' rather than 'doing for ...' older adults: rationale and content of the 'Stay Active at Home' programme. *Clinical Rehabilitation* 2017; 31(11): 1419-1430.
- 11. Stoop A, de Bruin SR, Wistow G, et al. Exploring improvement plans of fourteen European integrated care sites for older people with complex needs. *Health Policy* 2019; 123(12): 1135-1154.
- 12. Rapid Synthesis: Empowering caregivers to deliver home-based restorative care. Hamilton: McMaster Health Forum; 2019.
- 13. Vestjens L, Cramm JM, Nieboer AP. An integrated primary care approach for frail community-dwelling older persons: a step forward in improving the quality of care. *BMC Health Services Research* 2018;18(1): 28.
- 14. Castle N, Resnick N. Service-Enriched Housing: The Staying at Home Program. *Journal of Applied Gerontology* 2016;35(8): 857-77.
- 15. Harvey D, Foster M, Strivens E, Quigley R. Improving care coordination for community-dwelling older Australians: a longitudinal qualitative study. *Australian Health Review* 2017; 41(2): 144-150.
- 16. Bernabei R, Landi F, Calvani R, et al. Multicomponent intervention to prevent mobility disability in frail older adults: randomised controlled trial (SPRINTT project). *BMJ* 2022; 377: e068788.
- 17. Bernoth M, Burmeister OK, Morrison M, Islam MZ, Onslow F, Cleary M. The Impact of a Participatory Care Model on Work Satisfaction of Care Workers and the Functionality, Connectedness, and Mental Health of Community-Dwelling Older People. *Issues in Mental Health Nursing* 2016; 37(6): 429-35.

- 18. Marcus-Varwijk AE, Peters LL, Visscher TLS, Smits CHM, Ranchor AV, Slaets JPJ. Impact of a Nurse-Led Health Promotion Intervention in an Aging Population: Results From a Quasi-Experimental Study on the "Community Health Consultation Offices for Seniors". *Journal of Aging and Health* 2020; 32(1): 83-94.
- 19. Restrepo A, Davitt C, Thompson S. House calls: is there an APN in the house? *Journal of the American Academy of Nurse Practitioners* 2001; 13(12): 560-4.
- 20. Zimbroff RM, Ornstein KA, Sheehan OC. Home-based primary care: A systematic review of the literature, 2010-2020. *Journal of the American Geriatrics Society* 2021; 69(10): 2963-2972.
- 21. Gomes B, Calanzani N, Curiale V, McCrone P, Higginson IJ, de Brito M. Effectiveness and cost-effectiveness of home palliative care services for adults with advanced illness and their caregivers. *Cochrane Database of Systematic Reviews* 2013(6).
- 22. Shepperd S, Gonçalves-Bradley DC, Straus SE, Wee B. Hospital at home: home-based end-of-life care. *Cochrane Database of Systematic Reviews* 2021(3).
- 23. Husebo BS, Allore H, Achterberg W, et al. LIVE@Home.Path-innovating the clinical pathway for home-dwelling people with dementia and their caregivers: study protocol for a mixed-method, stepped-wedge, randomized controlled trial. *Trials* 2020; 21(1): 510.
- 24. Aoun S, O'Connor M, Skett K, Deas K, Smith J. Do models of care designed for terminally ill 'home alone' people improve their end-of-life experience? A patient perspective. *Health and Social Care in the Community* 2012; 20(6): 599-606.
- 25. Brumley R, Enguidanos S, Jamison P, et al. Increased satisfaction with care and lower costs: results of a randomized trial of in-home palliative care. *Journal of the American Geriatrics Society* 2007; 55(7): 993-1000.
- 26. Montgomery P, Mayo-Wilson E, Dennis J. Personal assistance for older adults (65+) without dementia. *Cochrane Database of Systematic Reviews* 2008(1): Cd006855.
- 27. Mazurek J, Szcześniak D, Lion KM, Dröes RM, Karczewski M, Rymaszewska J. Does the Meeting Centres Support Programme reduce unmet care needs of community-dwelling older people with dementia? A controlled, 6-month follow-up Polish study. *Clinical Interventons in Aging* 2019; 14: 113-122.
- 28. Molzahn AE, Gallagher E, McNulty V. Quality of life associated with adult day centers. *Journal of Gerontological Nursing* 2009; 35(8): 37-46.
- 29. Organizing a Care System for Older Adults in Ontario. Hamilton: McMaster Health Forum; 2011.
- 30. Stokke R. The Personal Emergency Response System as a Technology Innovation in Primary Health Care Services: An Integrative Review. *Journal of Medical Internet Research* 2016; 18(7): e187.
- 31. Airola E. Learning and Use of eHealth Among Older Adults Living at Home in Rural and Nonrural Settings: Systematic Review. *Journal of Medical Internet Research* 2021; 23(12): e23804.
- 32. Liu L, Stroulia E, Nikolaidis I, Miguel-Cruz A, Rios Rincon A. Smart homes and home health monitoring technologies for older adults: A systematic review. *International Journal of Medical Informatics* 2016; 91: 44-59.
- 33. Matthew-Maich N, Harris L, Ploeg J, et al. Designing, Implementing, and Evaluating Mobile Health Technologies for Managing Chronic Conditions in Older Adults: A Scoping Review. *JMIR Mhealth Uhealth* 2016; 4(2): e29.
- 34. Anghel I, Cioara T, Moldovan D, et al. Smart Environments and Social Robots for Age-Friendly Integrated Care Services. *International Journal of Environmental Research and Public Health* 2020; 17(11).
- 35. Mort M, Roberts C, Callén B. Ageing with telecare: care or coercion in austerity? *Sociology of Health and Illness* 2013; 35(6): 799-812.

- 36. Christiansen L, Lindberg C, Sanmartin Berglund J, Anderberg P, Skär L. Using Mobile Health and the Impact on Health-Related Quality of Life: Perceptions of Older Adults with Cognitive Impairment. *International Journal of Environmental Research and Public Health* 2020; 17(8).
- 37. Gordon S, Telford-Sharp F, Crowe W, Champion S. Effectiveness of a co-designed technology package on perceptions of safety in community-dwelling older adults. *Australasian Journal on Ageing* 2022; 41(3): e257-e265.

APPENDICES

The following tables provide detailed information about the systematic reviews and primary studies identified in the rapid synthesis. The ensuing information was extracted from the following sources:

- systematic reviews the focus of the review, key findings, last year the literature was searched, and the proportion of studies conducted in Canada; and
- primary studies the focus of the study, methods used, study sample, jurisdiction studied, key features of the intervention and the study findings (based on the outcomes reported in the study).

For the appendix table providing details about the systematic reviews, the fourth column presents a rating of the overall quality of each review. The quality of each review has been assessed using AMSTAR (A Measurement Tool to Assess Reviews), which rates overall quality on a scale of 0 to 11, where 11/11 represents a review of the highest quality. It is important to note that the AMSTAR tool was developed to assess reviews focused on clinical interventions, so not all criteria apply to systematic reviews pertaining to delivery, financial or governance arrangements within health systems. Where the denominator is not 11, an aspect of the tool was considered not relevant by the raters. In comparing ratings, it is therefore important to keep both parts of the score (i.e., the numerator and denominator) in mind. For example, a review that scores 8/8 is generally of comparable quality to a review scoring 11/11; both ratings are considered "high scores." A high score signals that readers of the review can have a high level of confidence in its findings. A low score, on the other hand, does not mean that the review should be discarded, merely that less confidence can be placed in its findings and that the review needs to be examined closely to identify its limitations. (Lewin S, Oxman AD, Lavis JN, Fretheim A. SUPPORT Tools for evidence-informed health Policymaking (STP): 8. Deciding how much confidence to place in a systematic review. *Health Research Policy and Systems* 2009; 7 (Suppl1):S8).

All of the information provided in the appendix tables was taken into account by the authors in describing the findings in the rapid synthesis.

Appendix 1: Summary of findings from systematic reviews and other types of reviews about community-based models to enable older adults to live independently

Type of review	Focus of systematic review	Key findings	Year of last search/ publication date	AMSTAR (quality) rating	Proportion of studies that were conducted in Canada
Systematic reviews	Learning and Use of eHealth Among Older Adults Living at Home in Rural and Nonrural Settings: Systematic Review	This study explored eHealth use of adults 60 years and older who live at home, particularly in rural and remote areas. Included studies addressed a range of eHealth supports with the most common being apps, monitoring platforms, and web-based platforms. Support for enabling eHealth use was mainly comprised of adults' own digital competencies which were shared and expanded through their social networks. Training sessions were also provided by health professionals or technical staff. The results showed that the most reported barrier related to older adults learning to use eHealth technologies were health-related difficulties, such as cognitive impairment or impaired hearing. The most reported enabler related to learning was providing support, including social network support, such as face-to-face support, and non-social support, such as written or video instructions. The authors concluded that eHealth technology is needed for rural and remote areas to facilitate access and reduce logistical barriers to healthcare services.	Published December 2021	4/9	2/31
	Hospital at home: home-based end-of-life care	The review defined end-of-life care at home as "the provision of a service that provides active treatment for continuous periods of time by healthcare professionals in the patient's home for patients who would otherwise require hospital or hospice inpatient end-of-life care." The review found that end-of-life care that is home-based increased the likelihood of dying at home when compared with usual care, and that home-based end-of-life care may improve patient satisfaction at one-month follow-up. The effect on the control of symptoms and patient outcomes as well as on caregivers, staff, and health-service costs was found to be uncertain.	Literature searched March 2020	10/11	0/6
	Home-based primary care: A systematic review of the literature, 2010-2020	The review found five overarching themes in terms of access and use of this model: provision of home-based primary care, the composition	Literature last searched January 2020	4/11	Not reported

Type of review	Focus of systematic review	Key findings	Year of last search/ publication date	AMSTAR (quality) rating	Proportion of studies that were conducted in Canada
		of care teams, outcomes, role of telehealth, and emergency preparedness efforts.			
		The review found that while home-based primary care in the U.S. provides access to high-quality routine and urgent primary care, this model does not reach many homebound patients, especially for specialized care. The review also found that telehealth in combination with the use of community health navigators and in-home nursing may be innovative solutions to expand care and access to home-based primary care.			
	The Personal Emergency Response System as a Technology Innovation in Primary Health Care Services: An Integrative Review	PERS consists of an alarm, which may be integrated with other devices (e.g., a blood pressure monitor), and which triggers a call to an emergency contact or public or private call centre. Many of the included studies (total of 33 studies) indicated the usefulness of an alarm system for fragile older adults, although the authors note that some studies indicate that the system is not suitable for everyone.	Published July 2016	3/9	6/33
		The most stated reason for getting a PERS was the possibility of receiving urgent help when needed, including being helpful for those living in isolation, those with mobility issues, and concern for personal safety. Most of the studies indicated that many end users reported being satisfied with the PERS overall. Resistance and non-use of PERS was shown to be due to factors such as the change in caring practices and the way users experience the technology as changing their lives and homes.			
	Smart homes and home health monitoring technologies for older adults: A systematic review	This systematic review aimed to determine the technology readiness among older adults and evidence for "smart homes" that use healthmonitoring technologies. Smart homes are equipped with automation of devices or appliances, and/or devices for remote monitoring of the occupant's health. The level of technology readiness among older adults was low and there is limited evidence that smart homes and home health monitoring help address disability prediction and health-related quality of life or fall prevention.	Published April 2016	6/10	3/38
		Home health technology was found to have some benefits for older adults with daily living, cognitive decline, mental health, and heart conditions.			

Type of review	Focus of systematic review	Key findings	Year of last search/ publication date	AMSTAR (quality) rating	Proportion of studies that were conducted in Canada
	Time-limited home-care reablement services for maintaining and improving the functional independence of older adults	The reablement (or restorative) approach provides intensive (i.e., multiple visits), time-limited (typically six to 12 weeks), multidisciplinary, goal-directed, and person-centred home-care services by a team of health and social-care professionals. The focus of this review was the adult population 65 years and older. Outcome measures from the study included: Functional status: reablement may be slightly more effective than usual care in improving function of older adults at nine to 12 months, according to very low-quality evidence Adverse events: reablement may make little or no difference to mortality after the first 12 months or to rates of unplanned hospital admission at 24 months Due to the limited and very low-quality evidence, the effectiveness of	Literature last searched June 2015	11/11	0/2
	Effectiveness and cost-effectiveness of home palliative-care services for adults with advanced illness and their caregivers	reablement services could not be adopted nor refuted. More evidence is needed to assess its effectiveness across different systems. Included studies addressed: team-based care for people no longer responding to curative or maintenance treatment, or their caregivers; provided by providers who either have specialized training or a primary focus on palliative care; offering holistic physical and psychosocial interventions; and aimed at enabling patients to stay at home. The results of the study showed increased odds of dying at home and significantly beneficial effects of home palliative-care services compared to usual care on reducing symptom burden for patients with cancer, but had no effect on caregiver grief. The evidence on cost-effectiveness of home palliative care was inconclusive.	Literature last searched Nov 2012	10/11	1/23
	Personal assistance for older adults (65+) without dementia	Personal assistance was defined as "individualised support for people living in the community by a paid assistant other than a healthcare professional for at least 20 hours per week." Older adults are assisted with tasks of daily living. In the four included studies, personal assistance was compared with 1) usual care, 2) nursing homes, and 3) 'cluster care'. In general, personal assistance was preferred over other types of services. The review also	Literature last searched January 2005	8/10	0/4

Type of review	Focus of systematic review	Key findings	Year of last search/ publication date	AMSTAR (quality) rating	Proportion of studies that were conducted in Canada
		found that paid personal assistance most likely substitutes for informal care, but may cost governments more than alternative care options.			
Rapid reviews	Empowering Caregivers to Deliver Home-based Restorative Care	Caregivers need information about health conditions, how to provide care and navigate health services and financial supports, how to communicate with health providers and care recipients, and how to use relevant technology. Programs that train health professionals to engage caregivers in restorative care should be flexible and driven by pre-training learning-needs assessment, draw on multiple data sources such as literature and engagement of persons with lived experience, and include a clear statement of principles and goals of restorative care. These programs should also use small groups, and a combination of digital and inperson approaches, and they may involve didactic, interactive, experiential, "just-in-time," and mentorship-based approaches. Specific considerations for training unregulated health professionals to engage caregivers in restorative care include: • shifting from task-focused work to self-management support • engaging regulated health professionals in training that excludes managers in training, due to power imbalances	Literature last searched April 2019	4/9	Not applicable
Scoping reviews	Designing, Implementing, and Evaluating Mobile Health Technologies for Managing Chronic Conditions in Older Adults: A Scoping Review	 using strengths-based and person- and family-centred approaches mHealth encompassed health interventions where mobile devices (e.g., phones, PDAs) are used to deliver healthcare. Out of the 42 included studies, 17 focused on older adults with single chronic conditions, including diabetes, stroke, heart condition, chronic obstructive pulmonary disease (COPD), and dementia or cognitive impairment. Evaluation methods of mHealth solutions varied across the literature, including quantitative and qualitative methods and tools. Standardized tools were utilized for targeted outcomes of interest, often tailored to the chronic condition or population in question. 	Literature last searched March 2015	4/9	5/42

Type of review	Focus of systematic review			AMSTAR (quality) rating	Proportion of studies that were conducted in Canada
		A focus on user-centred design and interdisciplinary/collaborative team approaches are two themes that emerged pertaining to the practices and considerations in designing mHealth solutions. Successful implementation of mHealth solutions should consider feasibility in relation to organizational and system readiness, acceptability of the mHealth solution, and usability in relation to the different end users.			
	Examining Community-Based Housing Models to Support Aging in Place: A Scoping Review	The housing models identified across the included studies consisted of villages, naturally occurring retirement communities, congregate housing and cohousing, sheltered housing, and continuing care retirement communities. Four key themes emerged from this scoping review on community-based housing models: social relations, health and well-being, sense of self and autonomy, and activity participation. The authors concluded that built environments should consider ways to increase social relations through strategies such as access to the greater community, proximity of living units, shared spaces, social activities, and support from on-site staff who facilitate frequent resident interaction and increased socialization. For health and well-being, housing models should include values of safety, inclusivity, and socialization (e.g., use of activities and program offerings, cost, and availability of comprehensive care). For sense of self and autonomy, housing models should be designed for the needs of older adults and support a positive sense of self, privacy, security, and confidence in living independently. For activity participation, the authors recommended proximity to amenities and neighbours, and communal programming that increases activity participation. Broad considerations applicable to all models are providing for fostering of meaningful social relations both within living spaces and the broader community, ensuring the availability of inclusive social activities and communal programming, and improving the availability of on-site staff to support residents' access to relevant social, leisure, and health	Published March 2022	5/9	Not reported
	Social Isolation in Chinese Older Adults: Scoping Review for Age-Friendly Community Planning	services. Based on the WHO's Age-Friendly Community Dimension framework, studies identified issues related to: 1) social participation; 2) housing; 3) community support and health services; 4) community and information; 5) outdoor spaces and public buildings; 6) respect	Published April 2017	5/9	10/17

Type of review	Focus of systematic review	Key findings	Year of last search/ publication date	AMSTAR (quality) rating	Proportion of studies that were conducted in Canada
		and social inclusion; 7) civic participation and employment; and 8) transportation. The results of this review indicate that social isolation and loneliness is a concern in this population in Canada, and that front-line professionals in health and social services play an important role in the elderly's social networks. Policy recommendations should focus on achieving long-term sustainability and the ability to address local social issues, such as social isolation and loneliness, and this integrative approach can also be used to promote collaboration across multiple policy domains that may have an impact on age-friendly community planning and interventions. There is a need for more research on the applicability of the age-friendly approach in tackling loneliness and social isolation in older adults, and exploring possible relationships between social isolation and loneliness and age-friendly initiatives.			

Appendix 2: Summary of findings from primary studies about community-based models to enable older adults to live independently

Focus of study	Study characteristics	Sample description	Key features of the intervention(s)	Key findings
Senior Housing as a	Publication date: 2021	Interviews were	This qualitative study describes a	Residents highlighted the importance of having a choice
Living		conducted with 36	communal senior housing complex in	in terms of relocation and everyday life in the complex as
Environment That	Jurisdiction studied: Finland	residents of a Finnish	a town in Finland that was designed	well as being able to prepare for the future. They also felt
Supports Well-		communal senior	with low-maintenance apartments and	that the complex was a safe and comfortable
Being in Old Age	Methods used: Qualitative	housing project from	accessible common spaces, amenities,	environment that is supportive for older people.
		November 2018 to	green spaces, and public	
		February 2019.	transportation. The complex has a	The residents had mixed responses on what the seniors
		Residents of the	community coordinator working part-	communal housing complex represented, with some
		complex must be 55	time to support residents of the	saying that it was first and foremost a place that provided
		years or older.	housing project.	opportunities for socializing while others said that the
				most important benefit of the complex was maintenance-
			Interviews for this study were focused	free apartments and outdoor areas.
			on identifying residents' perceptions of	
			their communal environment.	

Focus of study	Study characteristics	Sample description	Key features of the intervention(s)	Key findings
Multicomponent intervention to prevent mobility disability in frail older adults: randomized controlled trial (SPRINTT project)	Publication date: 2022 Jurisdiction studied: 11 European countries Methods used: Randomized controlled trial	1,519 community-dwelling adults aged 70 or older with physical frailty and sarcopenia	Participants were randomized to a multicomponent intervention or to receive education on healthy aging. Participants in the multicomponent intervention group performed moderate intensity physical activity twice weekly at a centre, up to four times weekly at home, and also received personalized nutritional counselling.	This study found a reduction in the risk of incident mobility disability during 36 months of follow-up for participants receiving the multicomponent intervention, compared with an intervention comprising lifestyle education. The study also found that participants who indicated to be frail at baseline and were assigned to the multicomponent intervention showed greater improvements in physical performance than participants assigned to lifestyle education. If participants indicated to have a low degree of frailty at baseline, the multicomponent intervention did not affect the risk of developing mobility disability, had marginal effects on physical performance, and, in women, attenuated the loss of appendicular lean mass. The multicomponent intervention showed no effect on mortality or other major outcomes, such as risk of severe illnesses and admission to hospital. Although regular physical activity might be beneficial for preventing falls and fall-related fractures in older people, the rates of falls were greater in participants with frailty in the multicomponent intervention group than in participants in the lifestyle education group. Further research is needed to identify the optimal characteristics of physical activity programs that allow the prevention of disability and falls in vulnerable older adults.
Contextualizing Innovative Housing Models and Services Within the Age-Friendly Communities Framework	Publication date: 2022 Jurisdiction studied: n/a Methods used: Literature review	N/A	In this study, three models of housing and services for older adults are compared and linked to domains of the age-friendly communities (AFCs) framework. Cohousing consists of private or rental units for each resident and shared communal spaces that can be intergenerational or exclusively for seniors. Villages are developed, funded and governed by older residents within a neighbourhood and include services like transportation, home maintenance,	Three models of housing and services for older adults were linked to domains of the age-friendly communities (AFCs) framework: 1) services, supports, and information; 2) respect, inclusion, and diversity; 3) affordability; and 4) social and civic participation. The review suggested that all three models positively influence physical and mental health, lowers the demand for formal care, and enhances residents' knowledge of health promotion and disease prevention. While some cohousing projects and NORC-SSPs were found to be inclusive of older adults from different

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			and healthcare that are provided by paid staff and/or volunteers. NORC-SSPs are models of supportive service programs that are formed in neighbourhoods with a majority of older adults that integrate community-based health, social recreation, and allied health services.	ethnic backgrounds and lower socio-economic status, villages were not found to facilitate the inclusion of residents with diverse backgrounds. Designing flexible volunteer positions can improve participation in NORC-SSPs, and having group discussions and sharing activities in cohousing can help to promote spontaneous social interaction.
				In terms of affordability, the savings from self-developing cohousing projects helps to offset the costs of building the common areas and augmenting energy efficiency of the buildings used. NORC-SSPs run largely on government funding and grants, which allows them to be staffed by support workers, but limits long-term funding security. Villages are paid for primarily by membership dues, which has led to challenges in securing funding and prompted expansions of membership recruitment.
				The study highlighted that wide-scale investment in and implementation of these models can help to expand the range of options available to older adults for housing to age in place.
Smart Environments and Social Robots for Age-Friendly Integrated Care Services	Publication date: 2020 Jurisdiction studied: N/A Methods used: Literature review	N/A	This study surveyed smart environments, robot assistive technologies, and machine learning that can offer support for older adults living independently and provide age- friendly care services. Two examples of integrated care services that use assistive technologies for management of polypharmacy and	The authors hypothesize that care functionalities such as monitoring daily activities, behavioural monitoring, medical reminders, and virtual coaching can improve activity, safety, comfort, and social functionality. The authors also claim that these functionalities can lead to delayed admissions into care institutions and reduced use of professionalized care services, as well as lower the burden of healthcare services and facilities.
			social and cognitive activity in older adults were presented. The polypharmacy management service combined objective monitoring to assess medication use and to better inform the interventions prescribed to	The study also found that specific challenges need to be addressed when it comes to technological development and integration with care models and for acceptance by older adults. Older adults prefer personalized target support as opposed to general-purpose information, and factors correlated with the acceptance of technology included costs, usability and privacy implications.

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			the patient and the role of a caregiver in supporting the older adult. Social assistive robot-based systems can be used to stimulate the physical, social, and cognitive conditions of older adults, and can be personalized to make the user experience more social and enjoyable for older adults.	Additional research is needed on matching the available technologies to the specific needs of older adults in their living contexts in order to increase their use among this population.
Service-Enriched Housing: The Staying at Home Program	Publication date: 2014 Jurisdiction studied: U.S. Methods used: Survey	Residents of 11 high- rise buildings were surveyed, with seven buildings receiving the intervention and four not	The Staying at Home (SAH) program was implemented in subsidized housing for older adults, and consisted of care coordination, medication management, and advance planning services provided by an intervention team of healthcare professionals who maintained a healthcare diary in collaboration with participants. A total of 736 program participants and 399 control-group participants completed surveys. Surveys were conducted every six months from December 2008 to June 2011.	The study found that positive health outcomes and cost- savings were achieved by SAH participants when compared to non-participants. SAH participants were also found to have fewer nursing home transfers and inpatient admissions.
Impact of a Nurse- Led Health Promotion Intervention in an Aging Population: Results From a Quasi-Experimental Study on the "Community Health Consultation Offices for Seniors"	Date published: October 2018 Jurisdiction studied: Netherlands Methods used: Quasi-experimental	403 adults over the age of 60 who were frail, overweight, or smokers received the intervention; 984 seniors received care as usual	Eligible participants were invited for a consultation with a nurse, taking place at an office in the community or in their home if needed. This consultation included a comprehensive assessment, preventive advice, and referral to other healthcare providers if appropriate. An optional appointment three months later was also provided, including following up on and reassessing goals. A final follow-up took place a year after the first appointment. Nurses received training in motivational interviewing, as well as training in the intervention and a one-hour consultation with a dietitian.	The intervention group was similar to the care-as-usual group in terms of gender and physical morbidity, but differed in other respects: the intervention group was younger and frailer. The increase in participants with self-rated good health did not significantly differ between groups. Changes to health-related behaviours and prevalence of overweight, hypertension and hyperglycemia within the intervention group were not statistically significant. The intervention group had higher odds than the care-as-usual group of transition to a worse health profile. The authors suggested that these findings may reflect difficulties in implementing motivational interviewing, inadequate intensity of intervention, or no added benefit over standard primary care.

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LIVE@Home.Path -innovating the clinical pathway for home-dwelling people with dementia and their caregivers: study protocol for a mixed-method, stepped-wedge, randomized controlled trial	Date published: June 2020 Jurisdiction studied: Norway Methods used: Protocol for a stepped-wedge randomized controlled trial; also reports on qualitative feasibility study	The study intends to recruit 315 dyads of people with dementia and informal caregivers. A feasibility study was conducted in 2018-19 involving 16 dyads in Bergen (one of which dropped out).	LIVE@Home.Path includes a sixmonth intervention. A coordinator will make two home visits in that time (plus additional visits as needed) and monthly phone calls. The intervention includes four components: • Learning: the coordinator connects participants to local courses about dementia and coping skills • Innovation: coordinator provides information about resources to support effective use of technological supports such as smart homes • Volunteer: volunteers are matched with participating dyads • Empowerment: coordinator facilitates the initiation of end-of-life advance care planning and medication review with general practitioner	A feasibility study found that coordinators helped caregivers to find, coordinate and make use of support, and provided emotional support. "Empowerment" (i.e., initiation of advance care planning and medication review) was found to be difficult to achieve. The primary outcomes of the larger study will be resource utilization and caregiver stress. Secondary outcomes will include quality of life, functional status, and symptom measures (e.g., depression, agitation). The full study has yet to be conducted.
Imagazina aga	Data tuhlishad May 2017	Destining at a included 10	The study includes implementation supports, including a kick-off workshop six months before the intervention, a two-day implementation training for coordinators, an evaluation workshop for coordinators at the midway point of the intervention, and biweekly contact between the research team and coordinators. An implementation checklist will be used at every contact with participants.	Dortining antis described gave transitions as absorbe and
Improving care coordination for community-	Date published: May 2017	Participants included 19 patients receiving inpatient Geriatric	Geriatric Evaluation and Management is a geriatrician-led, interdisciplinary model for restorative care and	Participants described care transitions as chaotic, and self-care in the community as precarious. Participants appreciated pre-discharge meetings, home visits, and

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Jurisdiction studied: Australia Methods used: Qualitative case study	Evaluation and Management and their caregivers	discharge planning. Individuals in this study participated in repeat interviews, for a total of 97 interviews (56 with patients and 37 with carers). Chart review was also conducted. Three focus groups were conducted with providers (one group with hospital-based providers, two with other providers).	personal contact following discharge. Providers experienced performance targets, pressure to discharge, and unclear referral pathways as barriers to coordinated care. Geriatric Evaluation and Management was considered to be holistic and supportive, but primary-care providers may not have knowledge of the program.
Date published: Published 2007 Jurisdiction studied: U.S. (Colorado and Hawaii) Methods used: Randomized controlled trial	This RCT included 298 patients with a prognosis of one year or less to live, and at least one past-year emergency department visit. 145 patients received the intervention and 152 received usual care.	In-home palliative care is interdisciplinary care with the primary objective of improved quality of life and symptom management. Patients did not have to forego curative care and maintain their usual primary-care provider. The core team included a palliative-care physician, nurse and social worker. The team developed a care plan that coordinated and continually reassessed care, as well as engaged in advance care planning and self-management training. Physicians provide home visits and nursing is available 24 hours on-call. Frequency of contact is determined by patient need. Additional supports may include spiritual-care providers, home health aides, rehabilitation therapists, pharmacists, dictitians, and volunteers.	At 30 and 90 days, intervention-group participants were more satisfied with care than control-group participants (although there was no difference at baseline or 60 days. Intervention-group participants were less likely to go to the emergency room (20% versus 33%) and be hospitalized (36% versus 59%). Costs were reduced for those who received home care, who incurred average costs of \$95.30 per day, compared to \$212.80 for the control group. 71% of intervention-group participants who died during the study passed away at home, compared to 51% of controls.
Date published: January 2018 Jurisdiction studied: Netherlands	General practitioners from 11 primary-care practices using the Finding and Follow-up of Frail older persons	This study assessed the implementation of interventions in the Chronic Care Model (CCM) dimensions and the quality of primary care perceived by healthcare	GPs were motivated to implement FFF due to changes in the population (i.e., aging and increasing frailty) and the health system (i.e., closing of nursing homes and shift towards primary and community care). GPs valued the proactive and interdisciplinary nature of FFF. Implementation challenges included a lack of aligned
2018 Jurisdicti	on studied:	from 11 primary-care practices using the Finding and Follow-up	from 11 primary-care practices using the Chronic Care Model (CCM) Finding and Follow-up of Frail older persons implementation of interventions in the Chronic Care Model (CCM) dimensions and the quality of primary care perceived by healthcare

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forward in improving the quality of care	Methods used: Mixed methods	four control practices took part in semi- structured interviews and longitudinal surveys	approach. The CCM entails six key elements for the provision of effective primary care: self-management support, decision support, delivery system design, clinical information systems, the healthcare system, and the community. Ongoing self-management support is provided to patients through proactive education by health professionals.	financing, human resources, and information and communication technology. Practices implementing FFF were more aligned with the Chronic Care Model than controls, including through greater use of proactive case finding and monitoring, individual care planning, multidisciplinary care, and medication reviews. FFF was associated with better quality care as scored by GPs using a standardized tool (the Assessment of Chronic Illness Care Short version).
			The FFF approach incorporates "proactive case finding [of frailty], case management, medication review, self-management support, and multidisciplinary teamwork" within primary care for older adults.	
The Impact of a Participatory Care Model on Work Satisfaction of Care Workers and the Functionality, Connectedness, and Mental Health of Community- Dwelling Older People	Date published: April 2016 Jurisdiction studied: Australia Methods used: Qualitative evaluation	Data was collected through interviews with 12 seniors who participated in the 'Staying Active-Staying Independent (SASI) program, and seven CSWs participated in a focus group	A participatory care approach and integrated health teams were used in this study to evaluate an Australian nursing home program for reducing functional decline in older adults called Staying Active-Staying Independent (SASI). The program required community support workers (CSWs) to be trained to provide care that helped to reduce five aspects of functional decline: mobility, skin integrity, cognition/emotional mental health, nutrition, and continence. Areas of care were documented in a care plan. Data was collected through interviews with 12 seniors who participated in the program, and a focus group of seven CSWs.	During data analysis of the in-depth interviews and focus group discussion for this study, seven themes emerged: 1) independence/functionality, 2) prevention, 3) confidence, 4) the approach, 5) connection, 6) care plans, and 7) the role of CSWs. The evaluation found that the relationship-focused care provided through the program led to improvements in functionality and quality of life for seniors. Clients reported losing weight and the subsequent improvement in physical function, improved confidence from being able to complete exercises and seeing improvements in their skin integrity, and the willingness of CSWs to listen to them and consider their individual situations. There were different levels of involvement in care planning, according to clients. The evaluation also found that the program contributed to the professional development of CSWs and increased satisfaction with their role. The evaluation recommended that to improve the program, regular discussions between clients and their CSWs should be encouraged, and clients should be

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				reminded routinely of the importance of the program's interventions to achieve better outcomes.
Organizing a Care System for Older Adults in Ontario	Date published: Published November 2011 Jurisdiction studied: Ontario Methods used: Evidence brief	Older adults 65 years and older in Ontario	This evidence brief involved convening a Steering Committee to organize thinking about approaches for organizing a care system for older adults, a literature review for evidence about the problem, options, and considerations for implementation, and synthesizing of three options to address the problem.	 Three approach options were presented to address the problem: Option 1 – Support older adults and their families to enable healthy aging by providing self-management supports, education for patients and their families, specialist outreach to improve access to care, and telehealth options to reduce unnecessary hospital visits and service use Option 2 – Coordinate integrated healthcare services including discharge planning, end-of-life care in home, rehabilitative care, and respite care for caregivers Option 3 – Coordinate integrated community resources by using case management models to support integrated home-care community programs and electronic medical records when possible In order to implement these three options, consensus between multiple sectors and levels of government is
				required, and providers will need to modify their existing roles or expand their usual scope of practice and activities.
Older Clients' Pathway through the Adaptation System for Independent Living in the U.K.	Date published: Published May 2020 Jurisdiction studied: U.K. Methods used: Mixed methods research	Older clients that were surveyed and interviewed included homeowners and private tenants in the U.K. Professionals that were interviewed and participated in the focus group included housing officers, social workers, occupational therapists (OTs), staff from other agencies, and older service users.	A questionnaire survey was conducted in 2015 with all local health authorities in England, Scotland and Wales, followed by individual interviews and a focus group with older clients and professionals.	This study examined blockages in the U.K.'s housing adaptation system for independent living, and identifying practical ways to address them. The authors identified five key stages of the adaptation process: 1) referral; 2) allocation; 3) assessment; 4) funding; and 5) installation. Several inconsistencies and inequities were identified across local authorities, and significant delays were found at all five stages. These included different routes for making referrals, delays in client contributions towards adaptation costs, and added administrative procedures for choosing contractors and making major adaptations. The study recommended that an effective liaison across departments or organizations could consist of regular meetings, joint trainings, and mutual procedures. Local

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Quality of life associated with adult day centres	Date published: August 2009 Jurisdiction studied: B.C., Canada Methods used: Qualitative	10 older adults and 10 caregivers who had received adult daycentre services for at least three months	Adult day centres (ADCs) aim to provide respite to caregivers by offering a variety of comprehensive services to support social care of older adults. The authors noted that the ADCs offered a range of different programs, and also that the backgrounds, qualifications, and professions of the staff varied considerably.	authorities can make use of agencies like home improvement agencies (HIAs) in organizing and managing time and costing of adaptation work. Introducing standardized referral forms, using ancillary assessments for OT, and clear policies on timelines for installation work were also recommended for addressing the inconsistencies that were identified. Participants' quality of life related to eight domains: Aging in Place, Physical Health and Well-Being, Social Networks/Relationships, Activation, Safety, Respite, Respect and Inclusion, and Adequate Healthcare Services. Adult day centres offered opportunities for social support and respite for caregivers, enabled activation through participation in activities, and were perceived as respectful, inclusive, and safe (e.g., low risk of falls).
Does the Meeting Centres Support Programme reduce unmet care needs of community- dwelling older people with dementia? A controlled, 6-month follow-up Polish study	Date published: 2019 Jurisdiction studied: Poland Methods used: Controlled longitudinal study	24 individuals with mild-to-moderate dementia who lived at home and 22 caregivers received the Meeting Centres Support Programme (MCSP) intervention, and 23 people with dementia and 20 caregivers received usual care	MCSP is based on the Adaptation-Coping model. It focuses on activation, socialization, and emotional well-being of people with dementia, and practical, social, and emotional support and education for caregivers. The program offers a thrice-weekly social club for people with dementia, psycho-education and discussion groups for caregivers, social activities and opportunities for sharing experiences, and coordination of home-care services. The program takes place at an accessible location in the community. In this study "usual care" was a Psychogeriatric Day Care unit.	Intervention and control groups were similar at baseline with respect to unmet needs, with the exception of the control group perceiving higher formal support. People with dementia in the intervention group reported a decrease in unmet needs at six months, compared to an increase in the usual-care group. Carers similarly reported a decrease in unmet needs in the intervention group, and an increase in the usual-care group. Those in the intervention group had a greater increase in formal support while those in usual care had a greater increase in informal support. The four most common unmet needs for participants with dementia were in the domains of daytime activities, psychological distress, company, and memory. In the intervention group, these were reduced by 20.8-37.5% at six-month follow-up, while in the control group, increases were between 0%-4.4% (except psychological distress-related unmet needs, which increased by almost 15%).
Exploring improvement plans	Date published: Dec 2019	Fourteen integrated care sites in seven countries	The Expanded Chronic Care Model (ECCM) framework was used in this	The study found that different types of care and support services were provided across the care sites evaluated,

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of fourteen European integrated care sites for older people with complex needs	Jurisdiction studied: Seven European countries Methods used: Case description	(Austria, Estonia, Germany, Norway, Spain, the Netherlands and the United Kingdom) participated in the cross-national research project called SUSTAIN (Sustainable Tailored Care for Older People in Europe), which aims to improve interdisciplinary and social care for older adults with complex needs living at home in Europe	study to evaluate the existing working processes and improvement plans of the 14 integrated care sites participating in the SUSTAIN project. Researchers from SUSTAIN collaborated with sites in each country to develop and implement improvement plans over an 18-month period. There are seven components of the ECCM, which were adapted from the Chronic Care Model. The components are delivery system design, self-management support, safe environments, build community capacity, building healthy public policy, decision support, and clinical information system.	including proactive primary care, home nursing and rehabilitative care, dementia care, and palliative care. Some care sites exclusively engaged medical professionals while others involved equal numbers of health and social-care professionals. Two sites included all seven components of the ECCM framework, six included five or six components, two included three or four components, and four included one or two components. The three components that were the main focus of improvement plans were self-management, delivery-system design, and decision support. All sites included delivery system design (e.g., through establishing multidisciplinary teams, needs assessments, and joint care planning). Self-management support was the second-most frequent component, operationalized through education and shared decision-making. Safe environments were addressed by half of the sites, through home-safety assessments and equipment. About half of the sites collaborated with community groups to build community capacity. Half of the sites contributed to building healthy public policy through participation in national or regional working groups. Half also engaged in decision support through training staff and other stakeholders. No sites had a comprehensive clinical information system that extended to all involved partners. Challenges included: difficulties collaborating across organizations and care settings; barriers to communication flow; inadequate resources; high workloads for staff; and limited provision of person-centred care (for reasons including lack of knowledge and time for staff). Improvement plans created by the sites addressed improved capabilities for coordination and collaboration, or improving specific care-delivery processes. All sites' improvement plans related to delivery-system design and most targeted decision support.

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House calls: is there an APN in the house?	Date published: Dec 2001 Jurisdiction studied: U.S. Methods used: Case description	N/A	A geriatric assessment and primary-care practice developed a house-call program involving home-based evaluation and care for homebound seniors, and a satellite primary-care office in a seniors' housing development.	In the house-call program, an initial home visit is conducted by an advance practice nurse and social worker and includes several assessments: comprehensive, medication, and financial (i.e., to assess eligibility for benefits). An individualized care plan is developed with the patient and caregiver. Advance practice nurses (APNs) follow the Shuler Nurse Practitioner Practice Model and provide episodic visits, and comprehensive visits with and without identified health problems (which may relate to diseases, self-management, prevention and/or health promotion). They involve geriatricians and social work as needed. Satellite clinics are staffed by advance practice nurses and offer health promotion and prevention in communities found to have low utilization of these services. This includes events such as health fairs and vaccine campaigns. Care is offered on an appointment and a drop-in basis. This model maximized the use of APNs to provide quality, cost-effective care to older adults and their families.
Adoption of Major Housing Adaptation Policy Innovation for Older Adults by Provincial Governments in China: The Case of Existing Multifamily Dwelling Elevator Retrofit Projects	Date published: May 2022 Jurisdiction studied: China Methods used: Policy analysis using event historical analysis and a piecewise constant exponential model	N/A	Housing adaptation broadly refers to permanent modification of the physical home environment to improve accessibility. This study focuses on one example of home adaptation, elevator retrofitting in multifamily buildings, which has emerged as a policy issue due to the large number of multifamily homes with aging residents and no elevators. Almost half of provinces in China have adopted the Existing Multifamily Dwellings Elevator Retrofit (EMDER) policy which requires consent of two-thirds of families in a building, and	Increased adoption of elevator retrofitting policies by cities decreased adoption at a provincial level, indicating a "pressure valve" effect (i.e., city-level adoption reduced pressure for provincial action). Adoption of elevator retrofitting policies was more likely following adoption in neighbouring provinces, which may be due to increased legitimacy of the policy. Provinces that are more dependent on financial transfers from the central government were more likely to adopt the policy, which may be due to increased pressure to comply with central government policy goals.

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			funding arrangements that include government subsidies and out-of- pocket payments from building residents.	
Using Mobile Health and the Impact on Health- Related Quality of Life: Perceptions of Older Adults with Cognitive Impairment	Publication date: April 2020 Jurisdiction studied: Southern Sweden Methods used: Qualitative design with a phenomenographic approach	Qualitative data for this study was obtained from 18 older adults (70+ years) with cognitive impairments	Researchers conducted a qualitative study with 18 participants (12 male and 6 female) who were recruited from a SMART4MD site located in Sweden. Participants were selected only if they scored between 20-26 points on the Mini-Mental State Examination (MMSE), where a score in this range indicates mild cognitive impairment. The researchers conducted semi-structured interviews with the participants for one month in 2018, specifically asking about mHealth and its impact on health-related quality of life (HRQol). Mobile health (mHealth) must be tailored to meet the needs of older adults with cognitive impairment.	In this study, semi-structured interviews were conducted with participants to gather perceptions on mobile health. The authors found varying perceptions on mHealth, which they chose to consolidate into three categories: 1) require technology literacy, 2) maintain social interaction; and 3) facilitate independent living. Those participants in the "require technology literacy" category displayed a need for usability of mHealth. They also feared usage of mobile technology, found themselves lacking technical skills, and many even displayed a lack of need or interest in mHealth. Those belonging to the "maintain social interaction" category believed mHealth facilitated communication, created a sense of security, and would allow them to stay informed. Lastly, those belonging to the "facilitate independent living" category found that mHealth could support recall in memory, create feelings of well-being, and allowed for health monitoring during illness. The authors also suggest that technology literacy, specifically regarding the usage of mHealth services, must be addressed among older adults with cognitive impairments so that they can benefit from these services and avoid the possibility of exclusion. For mHealth to effectively support HRQol, healthcare must be provided in a manner that encourages multiple methods of communication. In this way, mHealth can support aging in populations to a certain extent.
Ageing with telecare: care or coercion in austerity?	Publication date: July 2013 Jurisdiction studied: England and Spain	Obtained qualitative data from six extended observations in various settings, as well as two citizen panels, with a	The authors held a series of citizen panels for older citizens to discuss their perspective on telecare solutions for healthcare. In this study, data from six English and Spanish home telecare studies was collected through	The researchers found that some participants actively engaged with telecare devices, whom the authors termed "technogenarians." These participants displayed a positive relationship with telecare technology, as it facilitated increased action and freedom. Additionally, many found telecare services to be important during

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	Methods used: Observational studies conducted primarily through citizen panels	separate set of participants	observations at homes of older citizens, social work offices, telecare meetings, and a variety of other settings. Two rounds of citizen panels that engaged older people in telecare-related conversations were also held with a separate group of participants.	emergency scenarios. However, some participants refused to use telecare systems in the prescribed way. These participants were often unwilling to accept telecare services, and many rejected the idea of being someone who needs extra attention through telecare. Additionally, other participants who resisted using telecare services displayed a lack of understanding of the system. Some participants were even found to misuse telecare services. For example, some clients used the service to have some social interaction with the monitoring centre operators or made requests for a cup of water in the middle of the night. Telecare managers suggest that those misusing the system should have the system removed. The authors state that engaging older people with complex needs through telecare may be minimal. Proper evaluation of telecare systems requires learning from users on how the services are unleashed and used. The study displays that telecare systems may become coercive, however, if misuse is addressed appropriately, there is potential for different ways of living with telecare. Reconstructing the role of telecare to allow for innovative engagement and the co-production of care relations will help to avoid coercive adaptations of care technology.
Effectiveness of a co-designed technology package on perceptions of safety in community-dwelling older adults	Publication date: September 2022 Jurisdiction studied: Southern Australia Methods used: Observational cross-sectional study	Obtained data from 30 participants (65+ years) from an aged-care provider in southern Australia	The researchers conducted an observational cross-sectional study in March and April 2020 primarily through baseline and post-intervention questionnaires with participants. All 30 participants were 65+ years and received six hours of training on how to use the technology packages. A technology package consisted of installation of health monitoring, security alarms, and communication and entertainment devices, with six hours of technology coaching. The	Individualized technology packages, co-designed by older adults, have supported perceptions of safety among community dwelling older people. The researchers found that although most participants owned various devices and were confident in their usage prior to the study, after the intervention, many participants purchase additional devices, including compensatory aids and safety devices. For those who were less confident in technology usage or worried about security risks, researchers found that they benefited greatly from the technology coaching. After coaching, many participants purchased devices they had not been using before. Participants also reported improvements in

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Do models of care designed for terminally ill 'home alone' people improve their endof-life experience? A patient perspective	Publication date: 14 July 2012 Jurisdiction: Australia Methods: Randomized control trial	58 participants were randomized to one of the three groups and only 43 remained through the course of the follow-up. One-third of participants received extra care-aide time, one-third received personal alarms and one-third received routine or standard care.	technology package had a value of up to \$4,000. A post-usage questionnaire was completed by the participants at baseline and four weeks after use. This survey included the Personal Wellbeing Index (PWI), the Australian Quality of Life-8 Dimensions (AQoL-8D), the Canadian Occupational Performance Measure (COPM), as well as five questions related to feelings of safety at home. Additionally, optional semi-structured phone interviews were provided to participants, where they could provide feedback on their experiences with advice on how to improve the packages. The first component was the personal alarm which consists of a pendant with a button that the patient can press in an emergency; pressing the button links them to the service-provider call centre. The second component consisted of providing patients with an 10 hours per month of extra care.	PW17 and AQoL-8D scores, suggesting an increase in well-being, quality of life and satisfaction. Additionally, participants also displayed an increase in COPM scores, suggesting an increase in goal performance and satisfaction with the use of the technology packages. Furthermore, 13 participants agreed to partake in the interview sessions, where the researchers identified five common themes: cost barriers, low digital literacy, physical limitations, technology ambivalence, and social stigma were all factors that contributed to hesitancy regarding technology usage. The authors state that the generalizability of the study might be limited as older people who declined to participate in the research may be less involved with technology as well. However, the study outlined two key results: in-home coaching was essential to the successful implementation of technology packages, and effective integration of these packages must involve a user-centred approach. The personal alarm model of care benefited terminally ill patients who live alone in two main ways: 1) by imparting a sense of security and peace of mind; and 2) dealing with feelings of isolation. Participants reported feeling secured by the fact that should an unfortunate event befall them, they can connect with a service provider at any time of the day. In addition, the personal alarm provided reduced anxiety of social isolation and comfort that they can connect with someone with a press of a button. The care-aide model of care benefited participants in four ways: easing the burden of everyday living, supporting well-being, enhancing quality of life and preserving a sense of dignity, and reducing loneliness and isolation. The care-aide model provided help for participants to manage their daily household tasks, allowing them to continue to live in their familiar homes.

Focus of study	Study characteristics	Sample description	Key features of the intervention(s)	Key findings
				Furthermore, similar to the personal alarm, the additional care comforted and reduced isolation for the participants by providing an added layer of attention.
'Doing with' rather than 'doing for' older adults: rationale and content of the 'Stay Active at Home' programme	Publication date: November 2017 Jurisdiction: U.S., Canada, Australia, New Zealand, the United Kingdom, Norway, Denmark Methods: Descriptive study	Not applicable	'Stay Active at Home' is a training program for home-care professionals to equip them with the knowledge, skills and social and organizational support to deliver day-to-day rehabilitative services to older adults. The program is based primarily on the concept of reablement, which is similar to the Function Focus Care approach, and focuses on making services goal-oriented, holistic, and person-centred. The program was developed to encourage seniors to age at home and not at community-care homes. In the Dutch home-care setting, which is the focus of this study, the 'Stay Active at Home' program requires six months of training that includes an initial kick-off meeting, regular team meetings, and booster meetings two-to three months following the training period. These services are financed by municipalities and delivered by domestic support workers under the direction of a team manager. Nursing care is funded by healthcare insurance.	This study adapted the concepts of reablement to the Dutch home-care setting to focus on seven areas of reablement for seniors: • assessment of the adults • behavioural change theory • goal-setting and action planning • engaging older adults in daily activities (e.g., tasks analysis, redesign, etc.) • engaging older adults in physical activities • motivation techniques • evaluating goals and actions Procedures and processes of the 'Stay Active at Home' program are standardized and a manual is provided to home-care professionals with interventions and materials, and a weekly newsletter that were available in Dutch. The personal experiences of the program's participants are discussed at team meetings. Adaptation of the program in another home-care setting will require a balance between maintaining the treatment quality of the original program and adjusting the fit of the 'Stay Active at Home' program with the characteristics of the population and implementation context.
Age-friendly cities during a global pandemic	Publication date: 1 December 2020 Jurisdiction: West Coast of the U.S.	64 participants comprised of gerontologists, senior service providers, and a diverse sample of older adults	The Age-Friendly Cities framework consists of eight evidence-based domains: outdoor spaces and buildings transportation	The findings provided insights into the impacts of the pandemic on the eight domains of the Age-Friendly Cities framework and provided direction for service providers supporting social determinants of health and aging in place for older adults.
	Methods: Qualitative descriptive study based		housingsocial participationrespect and social inclusion	A focus on creating opportunities for social engagement and civic participation, economic and food security supports, and strengthening community-based

Focus of study	Study characteristics	Sample description	Key features of the intervention(s)	Key findings
	on interviews and focus groups		 civic participation and employment communication and information community support and health services 	organizations, were identified as critical for enabling older adults to stay at home, especially in the context of the pandemic.
Developing a framework and priorities to promote mobility among older adults	Publication date: 1 October 2014 Jurisdiction: U.S. Methods: Delphi technique	12-member steering committee and 43 stakeholders identified for the Delphi technique	A framework was developed to promote mobility among older adults consisting of 102 items across nine domains (Research to Practice, Independence and Engagement, Built Environment and Safety, Transportation, Policy, Housing and Accessibility, Community Supports, Training, and Coordinated Action)	The Delphi technique revealed agreement on four items: 1) implement complete streets, traffic calming, and continuous sidewalks to promote safer, more functional and more esthetically pleasing walking and wheeling environments; 2) require coordination and integration among local, county, regional, and state entities responsible for pedestrian, cycling, and transit to ensure planning and use of best practices; 3) support and implement training for city planning and public-health government staff on model legislation, projects, and programs to enact and maintain Complete Streets plans; and 4) include mobility in coordinated chronic disease prevention and health promotion state plans.





>> Contact us

1280 Main St. West, MML-417 Hamilton, ON, Canada L8S 4L6 +1.905.525.9140 x 22121 forum@mcmaster.ca

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mcmasterforum.org
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